



Operated By NEWSME Landfill Operations, LLC

April 24, 2013

Mike Parker  
Division of Solid Waste Management  
Department of Environmental Protection  
17 State House Station  
Augusta, ME 04333-0017

**Re: Juniper Ridge Landfill 2012 Annual Report**

Dear Mike:

Enclosed for your review is the above-referenced report and supporting documentation as required.

Should you require additional information or clarification, please do not hesitate to contact me at 207-862-4200 ext. 233 or Wayne Boyd at 207-862-4200 ext. 224.

Respectfully submitted,

NEWSME Landfill Operations, LLC.

A handwritten signature in black ink, appearing to read "J. Labbe", is written over a light blue horizontal line.

Jeremy Labbe, P.E.  
*Engineer & Environmental Manager*

Enclosure

Cc: Vicky Bryant, MEDEP  
Michael Barden, BGS  
William Mayo, City of Old Town

**2012 ANNUAL REPORT**

**JUNIPER RIDGE  
LANDFILL  
OLD TOWN, MAINE**

**MEDEP LIC. #S-020700-7A-A-N and  
Amendment #S-020700-WD-N-A**

**April 2013**



Operated by NEWSME Landfill Operations, LLC  
2828 Bennoch Road, Old Town, Maine 04468 • (207) 394-4372

**TABLE OF CONTENTS**

<u>Section No.</u>	<u>Title</u>	<u>Page No.</u>
1.0	INTRODUCTION .....	1-1
1.1	Overview .....	1-1
1.2	Annual Report Format .....	1-2
2.0	SUMMARY OF SITE ACTIVITIES .....	2-1
2.1	Site Activities .....	2-1
2.2	Compliance Self-Audit .....	2-2
3.0	SUMMARY OF OPERATIONS .....	3-1
3.1	Types of Wastes Received at JRL During 2012 .....	3-1
3.2	Estimates of Capacity Utilized During 2012 and Remaining Capacity .....	3-3
3.3	Estimates of the Amount of Cover Material Placed .....	3-3
3.4	A Summary of Changes to the Facility's Operations Manual .....	3-4
3.5	Proposed Changes to the Operations Manual or Other Aspects of the Landfill Operations .....	3-4
3.6	A Summary of Responses to Spills, Fires, Accidents or Unusual Events at the Landfill .....	3-4
3.7	Updated Cell Development Plans .....	3-6
3.8	Copies of Reports Prepared in Accordance with the Landfill's Hazardous and Special Waste Handling and Exclusion Plan .....	3-6
3.9	Inspections and Testing .....	3-6
3.10	Description of System Failures and/or Repairs .....	3-6
4.0	FACILITY SITE CHANGES .....	4-1
5.0	MONITORING .....	5-1
6.0	FINANCIAL ASSURANCE .....	6-1

*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

LIST OF ATTACHMENTS

ATTACHMENT A	UPDATED SITE PLAN
ATTACHMENT B	COMPLIANCE SELF AUDIT
ATTACHMENT C	ANNUAL SOLID WASTE MANAGEMENT REPORT
ATTACHMENT D	FACILITY INSPECTION REPORTS
ATTACHMENT E	WATER QUALITY MONITORING REPORT
ATTACHMENT F	LANDFILL GAS MONITORING EVALUATION
ATTACHMENT G	LANDFILL AIR MONITORING EVALUATION
ATTACHMENT H	GEOTECHNICAL MONITORING REPORT
ATTACHMENT I	UPDATED CLOSURE AND POST-CLOSURE COST ESTIMATES

LIST OF FIGURES

<u>Figure No.</u>	<u>Title</u>	<u>Page No.</u>
1-1	SITE LOCATION MAP.....	1-3

LIST OF TABLES

<u>Table No.</u>	<u>Title</u>	<u>Page No.</u>
TABLE 2-1	SUMMARY OF APPLICATIONS.....	2-2
TABLE 3-1	SUMMARY OF WASTES ACCEPTED AT JRL FACILITY IN 2011.....	3-2
TABLE 3-2	CORRECTED TICKETS.....	3-2

## **1.0 INTRODUCTION**

Pursuant to the requirements of 38 MRSA §1310-N(6-D), this document, and associated attachments, serve as the 2012 Annual Report for the Juniper Ridge Landfill (JRL) located off Route 16 in Old Town, Maine. The information contained in this report also addresses the requirements of Section 401.4.D of Maine Solid Waste Management Rules, as well as Condition 19 of Solid Waste Order #S-020700-WD-N-A, and Condition 4 of Solid Waste Order #S-020700-WD-W-M. As the contracted operator of the Juniper Ridge Landfill, NEWSME Landfill Operations, LLC (NEWSME), an indirect subsidiary of Casella Waste Systems, Inc. (CWS) is submitting this annual report to the Department of Environmental Protection (DEP) on behalf of the Maine Bureau of General Services (BGS). Pursuant to P.L. 2011, Chapter 655, Sec. GG-69, on July 1, 2012 the Bureau of General Services in the Department of Administrative and Financial Services became the owner and licensee of JRL. Prior to July 1, the State Planning Office (SPO) owned JRL and held its licenses. The SPO was abolished on July 1, 2012.

### **1.1 Overview**

JRL property consists of a 780-acre site accessed off Route 16 in Alton, with a physical address of 2828 Bennoch Road, Old Town, Maine. The actual licensed solid waste footprint of the JRL is approximately 68 acres. A location map of the JRL site and the surrounding facilities is shown on Figure 1-1. The JRL was originally licensed (#S-020700-7A-A-N) by the Board of Environmental Protection on July 28, 1993 as a generator-owned landfill for disposal of pulp and papermaking residuals generated by the Fort James Paper Mill (now referred to as Old Town Fuel & Fiber) located in Old Town, Maine. The original approved capacity of the facility was approximately 3 million cubic yards. Landfill operations began in Cell 1 in December 1996.

In June 2003, the Maine legislature passed Resolve 2003, Chapter 93, which authorized the State of Maine to pursue the purchase of the JRL from Fort James Operating Company. The final purchase agreement between SPO and Fort James would provide disposal capacity for the mill's waste for a 30-year period. On October 30, 2003, the SPO submitted an amendment application to the MEDEP to increase the approved final elevation of the landfill, and to dispose

*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

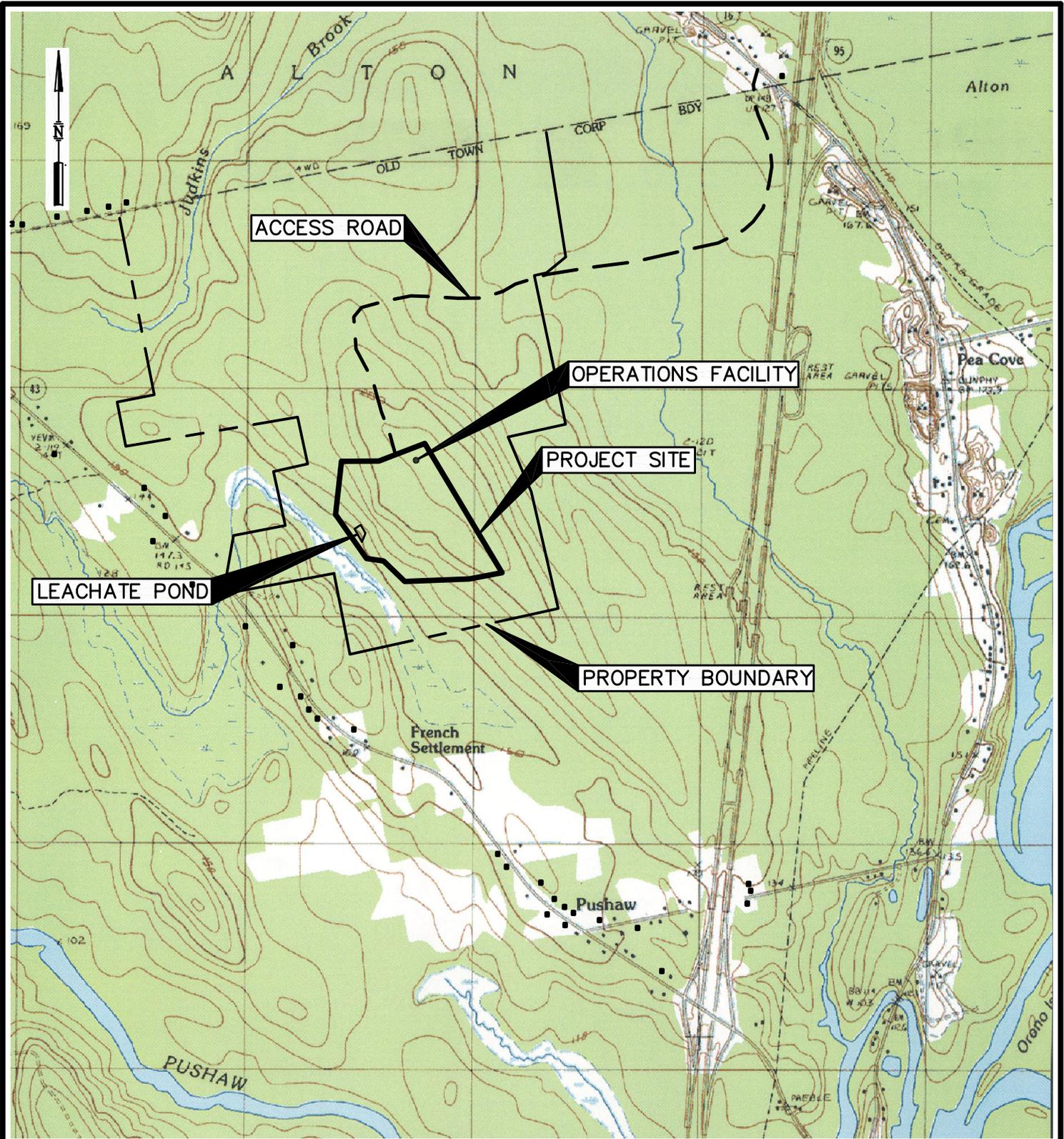
of additional waste streams at the facility. On February 5, 2004, SPO formally purchased the JRL property from Fort James and signed an Operating Services Agreement with NEWSME to operate the facility for a 30 year period. At the same time, all previously approved MEDEP operating licenses for the JRL were transferred to the SPO. On April 9, 2004, the MEDEP approved the amendment application and issued permit #S-020700-WD-N-A to the SPO to increase the original JRL capacity from approximately 3.3 million cubic yards to approximately 10.2 million cubic yards (utilizing MSE berms).

Since the signing of the Operating Services Agreement, NEWSME has been operating the site and is responsible for all costs associated with development, operational and closure/post-closure activities at the JRL site.

At the time of this annual report, Cells 1, 2, 3A, 3B, 4, 5, 6, 7, and 8 have been constructed at the facility with Cell 7 and 8 being the primary operational cells as of the date of this report. An updated site plan may be found in Attachment A of this report.

1.2 Annual Report Format

This Annual Report contains the information required by Section 401.4.D of the Regulations, including a general summary of activities during 2012, a compliance evaluation performed by JRL's environmental manager, a summary of 2012 operations and operational information, a summary of facility site changes, a summary of the site monitoring performed at and around the site during 2011, and an update of the costs and documentation of changes to the closure and post-closure funding of the facility. The 2012 Annual Report fee of \$3,296 was previously submitted to the MEDEP on February 28, 2013.



BASE MAP ADAPTED FROM 7.5 MIN  
USGS TOPOGRAPHIC QUADRANGLE  
OLD TOWN, MAINE-1988

FIGURE 1-1  
SITE LOCATION MAP  
WEST OLD TOWN LANDFILL PROJECT  
OLD TOWN, MAINE



*SME*

Sevee & Maher Engineers, Inc.

DWG: SITELOC LMN: CTB: HPSTD REV: 8/25/03

## **2.0 SUMMARY OF SITE ACTIVITIES**

### **2.1 Site Activities**

Some of the major site activities that occurred at JRL during report year 2012 are as follows:

- Cell 8 was constructed during the 2012 construction season in accordance with DEP Solid Waste Order #S-020700-WD-AY-M;
- Two laydown areas were constructed as part of Cell 8 construction activities on the east side of the site, along with the flare relocation pad located on the south side of the site;
- Constructed detention ponds 7A, 8, and 9 and Cell 8 leachate pump station as part of Cell 8 construction activities.
- Intermediate cover systems (consisting of a 40-mil liner) were installed on the sideslopes of cell 7 constructed to grade to shed clean stormwater and to assist in controlling odors;
- Several new landfill gas collection components were installed throughout cell #7 that included four new vertical LFG extraction wells, 13 gas collection trenches, 12" header piping, and lateral extraction piping.
- Discontinued 8 gas collection trenches, 3 vertical wells, and 1 cleanout collector due to lack of LFG present.
- Decommissioned groundwater monitoring well MW-207 as part of Cell 8 construction and replaced with monitoring well MW11-207R.

*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

The following MEDEP and Federal applications were submitted and/or approved during 2012 relating to the operations at JRL.

**TABLE 2-1  
SUMMARY OF APPLICATIONS SUBMITTED AND/OR APPROVED AT JUNIPER RIDGE LANDFILL  
REPORT YEAR 2012**

<b>Application Description and Permit Number Issued</b>	<b>Permit Number</b>
MEDEP Application for a solid waste project (Cell 8 construction)	#S-020700-WD-AY-M
MEDEP Chapter 115 Air License Permit	#A-921-77-2-A (Received 11/26/12)
MEDEP Public Benefit Determination for Expansion	#S-020700—W5-AU-N (Received 1/31/12)
MEDEP Amendment Application to Accept Municipal Solid Waste from Maine Sources	#S-020700-WD-BC-A (Pending as of 12/31/12)
Federal Fish & Wildlife Permit Renewal (Bird Depredation)	#MB670894-0

2.2 Compliance Self-Audit

As required by Section 401.4.D (1) (b) of the DEP Regulations, JRL performed an annual evaluation of landfill operations for calendar year 2012. A copy of the Audit is included as Attachment B.

### **3.0 SUMMARY OF OPERATIONS**

#### **3.1 Types of Wastes Received At JRL During 2012**

During 2012, the waste stream at JRL included construction and demolition debris, FEPR, CDD processing residue wood fines, OBW, MSW incinerator ash, municipal wastewater sludge, lime mud, wood ash, contaminated soils, pulp/paper sludge, MSW bypass, other approved special wastes.

Between January 1, 2012 and December 31, 2012, JRL received a total of 637,303 tons of material as compared to 703,880 tons received during report year 2011. Non-waste-related deliveries to the landfill during 2012 consisted of 1,081 tons of tire chips and shreds (utilized for landfill gas collection trenches and leachate drainage systems).

Table 3-1 (found on the following page) lists the specific waste types accepted at the landfill during report year 2012 and the corresponding tonnages.

The 2012 Annual Solid Waste Management Report for Municipalities and DEP-licensed Transfer Stations and Landfills was completed. A copy of the completed report form for calendar year 2012 may be found in Attachment C.

**TABLE 3-1  
SUMMARY OF WASTES ACCEPTED AT JUNIPER RIDGE LANDFILL  
REPORT YEAR 2012**

Type of Waste	Quantity (tons)	Origin
Burn pile ash and/or hot loads area ash	1,552	Maine
Catch basin grit & street sweepings	824	Maine
CDD processing residue - bulky waste	62,945	Maine
CDD processing residue – fines	152,171*	Maine
Coal, oil & multifuel boiler ash	6,233*	Maine
Contaminated soil & debris	1,697	Maine
Dredged spoils	55	Maine
FEPR <sup>1</sup>	94,178	Maine
Industrial WWTP sludge	16,301	Maine
Leather scraps	257	Maine
Lime mud and grit	4,280	Maine
Miscellaneous special wastes	3	Maine
Mixed CDD	150,706	Maine
MSW Bypass <sup>2</sup>	729	Maine
MSW incinerator ash	101,276*	Maine
Municipal WWTP/POTW sludge	27,973	Maine
Non friable asbestos	337	Maine
Non-hazardous chemical related	453	Maine
Oil spill debris	832	Maine
Oversized bulky waste (MSW procsng.)	1,744	Maine
Pulp mill waste	4,651	Maine
Rock and soil drill cuttings	-	Maine
Sandblast grit	255	Maine
Short-paper fiber	4,697*	Maine
Spoiled foods	169	Maine
Sulfur slurry & sulfur filter media	-	Maine
Treated biomedical waste	1,144	Maine
Urban fill soil & debris	39	Maine
Wood from CDD	1,503	Maine
WWTP grit screenings	299	Maine
<b>TOTAL TONS<sup>3</sup></b>	<b>637,303</b>	

1. Total for FEPR includes 1,006.59 tons of Refuse Derived Fuel (RDF) from MERC.

2. Includes beneficial use of 729 tons of MSW used as soft layer material.

3. Total does not include purchased materials: tire chips (1,081 tons). Monthly reports include these purchased materials. Total derived from sum of higher significant digit numbers, not rounded whole numbers as provided in the above table.

\* Denotes materials used as alternative daily cover. Only approximately 70% of MSW incinerator ash utilized as ADC, the other 30% is mixed with sludge as stabilizer

As seen in Table 3-1 above, the four major waste types received at the JRL facility during report year 2012 included CDD processing residue wood fines, construction and demolition debris, MSW incinerator ash, and front-end process residue. In compliance with JRL's permit

*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

condition, wastes going to the landfill were screened in advance in order to assure that no out-of-state wastes were accepted at the facility.

3.2 Estimates of Capacity Utilized During 2012 and Remaining Capacity

During report year 2012, wastes were primarily disposed of in Cells 7 & 8. The estimated net disposal capacity utilized during the calendar year (using aerial surveys of the entire landfill footprint which take settlement and consolidation over this entire footprint into account) was approximately 586,775 cubic yards. The estimated remaining capacity at JRL as of December 31, 2011 was approximately 5,280,000 cubic yards. This remaining capacity is based upon the original estimated volume of approximately 10.28 million cubic yards (with MSE berms) minus total cubic yards consumed through 12/31/12. Note that this remaining capacity utilizes aerial photography through 11/6/12 and an estimated compaction rate of 0.91 for the remainder of November, and December 2012 waste totals. Since aerial photography is utilized, the capacity remaining does take into account capacity that has been gained due to settlement, compaction, and/or decomposition of the waste within the landfill up until the date of the November survey. Future settlement and compaction rates will vary.

3.3 Estimates of the Amount of Cover Material Placed

During calendar year 2012, approximately 9.6 acres of Cells 5, 6, & 7 (predominantly sideslopes) were covered with a 40-mil synthetic liner as an intermediate cover. Operational areas throughout the year received alternate daily cover (ADC). ADC is also used as a bedding layer on the waste sideslopes prior to placement of the intermediate cover. Materials approved as ADC include CDD processing residue wood fines, coal, oil & multi fuel boiler ash, contaminated soil & debris, lime mud and grit, MSW incinerator ash, and short-paper fiber. Total ADC usage amounted to 235,546 tons. Utilization of waste-related materials for daily cover and bedding for the intermediated cover obviated the use of a roughly equivalent amount of virgin soil material.

### 3.4 A Summary of Changes to the Facility's Operations Manual

With the construction of Cell 8 in 2012, the facility Operations Manual was updated to include the new infrastructure and cell development plans. Additional sections were previously revised with the last published copy (May 2010) of the manual to address stormwater management, gas management, odor control, environmental and geotechnical monitoring, and leachate management.

### 3.5 Proposed Changes to the Operations Manual or Other Aspects of the Landfill Operations

No cell construction is planned during 2013. Therefore, no additional infrastructure and cell development plans will be added to the operations manual in 2013. Stormwater improvements may occur during 2013 and an updated site plan will be developed should these improvements occur. A review of the manual will be completed.

### 3.6 A Summary of Responses to Spills, Fires, Accidents or Unusual Events at the Landfill

During 2012, the JRL facility experienced one petroleum-related spill incident, one solid waste related incident, one fire-related incident, and one leachate related incident. The four incidents are detailed chronologically below.

- *7/27/12 – Petroleum Related Spill:* On July 27, 2012 JRL experienced a diesel spill. The John Deere 400 rear dump diesel tank was found to be leaking while parked in its designated parking area. Approximately 5 gallons was spilled onto the gravel pad. The contaminated soil was removed and disposed of in the JRL. The MEDEP spill hotline was notified at 12:40 pm. The machine leak had stopped, so the machine was parked within the landfill as a precaution until maintenance could occur. It is thought that the leak was associated with a full tank, and did not occur with a partially full tank. Spill # B-378-2012 was assigned to the spill.
- *8/5/12 – Solid Waste Incident:* At approximately 11:07 pm on August 5, 2012, a load of wood knots arrived at the JRL from the Old Town Fuel and Fiber facility. The load contained free liquid from the pulping process (black liquor) that leaked

onto the access road and scales. Liquid is not allowed in the wood knots coming from the facility. An unknown amount of liquid was spilled, estimated to be less than 50 gallons. The hauler was immediately notified and the scale shut down to prevent tracking of liquid. The street sweeper was used to clean the scales and the access road where liquid had dripped. A third party industrial service company was brought on site to clean the sides and under the scales, and the contaminated soils on the side of the access road. The company also washed the scales as a precaution during the cleaning process. The scales were re-opened once the cleaning had been completed.

- 8/31/12 – *Fire Incident*: A small isolated waste fire was encountered at 5:00 pm on August 31, 2012 in cell 7. The fire originated on the north side of cell 7 in an area of CDD material that was not covered. The fire was small in size and immediately and successfully extinguished. Operators immediately smothered the combusting material with ash. This material effectively eliminated the oxygen supply and suffocated the fire. The area was monitored during the weekend for signs of re-ignition. No re-ignition occurred.
- 10/20/12 – *Leachate Incident*: At approximately 10:30 am to 12:30 pm, on October 20, 2012, JRL experienced an extremely heavy un-forecasted rain event. During the rain event stormwater runoff from the surface of cell 7 that had CDD fines for cover combined with flow from the cell 7 gravel access road overwhelmed the ditch and associated drainage sump (into the cell) and spilled out of the cell onto the intermediate HDPE cover at the base of the cell. During this rain event, a small amount of silt from the roadway and CDD fines were washed out as well. Although the water runoff was considered leachate since it had come in contact with waste (CDD fines), it was relatively clean since it was surface runoff from the wood fines and had not percolated through the waste mass. Despite this, standard precautions were taken. An excavator was immediately brought in to remediate the overflow so water would remain in the cell. A third party industrial cleaning service was brought in to clean up the material that had washed out of the cell onto the intermediate cover. Conductivity testing was performed on the associated stormwater controls and all stormwater controls were within acceptable levels of conductivity (levels were measured to be less than 250µs), so no remediation to these controls was

*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

necessary. The MEDEP project engineer was notified Monday morning at 8:45 am of the incident.

### 3.7 Updated Cell Development Plans

No cell construction will occur in 2013. Cell development plans provided with the 2011 annual report pertaining to Cell 8 development will be utilized in 2013.

### 3.8 Copies of Reports Prepared in Accordance with the Landfill's Hazardous and Special Waste Handling and Exclusion Plan

During 2012, JRL submitted monthly special waste activity reports to the MEDEP, to the Maine State Planning Office from January to September, to the Bureau of General Services from October to December, to the Landfill Advisory Committee, and to the City of Old Town. No non-permitted special wastes or hazardous wastes were received at JRL during 2012. Consequently, no reports were required to be submitted pursuant to JRL's Hazardous and Special Waste Handling and Exclusion Plan.

### 3.9 Inspections and Testing

During calendar year 2012, JRL personnel performed routine inspections of the landfill and infrastructure as outlined in the facility's Operations Manual. Copies of weekly inspection reports may be found on file in the Environmental Manager's Office with summary monthly inspection reports located in Attachment D of this Annual Report.

### 3.10 Description of System Failures and/or Repairs

During report year 2012, the following routine maintenance and/or repair functions were performed at the facility:

- Sections of the leachate collection piping within the landfill were high pressure cleaned to maintain proper drainage.

*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

- One leachate pump was removed and replaced with a new unit. An actuator was also replaced on the leachate loadout.
- Two of the blowers on the flare were replaced, one with a new unit and one with a rebuilt unit.
- On-site stormwater structures were cleaned and/or repaired in accordance with standard BMP's to maintain erosion & sedimentation control during rain events.
- Various repairs were made to the existing 40-mil intermediate cover systems due to developing tears, rips, and holes from movement, settlement, or wind.
- Several landfill gas (LFG) wellheads were repaired throughout the year due to normal wear and tear.

#### **4.0 FACILITY SITE CHANGES**

During report year 2012, the following minor facility site changes not requiring Department approval occurred:

- Re-graded, mulched, and grassed portions of the embankment along the landfill paved access road to enable seasonal mowing, increases safety, and avoids overturning along the road should traffic inadvertently leave the roadway.
- Mowing, brush cutting, and other site maintenance and upkeep activities.

During 2013, the following minor facility site changes not requiring Department approval are proposed:

- Continued safety and visual improvement of the landfill paved access road.
- Installation of bin blocking for the JRL transfer station site to allow for cleaner placement of accepted material.

## **5.0 MONITORING**

An annual water quality summary report is included as Attachment E of this report. Included with the summary report is the evaluation of the environmental monitoring data for the JRL site for report year 2012. Based on the results of these data collection activities, the water quality at the Juniper Ridge Landfill site can be summarized as follows:

- Site groundwater quality data do not show adverse effects from the performance of the landfill cells or leachate collection and transport systems. At most of the sampling locations, the 2012 data indicate that the water quality has remained consistent with recent historical data; however, consistent with observations made in 2011, water quality in three monitoring wells (i.e., MW-302R, MW-223A, and MW-223B) on the northwestern side of the site continues to show upward trends in several water quality parameters. A comparison of the water quality at these locations to the landfill leachate indicates that these trends are not leachate related but likely associated with infiltration of stormwater runoff from site access roads.
- The water quality results suggest that the current sampling program should be modified to better reflect current landfill conditions and operational approaches. These changes include adding a sampling location and suspending other locations since they no longer serve a useful purpose.
- Samples from the landfill cell underdrains have relatively low parameter concentrations (e.g., chloride), which indicate the landfill liner system is performing as designed and the underdrains are not being influenced by landfill leachate. Some parameter values (e.g., specific conductance) measured in the landfill cell underdrain locations in 2012 are higher than the upgradient groundwater monitoring locations. These values are likely attributed to landfill cell construction activity where the tie-in of the new cell liner to the old cell liner exposes the underdrain to surface water contribution during the construction period. This was the case for the Cell 6 underdrain in 2012. Cell 6 is directly

*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

adjacent to Cell 8, which was constructed during the 2012 construction season, and the water quality in this underdrain is reflective of this construction activity.

- The 2012 surface water quality data continue to indicate that there are no adverse impacts to downstream surface waters related to the landfill.

As part of the 2012 water quality monitoring program, methane gas was measured during the collection of water quality samples at the site monitoring well standpipes, underdrain outfalls, leachate collection system, leak detection system, and JRL site property boundaries using a hand-held gas meter. During 2012, all methane gas monitoring results were below the meter detection limit. Hydrogen sulfide (H<sub>2</sub>S) was monitored at all of the above locations in 2012 and was not detected at any of the locations. The 2012 gas monitoring results indicate no landfill-related gases are present at the monitored locations.

A summary of landfill gas monitoring is provided in Attachment F. This routine landfill gas (LFG) monitoring took place at various on-site gas management locations with results being submitted via electronic deliverable document to the MEDEP as required. During 2012, a total of 140 wells were tuned throughout the year. Seventeen new well heads were added to the well field during 2012, including thirteen gas collection trenches, and four vertical wells. A total of eight gas collection trenches, three vertical wells, and one cleanout were discontinued during 2012. Of these, two vertical wells were temporarily discontinued due to waste placement. Average monthly methane (CH<sub>4</sub>) concentrations remained largely unchanged from 2011, remaining within the target range of 40-45% most of the year, averaging 40.6% for 2012, a decrease of 1% from 2011. Oxygen (O<sub>2</sub>) concentrations remained low throughout 2012, with only two months averaging above 1%. The annual average O<sub>2</sub> concentration in 2012 was 0.7% at the landfill gas combustion flare, a significant decrease from the 2011 average of 1.5%. The total flow of landfill gas at the JRL flare remained largely unchanged from 2011, with a slight decrease in total flow of 2.7%, and month-to-month flows were also very similar to 2011. The total flow during 2012 was 1,001 MMSCF. The total energy generated by CH<sub>4</sub> combustion at the JRL flare decreased slightly from 2011 by 3.5%. The total energy generated by combustion at JRL during 2012 was 407,169 MMBTUs.

During 2012, JRL continued monitoring H<sub>2</sub>S levels on-site and off-site as part of its odor

*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

monitoring and control plan. Stationary H<sub>2</sub>S monitors are currently positioned at five locations surrounding the JRL property and one unit is positioned onsite adjacent to cell 6. Data obtained from monitors located on the Access Road, at West Coiley Road, at Fort James House, and on the Stagecoach Road continue to be submitted to the MEDEP on a routine basis. A summary of air monitoring completed with the use of stationary H<sub>2</sub>S monitors is provided in Attachment G. Overall, average monthly and annual H<sub>2</sub>S concentrations remained low at the SPM's located around the landfill. Additionally, the overall measurable readings around the entire site remained low during 2012. Quantifiable readings decreased at all four locations during 2012. Detectable readings decreased at three of the four locations during 2012, with almost no change in detectable readings at the fourth, Stage Coach SPM, location. The largest decrease in these readings, -9.1% and -10.8% for quantitative and detectable respectively, is seen in the Access Road SPM, supporting the likely influence on the Access Road SPM from sources other than the JRL during 2011. The overall measurable readings around the entire site remained low during 2012. Odor-related complaints decreased from 2011 to 2012, with a total of seven odor related complaints occurring during 2012 as compared to twenty-one in 2011. Of these complaints, only one was confirmed as likely coming from the landfill in 2012 as opposed to seven confirmed in 2011. Surface scan CH<sub>4</sub> emission results decreased from 2011 to 2012 with a total of six above the 500 ppm level found during 2012 during three surface scans, compared with fifty-six above that level during 2011 during four surface scans. The average concentration of detections above 500 ppm decreased in 2012 from 1523 ppm to 999 ppm. These detections continue to be primarily occurring around penetrations in the intermediate cover system and are fixed as soon as practical. Damaged cover boots due to landfill consolidation and settlement continue to be the primary cause of the concentrations above 500 ppm. These damages are repaired as soon as practical.

During 2012, JRL continued to monitor site settlement and stability as in the past with the assistance of Dr. Richard Wardwell. The 2012 Geotechnical Monitoring Inspection may be found in Attachment H of this report. The 2011 Geotechnical monitoring Inspection stated that summaries of the routine operational inspections are presented in the annual landfill report. In accordance with the current GMP (REW 2007b), these routine observations were supplemented with an aerial topographic survey of the facility made on November 6, 2012, a site visit made on June 27, 2012, and the annual geotechnical inspection performed on November 12, 2012. The resulting checklists and photographic records from the site visits, included in the Appendices,

*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

document observations that the landfill is performing as anticipated with no excessive deformations, slope movements, unexplained ponded water, or leachate breakouts. Specific site observations made of the northern slope of Cells 1 & 2 (an area of the landfill underlain with waste-stabilized sludge) indicate that this critical portion of the landfill is performing as anticipated during design. There are no proposed changes to the Geotechnical Monitoring Plan beyond those made in 2008 and 2010.

## **6.0 FINANCIAL ASSURANCE**

The closure and post-closure costs have been recalculated to reflect those cells, as of the end of calendar year 2012, that have or will be constructed but have not received final cover. A copy of the revised closure and post-closure costs may be found in Attachment I of this report. Following approval of the estimates, a revised financial assurance package will be submitted to the MEDEP under separate cover.

*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

**ATTACHMENT A**  
**Updated Site Plan**



*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

**ATTACHMENT B**  
**Compliance Self Audit**

**JUNIPER RIDGE LANDFILL  
COMPLIANCE SELF-AUDIT EVALUATION  
REPORT YEAR 2012**

This Compliance Self-Audit Evaluation is to be used to perform an annual audit of landfill operations as required by of Chapter 401, Section 4.D. (1) (b) of the State of Maine Solid Waste Management Rules. The purpose of this audit is to verify general compliance with the site operations manual, licenses and regulatory requirements. Qualified facility personnel performed the audit.

**Facility Name..... Juniper Ridge Landfill**  
**Location..... Old Town, Maine**  
**Audit for Calendar Year..... 2012**  
**Compliance Auditor..... Jeremy M Labbe**  
**Title..... Environmental Manager**  
**Signature of Auditor.....**  \_\_\_\_\_

## **GENERAL EVALUATION:**

### **1. Are active facility licenses kept on file at the facility?**

Copies of active MEDEP licenses may be found in the Environmental Manager's office located at Pine Tree Landfill. Licenses are also available electronically to the landfill supervisor and staff at the JRL site.

### **2. Do the facility licenses have special license conditions relating to landfill operations?**

Yes, a number of conditions are laid out in the various permits held by the facility. MEDEP licensed conditions are entered onto a company Environmental Compliance Database that allows the division manager and compliance manager to monitor compliance with submission deadlines and fee requirements.

### **3. What pending licenses or approvals were sought from the MEDEP at the time of this audit.**

- MEDEP approval of JRL's Operations Manual
- Amendment Application to Accept Municipal Solid Waste from Maine Sources

### **4. Date of payment of MEDEP Annual License Fee.**

The 2012 annual license fee in the amount of \$12,484 was paid on July 31, 2012.

### **5. Date of submittal of previous MEDEP Annual Report & Fee.**

- MEDEP 2011 annual report was submitted on April 27, 2012.
- MEDEP 2011 annual report fee of \$3,231 was submitted on February 21, 2012.

### **6. Does the facility have a Host Community Agreement in-place and on file?**

A Host Community Compensation and Facility Oversight Agreement was signed with the City of Old Town on December 8, 2005. Although not a host community, a Community Benefits Agreement also was signed with the Town of Alton on October 6, 2005. Copies of these agreements may be found in the Division Manager's Office.

### **7. Does the facility have a current liability insurance policy in-place and on file at the facility?**

Yes, a copy of the policy is available in the Environmental Manager's Office.

### **8. Has the facility submitted an executed financial assurance instrument for closure and post closure care along with updated closure/post closure cost estimates to the MEDEP?**

Yes, performance bonds were initially provided to the MEDEP on February 19, 2004. An updated financial assurance package for the closure/post closure care is provided to the MEDEP within the annual report.

**9. Last date a certified copy of the facility Operations Manual was updated.**

The Operations Manual was last formally updated in May 2010. New cell development plans are placed in the manual each year as the landfill adds new infrastructure and cells.

**10. MEDEP approval date of last updated Operations Manual.**

The facility has not received formal MEDEP approval of its Operations Manual.

**11. Number and locations of the Certified Copies of the Operations Manual.**

Certified copies of the Operations Manual may be found at the following locations:

- The Bangor & Augusta Offices of the MDEP
- The Municipal Office of the City of Old Town
- JRL's Environmental Compliance Manager's Office
- JRL's Operations Supervisor's Office
- Manager of State Landfills at DECD
- Sevee & Maher Engineer's Cumberland Center Office

**12. Operational personnel who received landfill training during audit year.**

During 2012, operations personnel received monthly training sessions on a variety of topics relating to safety, environmental compliance, and landfill operations. Records relating to the ongoing training of landfill personnel are kept on file in the landfill supervisor's office.

**13. Are only solid wastes or special wastes as allowed in the landfill's current license accepted and are those wastes handled as described in the landfill's Operations Manual?**

Yes, only approved non-hazardous special and solid wastes from Maine are being accepted at JRL and are being characterized according to the conditions laid out in the facility's Waste Characterization Plan.

**14. Are solid wastes and special wastes permitted for acceptance characterized on an ongoing basis in conformance with the characterization plan approved by the Department?**

Yes, those wastes are being characterized at the required intervals and/or tonnage rates. Records associated with waste acceptance are kept on file in the Hampden, Maine company office.

**15. Is access to the facility controlled so that the public is not exposed to potential health and safety hazards and access is only permitted when an attendant is on duty?**

Yes, an attendant is located at the scale house during operational hours. During non-operational hours the facility is manned by security personnel that perform regular site inspections. For public safety reasons, non-employee visitors entering the site during operational hours must first stop at the scalehouse and check in prior to further entry. The site is secured with fencing. Doors and gates around the site are locked unless in use.

**16. Are the hours of operation and other limitations for access and use prominently posted at the entrance to the landfill?**

Yes, the facility has the required signage in-place at the entrance to the landfill prior to and at the scale house. Additional signage is placed in prominent areas throughout the landfill.

**17. Are the access roads within the facility maintained?**

Yes, roads from the entrance to the active landfill are maintained year round to accommodate passage of vehicles.

**18. Are any access roads into the active cell of the landfill constructed and maintained to prevent migration of leachate outside of the cell.**

Yes, the main access road into the active cell is designed to prevent leachate from migrating outside of the cell.

**19. Is a road maintenance program appropriately implemented to prevent the accumulation of dust, mud, or wastes from the facility access, public, or private roads?**

Yes, paved roads are mechanically swept, scraped, and/or plowed as needed to prevent accumulation of undesirable material on the roads. Roads are additionally watered seasonally as necessary as a further dust control measure.

**20. Are the appropriate signs posted or other approved means implemented to indicate clearly where solid waste is to be unloaded and the location of any separate handling areas?**

Yes, drivers are directed by the scale house attendant to the proper staging/unloading area where they are then given further instructions via radio communications with the operators. Delivery vehicles utilizing the site are required to be equipped with a means of radio communication. Hand-held radios are made available as needed.

**21. Are the setbacks and buffer strips approved by the Department being maintained?**

Yes, required setbacks and buffers are being maintained as required.

**22. Are the cell development plans up-to-date and submitted with the annual report?**

Yes, updated cell development plans through cell #8, constructed in 2012, have been submitted as required. No cell construction will occur in 2013.

**23. Is compaction performed at least once per operating day and more often as necessary unless otherwise approved by the Department?**

Compaction is currently being achieved at JRL with the use of compactors that are continuously in motion in order to achieve favorable compaction rates.

**24. Has cover been placed as outlined in the operations manual?**

Yes, suitable waste materials, (i.e., alternate daily cover) are primarily being utilized as daily cover as necessary. Intermediate soil/synthetic cover materials are being installed as slopes reach appropriate elevation & grades.

**25. Have storm water management and erosion control measures been implemented as outlined in the operations manual?**

Yes, storm water management & erosion control measures are being utilized as outlined in JRL's Storm Water Pollution Prevention Plan, located in the Operations Manual.

**26. Are leachate management systems including collection, transport, storage, and pumping systems maintained in accordance with the site Operations Manual?**

Yes, systems receive regularly scheduled maintenance and are inspected at pre-determined intervals in accordance with the site Operations Manual.

**27. Are landfill gas systems installed and maintained as outlined in the Operations Manual?**

Yes, the landfill maintains an active gas collection system consisting of horizontal gas collection piping, vertical wells, and a flare. The LFG Operations & Maintenance Manual was updated in March 2010. The Landfill Gas Management Plan for future Cell 8 was submitted with the Cell 8 construction documentation submitted on March 8, 2012.

**28. Is a methane gas-monitoring program implemented to verify the concentration of explosive gases generated by the landfill, and if an exceedance is triggered, appropriate steps are taken to protect human health and the Department notified of the occurrence and the protective steps that were taken?**

Yes, methane gas monitoring is being performed as required at the groundwater quality wells, landfill surfaces, at landfill structures, and LFG wellheads as required. The facility has developed a plan of action that needs to be followed should elevated levels be detected. No elevated levels of methane were detected in 2012.

**29. Are routine inspections of the landfill facilities performed as outlined in the Operations Manual, and are records of the inspections kept on file at the facility?**

Yes, routine inspections are performed at predetermined frequencies in compliance with the site Operations Manual, with records of inspections kept on file in the Environmental Manager's office.

**30. Does the facility have a fire protection plan in-place and is it outlined in the operations manual?**

Yes, fire protection procedures are located in the JRL Operations Manual, and are being followed as required.

**31. Does the facility have a hazardous and special waste handling and exclusion plan and is it implemented at the facility?**

Yes, the hazardous and special waste handling and exclusion plan may be found in the Operations Manual. Appropriate response procedures are followed as required.

**32. Does the facility have a litter control plan and is it implemented as outlined in the Operations Manual?**

Yes, the facility controls off-site litter through the use of strategically placed fencing and regular litter patrols.

**33. Has the Environmental Monitoring Program been implemented as outlined in the Operations Manual?**

Yes, requirements as laid out in the environmental monitoring plan are being adhered to. The EMP was revised in April 2010.

**34. Environmental sampling events being conducted as required and results reported to the MEDEP.**

A record of environmental sampling events with corresponding dates may be found in the annual water quality report being submitted to the MEDEP as part of the Annual Report. Site Water quality monitoring was completed on a tri annual basis in April, July, and October, with monitoring reports from those events submitted to the MEDEP.

**35. Are waste staging and storage areas maintained as outlined in the Operations Manual?**

Yes, staging and storage areas are being operated and maintained in accordance with the site Operations Manual.

**36. Is a vector control program in-place and implemented as outlined in the operations manual?**

Yes, a pest control service regularly visits the site and maintains control devices. Additionally, the facility utilizes lethal & non-lethal means of deterring bird populations.

**37. Does the facility accept asbestos wastes?**

The facility is only licensed to accept non-friable asbestos containing wastes and manages the material in a manner that minimizes exposure during offloading.

*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

**ATTACHMENT C**

**Annual Solid Waste Management Report**

**2012 ANNUAL SOLID WASTE MANAGEMENT REPORT for  
MUNICIPALITIES and DEP-licensed TRANSFER STATIONS AND LANDFILLS**

**REPORTING ENTITY:** Juniper Ridge Landfill (Operated by NEWSME, Landfill Operations, LLC)

1. This report includes information on **MSW** handling and disposal for the following municipalities:  
N/A
  
2. This report includes information on **RECYCLING** for the following municipalities:  
N/A
  
3. **PERCENTAGES BY MUNICIPALITY:** If this report includes data for more than one municipality, list each municipality and the percentage (please note as actual or estimated) of the total recyclables from each municipality:  
N/A

<b>DEP LICENSE NUMBER</b> (if applicable) #S-020700-WD-N-A
--

4. **CONTACT PERSON:** Jeremy Labbe

Title: Environmental Manager

Phone: 207-862-4200, ext. 233

Cell phone: 207-217-7988

E-mail: jeremy.labbe@casella.com

Mailing Address: 358 Emerson Mill Road

City/Town: Hampden

Zip Code: 04444

5. Please list the web site address(es), if any, used by the reporting entity to provide recycling and solid waste management information to your residents:  
N/A

*Signature of person completing this form* \_\_\_\_\_



*Printed name of person completing this form* Jeremy Labbe

**Please return two (2) copies of your completed form (3 copies for landfill reports) with the required annual report fee (if any) by April 30, 2013 to:**

Vicky Bryant  
Maine Dept. of Environmental Protection  
17 State House Station  
Augusta, Maine 04333-0017

Report for: \_\_\_\_\_ Date: \_\_\_\_\_

## ADDITIONAL CONTACTS

A. TRANSFER STATION or LANDFILL MANAGER (  Check if not applicable )

Name:

Mailing Address:

City/Town:

Zip Code:

Phone:

Mobile phone:

E-mail:

B. RECYCLING COORDINATOR (  Check if not applicable )

Name:

Phone:

E-mail:

C. RECYCLING COMMITTEE CHAIR: (  Check if not applicable )

Name:

Phone:

E-Mail:

**SECTION 1 SUMMARY OF WASTES RECEIVED AND DISPOSITION**

**A. Summary of waste recycling and disposal.**

Waste Type	Origin by state or province	TONS received residential	TONS received commercial	Destination(s) (may list broker for recyclables)	Transporter(s) (leave blank if list broker in previous column)	Final use/disposition* (D, R, C, B, E, O, or A)
MSW						
Mixed recyclables/ Single Stream						
Co-mingled containers						
Co-mingled paper & OCC						
Office paper grade						
Mixed paper grade						
Corrugated cardboard (OCC)						
Mixed newspapers and magazines						
Newspapers (ONP)						
Magazines (OMG)						
Mixed glass						
Clear glass						
Green glass						
Brown/amber glass						
Mixed household metals						
Aluminum cans/foil						
Steel cans						
WTE metal recovered						
Mixed plastics						
PETE/ PET (#1) plastic						
HDPE (#2) plastic						
PVC (#3) plastic						
LDPE (#4) plastic						
Tires						
White goods & scrap metal						
Vehicle batteries						

\*Enter code: D=disposed, R=recycled, C=composted, B=beneficial use, E=fuel chip used for energy (wood & tires only); O=burned on-site (wood only); or A= Alternative Daily Cover

*Table continues on next page...*

Waste Type	Origin by state or province	TONS received residential	TONS received commercial	Destination(s) (may list broker for recyclables)	Transporter(s) (leave blank if list broker in previous column)	Final use/disposition* (D, R, C, B, E, O, or A)
<b>Mixed CDD (unprocessed)</b> (may include building materials, furniture & carpet, asphalt, wallboard, pipes, metal conduit, etc.)				<b>SEE LAST PAGE ATTACHMENT</b>		
<b>Wood from CDD</b>						
<b>CDD processing residue - fines</b>						
<b>CDD processing residue - bulky waste</b>						
<b>CDD processing residue - other</b>						
<b>Asphalt shingles</b>						
<b>Sheetrock/wallboard</b>						
<b>Furniture</b>						
<b>Carpet</b>						
<b>Other assorted wastes</b>						
<b>Leaf &amp; yard waste</b>						
<b>Land clearing debris</b>						
<b>Burn pile ash and/or hot loads area ash</b>						
<b>Aggregate (includes concrete, bricks, porcelain &amp; incidental rocks/soil/sand)</b>						
<b>Cooking oil/grease</b>						
<b>FEPR</b>						
<b>MSW bypass</b>						
<b>MSW incinerator ash</b>						
<b>Coal, oil, &amp; multifuel boiler ash</b>						
<b>Municipal WWTP/POTW sludge</b>						
<b>Industrial WWTP sludge</b>						
<b>Catch basin grit &amp; street sweepings</b>						
<b>Oil-contaminated soil</b>						
<b>Other** (list)</b>						

\*Enter code: D=disposed; R=recycled; C=composted; B=beneficial use; E=fuel chip used for energy (wood & tires only); O=burned on-site (wood only); or A= Alternative Daily Cover

\*\*Landfills – attach additional sheets as needed to detail all types of wastes accepted by state/province of origin.

**Landfills only - Additional information on wastes received**

**Breakdown by facility of origin for MSW by-pass and FEPR**

Waste Type	Amount Landfilled (note whether tons or cubic yards) ( )	Origin by state or province	Facility of Origin
<b>MSW By-Pass</b>	Tons CY		
	Tons CY		
	Tons CY		
	Tons CY		
<b>FEPR</b>	Tons CY		
	Tons CY		

**Landfill Capacity Summary**

MSW* Recycled (tons)	N/A	NOTE: If reporting in tons, please provide the latest 'in place weight/volume' calculation so that the remaining airspace in cubic yards may be determined.
Landfill capacity used by daily cover – this year ( <del>cubic yards</del> ) (Tons)		
Landfill Capacity used by waste - this year ( <del>cubic yards</del> ) (Tons)		
Total landfill capacity used – this year (cubic yards)		
Total landfill capacity used (cubic yards)		
Constructed landfill capacity remaining (cubic yards)		
Total licensed landfill capacity remaining (cubic yards)		

\*do not include tires or composted materials.

Report for: \_\_\_\_\_ Date: \_\_\_\_\_

**C. Universal waste handling** - Provide a summary of universal waste handling activities, including the types of universal waste accepted and the amounts from residences and businesses sent for recycling. You can refer to your waste shipment records for this information. If you have shipped any of these materials but do not know the amount, at least note the "Consolidator or other destination" (e.g. Veolia, TRC, Call2Recycle); Maine DEP may be able to complete your information from other sources.

This facility accepts Universal Wastes from: (check all that apply)

Households      Businesses      Municipal buildings/schools      N/A (Direct elsewhere)

Waste Type	Amount received from households	Unit of measure	Amount received from businesses, municipal buildings and schools	Unit of measure	Consolidator or other destination
Monitors and TVs					
Computers and peripherals					
Mercury lamps					
Compact Fluorescent Lamps					
Mercury thermostats					
Other mercury devices					
Rechargeable batteries					
Intact ballasts					
Other: _____					
Other: _____					

If you do not accept Universal Wastes at your facility, where do you direct your residents and businesses to deliver these products?

**D. Waste Oil Management:**      \_\_\_ Not Applicable

Gallons removed by licensed transporter	
Gallons burned on site in waste oil furnace	
Gallons burned by municipality off-site	
Gallons burned off-site by other entity	

Name of transporter: \_\_\_\_\_

Report for: \_\_\_\_\_ Date: \_\_\_\_\_

**SECTION 2 REUSE** \_\_\_\_\_ Not Applicable

Please describe any reuse opportunities for 'items salvaged', as may be provided/managed through a 'Swap shop/bargain barn' or 'casual program', including charity collection boxes, at this transfer station or recycling center.

**Tons** \_\_\_\_\_ **Estimated?** Yes \_\_\_ No \_\_\_ **Use a Building?** Yes \_\_\_ No \_\_\_

**SECTION 3 COMPOSTING**  Not Applicable

Municipal Program

Annual report previously submitted for compost facility license number \_\_\_\_\_  
(If previously reported, check this box and do not duplicate data here.)

List participating municipalities: \_\_\_\_\_

Enter amount in cubic yards Amounts are  actual or  estimated?

<u>Waste Type</u>	<b>Volume received (cubic yards)</b>	<b>Volume of compost produced (cubic yards)</b>	<b>Volume of compost distributed (cubic yards)</b>	<b>Broker/End-Users</b>
<b>Vegetative (leaf &amp; yard)</b>				
<b>Food Waste</b>				
<b>Other Organics (describe):</b>				
_____				
_____				

Backyard composting - CREDITS \_\_\_\_\_ Not Applicable

List municipalities with a backyard compost education program:  
**(Must attach sample of flyer/media, to receive recycling credit)**

List municipalities that ban disposal of leaf/yard waste:

What percentage of households has a backyard compost pile? \_\_\_\_\_ % **(Copy of survey must be submitted)**

What percentage of households received a backyard compost bin this year? \_\_\_\_\_ before this year?

**SECTION 4 - ADDITIONAL INFORMATION ON MUNICIPAL SOLID WASTE MANAGEMENT PROGRAM**

<b>Municipal Solid Waste (MSW) Collection Practices of Member Communities</b>	
List municipalities which provide curbside trash pickup by municipal employees	
List municipalities which contract for curbside trash pickup by private hauler(s)	
List municipalities in which residents contract for curbside trash pick up by private haulers	
List the names of haulers operating in municipalities	
List municipalities in which residents drop-off trash at transfer station	
Estimate MSW taken directly out of communities for disposal by private hauler(s) as a percent of total	
<b>How are trash disposal costs paid?</b>	
List municipalities that pay for commercial trash disposal	
List municipalities in which businesses pay for commercial trash disposal	
List municipalities which have a "Pay As You Throw" program for residents and the price per bag for each.	<b>PRICE:</b>

<b>Recycling Collection Practices of Member Communities</b>	
List municipalities which provide curbside collection of recyclables by municipal employees	
List municipalities which contract for curbside collection of recyclables by private hauler(s)	
List municipalities in which residents contract with private haulers to provide curbside collection of recyclables	
List the names of haulers	
List the municipalities in which residents drop-off recyclables at transfer station or recycling center	

<b>Household Hazardous Waste Collection</b>	
List municipalities that provide for Household Hazardous Waste collection	
Total cost	
Facility or hosting organization	
Frequency of collection	

Report for: \_\_\_\_\_ Date: \_\_\_\_\_

<b>Program information</b>	
Solid Waste Program Expenses:	\$
Income from Recycling:	\$
List municipalities that have mandatory recycling	
List municipalities which have any other solid waste and/or recycling ordinances	
List municipalities which have any items banned from disposal of by municipal ordinance, and the items they ban.	

**Please attach a copy of your program's annual financial report.**

## **SECTION 5 - Additional Reporting Requirements for DEP-licensed Transfer Stations**

**1. Provide a summary of factors which affected the operation, design, and/or environmental monitoring program.**

### **2. Operations**

- A. Submit copies of reports prepared in accordance with the transfer station or storage facility's Hazardous and Special Waste Handling and Exclusion Plan.
- B. Report on deviations from approved operations manual and proposed changes in operations and/or operations manual.

Past Year Deviations

Proposed Changes

**3. Summary of staff training provided on operation or maintenance of the transfer station.**

**4. Summary of all spills, fires and/or accidents on-site.**

**Spills**

**Fires**

**Accidents**

**5. Provide verification of 2 feet till soil between waste, and seasonal high water and bedrock if one or more base pads for storage of non-containerized waste is used.**

### **6. Design**

If any aspect of design was changed, please submit as-built plans and a narrative on these changes (proposed design changes for current year may be described).

Report for: \_\_\_\_\_ Date: \_\_\_\_\_

**7. Monitoring (if facility has a monitoring plan).**

Evaluation of past year's monitoring results, monitoring program and equipment; recommended changes may be submitted. Attach additional sheets or provide a separate attachment if additional space is needed.

Monitoring Results

Monitoring Program

Equipment

**8. Recommended Changes for transfer station (if any)**

**9. Comments:** Please describe any recent improvements in your solid waste and recycling program. Include future plans or concerns for your program.

## SECTION 6. Additional Reporting Requirements for DEP-licensed Landfills

Pursuant to 38 MRSA §1310-N(6-D), an annual report and fee shall be submitted by the landfill operator to the Department for review and approval. The annual reporting requirements for landfills are as follows (as listed in Chapter 401, section 4.D of the *Solid Waste Management Regulations*):

(1) General. The annual report must include:

(a) A summary of activity at the landfill during the past year. This shall include a narrative describing any factors, either at the landfill, or elsewhere, that affected the operation, design or monitoring programs of the landfill.

See 2012 Juniper Ridge Landfill Annual Report, Section 2.1

(b) An evaluation of the landfill's operations to verify compliance with the approved operations manual, licenses, and regulatory requirements. This evaluation shall be performed either by qualified facility personnel or a qualified consultant.

See 2012 Juniper Ridge Landfill Annual Report, Section 2.2

(2) Operations. As part of the annual report, the following operational information is required.

(a) A summary of the type, quantity, and origin of waste received (*reference tables in Section 1*);

See 2012 Juniper Ridge Landfill Annual Report, Section 3.1 & Table 3-1

(b) Estimates of the capacity of the landfill used during the past year and of the landfill's remaining capacity (*reference tables in Section 1*);

See 2012 Juniper Ridge Landfill Annual Report, Section 3.2

(c) A description and estimate of the amount of cover material used in the past year (*reference tables in Section 1*);

See 2012 Juniper Ridge Landfill Annual Report, Section 3.3

(d) A summary of changes in the operations manual during the past year as submitted pursuant to section 4.A(2);

See 2012 Juniper Ridge Landfill Annual Report, Section 3.4

(e) Proposed changes to the operations manual or other aspect of the landfill's operations;

See 2012 Juniper Ridge Landfill Annual Report, Section 3.5

(f) A summary of responses to spills, fires, accidents, and unusual events that occurred at the landfill in the past year;

See 2012 Juniper Ridge Landfill Annual Report, Section 3.6

(g) Updated cell development plans, highlighting any changes to the approved plans and including detailed plans for the subsequent two year period. Approved plans need to be updated whenever variabilities in waste disposal rates and other operational factors cause development to vary more than 6 months from projected timelines. Detailed plans must include a narrative and drawings that address: layout of the cells, projected grades, location and timing of intermediate and/or final cover, location and construction of cell access, any relevant aspects of leachate and stormwater management measures, any relevant aspects of erosion and sedimentation control measures, and other pertinent facility-specific features.

See 2012 Juniper Ridge Landfill Annual Report, Section 3.7

(h) Copies of reports prepared in accordance with the landfill's Hazardous and Special Waste Handling and Exclusion Plan;

See 2012 Juniper Ridge Landfill Annual Report, Section 3.8

(i) A report on the results from the inspections and testing required by section 4.C(12), including a report stating the date and findings associated with the annual inspection and cleaning, if necessary, of the leachate collection, detection, and transport systems; and

See Juniper Ridge Landfill Annual Report, Section 3.9

(j) A description of system failures and documentation of repair measures to those systems.

See 2012 Juniper Ridge Landfill Annual Report, Section 3.10

- (3) Facility Site Changes. The annual report must document minor changes to the facility site not requiring departmental approval that have occurred during the reporting year. Also, minor aspects of the facility site proposed to be changed in the current year may be described in the annual report. Changes handled in this manner are those that do not require licensing under minor revision or amendment provisions of Chapter 400.  
See 2012 Juniper Ridge Landfill Annual Report, Section 4.0
- (4) Monitoring. The following monitoring information must be included in the annual report. If any of this information is submitted with the facility's periodic monitoring reports, only a summary of that information is required in the annual report. Evaluations must be done in accordance with all approved monitoring plans for the landfill.  
See 2012 Juniper Ridge Landfill Annual Report, Section 5.0
- (a) An evaluation of data gathered for each surface water and ground water monitoring point for the landfill, including a statistical analysis of the data where appropriate.  
See 2012 Juniper Ridge Landfill Annual Report, Section 5.0 (and attachments)
- (b) An evaluation of the quantity and quality of leachate generated by the landfill during the past year, including a comparison of the past year's leachate monitoring results to previous years' results.  
See 2012 Juniper Ridge Landfill Annual Report, Section 5.0 (and attachments)
- (c) An evaluation of the quantity and quality of liquid found in the leak detection and removal system during the past year, including a comparison of the past year's results to the previous years' results.  
See 2012 Juniper Ridge Landfill Annual Report, Section 5.0 (and attachments)
- (d) An evaluation of the gas monitoring results for the past year, including a comparison of the past year's results to the previous years' results.  
See 2012 Juniper Ridge Landfill Annual Report, Section 5.0 (and attachments)
- (e) An evaluation of the air monitoring results for the past year, including a comparison of the past year's results to the previous years' results.  
See 2012 Juniper Ridge Landfill Annual Report, Section 5.0 (and attachments)
- (f) An evaluation of the condition of each monitoring well.  
See 2012 Juniper Ridge Landfill Annual Report, Section 5.0 (and attachments)
- (g) Any changes to any aspect of the approved monitoring programs proposed in response to the changes in operation or design of the landfill, or environmental effects attributable to the landfill or its ancillary structures.  
See 2012 Juniper Ridge Landfill Annual Report, Section 5.0 (and attachments)
- (h) An evaluation of the stability and settlement monitoring data collected at each monitoring point.  
See 2012 Juniper Ridge Landfill Annual Report, Section 5.0 (and attachments)
- (5) Financial Assurance. The landfill owner or operator must submit an annual update on cost and documentation of any changes made to the financial assurance instrument in accordance with Chapter 400, section 11.  
See 2012 Juniper Ridge Landfill Annual Report, Section 6.0 (and attachments)

**2012 SUMMARY OF WASTES RECEIVED AND DISPOSITION AT JUNIPER RIDGE LANDFILL**

	Origin by state or province	Tons received residential	Tons received commercial	Destination(s) (may list broker for recyclables)	Transporter(s) (leave blank if list broker in previous column)	Final use/disposition (D, R, C, B, E, O or A)
Burn pile ash and/or hot loads area ash	Maine	N/A	1,552	N/A	N/A	A
Catch basin grit & street sweepings	Maine	N/A	824	N/A	N/A	D
CDD processing residue - bulky waste	Maine	N/A	62,945	N/A	N/A	D
CDD processing residue - fines	Maine	N/A	152,171	N/A	N/A	A
Coal, oil & multifuel boiler ash	Maine	N/A	6,233	N/A	N/A	A
Contaminated soil & debris	Maine	N/A	1,697	N/A	N/A	D
Dredged spoils	Maine	N/A	55	N/A	N/A	D
FEPR***	Maine	N/A	94,178	N/A	N/A	D
Industrial WWTP sludge	Maine	N/A	16,301	N/A	N/A	D
Leather scraps	Maine	N/A	257	N/A	N/A	D
Lime mud and grit	Maine	N/A	4,280	N/A	N/A	D
Miscellaneous special wastes	Maine	N/A	3	N/A	N/A	D
Mixed CDD	Maine	N/A	150,706	N/A	N/A	D
MSW Bypass	Maine	N/A	729	N/A	N/A	D
MSW incinerator ash	Maine	N/A	101,276	N/A	N/A	A*
Municipal WWTP/POTW sludge	Maine	N/A	27,973	N/A	N/A	D
Non friable asbestos	Maine	N/A	337	N/A	N/A	D
Non-hazardous chemical related	Maine	N/A	453	N/A	N/A	D
Oil spill debris	Maine	N/A	832	N/A	N/A	D
Oversized bulky waste (MSW procsng.)	Maine	N/A	1,744	N/A	N/A	D
Pulp mill waste	Maine	N/A	4,651	N/A	N/A	D
Rock and soil drill cuttings	Maine	N/A	-	N/A	N/A	D
Sandblast grit	Maine	N/A	255	N/A	N/A	D
Short-paper fiber	Maine	N/A	4,697	N/A	N/A	A
Spoiled foods	Maine	N/A	169	N/A	N/A	D
Sulfur slurry & sulfur filter media	Maine	N/A	-	N/A	N/A	D
Treated biomedical waste	Maine	N/A	1,144	N/A	N/A	D
Urban fill soil & debris	Maine	N/A	39	N/A	N/A	D
Wood from CDD	Maine	N/A	1,503	N/A	N/A	D
WWTP grit screenings	Maine	N/A	299	N/A	N/A	D
		<b>Total**</b>	<b>637,302.51</b>			

\* Only approximately 70% of the MSW incinerator ash is used as ADC, the other 30% is mixed with sludge as a stabilizer.

\*\* Total does not include purchased materials: tire chips (1,081 tons). Monthly reports include this purchased material.

\*\*\*Total for FEPR includes 1,006.59 tons of Refuse Derived Fuel (RDF) from MERC.

*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

**ATTACHMENT D**  
**Facility Inspection Reports**

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

INSPECTION MONTH/YEAR: Jan 2012      INSPECTION DATE: 1/25/12

NAME OF INSPECTOR: Jeremy Labbe

INSPECTION ITEM DESCRIPTION	INSPECTED NO ACTION TAKEN	NEEDS ACTION (See Comments)
<b>OPERATIONS</b> (place a check mark in the appropriate column)		
Access roads clear and free of debris		✓
Active disposal area size minimized	✓	
Daily cover materials being utilized	✓	
Litter being controlled & collected as needed	✓	
Dust being minimized	✓	
Tracking of wastes outside of cell being controlled	✓	
Waste setback from berms	✓	
Leachate controlled & contained in cells	✓	
Odor control measures in-place	✓	
Vector control measures in-place (birds, rats, etc.)	✓	
Fire prevention & control measures in-place	✓	
Adequate working equipment onsite	✓	
<b>LEACHATE MANAGEMENT</b>		
Build-up of sediment in wetwells	✓	
Pumps & valves functioning properly	✓	
Flow conditions	✓	
Pump station vented properly	✓	
Electrical panel inspection	✓	
Flow meter inspection	✓	
Manholes intact and serviceable	✓	
<b>LEACHATE STORAGE &amp; DISPOSAL</b>		
Inspection of leachate storage pond & level	✓	
Any signs of leachate seeps	✓	
Underdrain system monitoring being performed	✓	
Inspection of loading rack system & drain	✓	
Leachate forcemain system	✓	
<b>STORMWATER COLLECTION &amp; CONTROL SYSTEMS</b>		
Check outlet structures for condition		
Drainage ditches clear and flowing		
Signs of erosion		
Check dams	Frozen / snow covered	
Detention ponds		
Silt fences installed properly		
Check roadway ditches for erosion		
<b>ACTIVE GAS COLLECTION SYSTEM</b>		
Condensate knockout system	✓	✓
Condition of wellheads ok	✓	
Presence of leakage on assembly	✓	
Noise/vibration in the motor or blower	✓	
Maintenance up-to-date	✓	
Condition of igniter system	✓	
Plumbness of stack	✓	

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

## COMMENTS ON NON-COMPLIANT CONDITIONS:

- ① Few pieces of wood on access road
- ② Float KOP level transducer needs to be fixed → scheduled & new parts ordered

REVIEW BY ENVIRONMENTAL COMPLIANCE MANAGER:

  
Signature

1/25/12  
Date

Distribution: General Manager  
PCE Manager

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

INSPECTION MONTH/YEAR: Feb 2012

INSPECTION DATE: 2/20/12

NAME OF INSPECTOR: Jenny Labbe

INSPECTION ITEM DESCRIPTION	INSPECTED NO ACTION TAKEN	NEEDS ACTION (See Comments)
<b>OPERATIONS</b>		
(place a check mark in the appropriate column)		
Access roads clear and free of debris	✓	
Active disposal area size minimized	✓	
Daily cover materials being utilized	✓	
Litter being controlled & collected as needed	✓	
Dust being minimized	✓	
Tracking of wastes outside of cell being controlled	✓	
Waste setback from berms	✓	
Leachate controlled & contained in cells	✓	
Odor control measures in-place	✓	
Vector control measures in-place (birds, rats, etc.)	✓	
Fire prevention & control measures in-place	✓	
Adequate working equipment onsite	✓	
<b>LEACHATE MANAGEMENT</b>		
Build-up of sediment in wetwells	✓	
Pumps & valves functioning properly	✓	
Flow conditions	✓	
Pump station vented properly	✓	
Electrical panel inspection	✓	
Flow meter inspection	✓	
Manholes intact and serviceable	✓	
<b>LEACHATE STORAGE &amp; DISPOSAL</b>		
Inspection of leachate storage pond & level	✓	
Any signs of leachate seeps	✓	
Underdrain system monitoring being performed	✓	
Inspection of loading rack system & drain	✓	
Leachate forcemain system	✓	
<b>STORMWATER COLLECTION &amp; CONTROL SYSTEMS</b>		
Check outlet structures for condition		
Drainage ditches clear and flowing		
Signs of erosion		
Check dams	Frozen	
Detention ponds		
Silt fences installed properly		
Check roadway ditches for erosion		
<b>ACTIVE GAS COLLECTION SYSTEM</b>		
Condensate knockout system	✓	
Condition of wellheads ok	✓	
Presence of leakage on assembly	✓	
Noise/vibration in the motor or blower	✓	
Maintenance up-to-date	✓	
Condition of igniter system	✓	
Plumbness of stack	✓	

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

COMMENTS ON NON-COMPLIANT CONDITIONS:

NONE

REVIEW BY ENVIRONMENTAL COMPLIANCE MANAGER:

 2/20/12  
Signature Date

Distribution: General Manager  
PCE Manager

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

INSPECTION MONTH/YEAR: March 2012      INSPECTION DATE: 3/30/12

NAME OF INSPECTOR: Jeremy Labbe

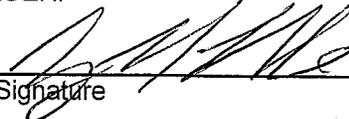
INSPECTION ITEM DESCRIPTION	INSPECTED NO ACTION TAKEN	NEEDS ACTION (See Comments)
<b>OPERATIONS</b> (place a check mark in the appropriate column)		
Access roads clear and free of debris	✓	✓
Active disposal area size minimized	✓	
Daily cover materials being utilized	✓	
Litter being controlled & collected as needed		✓
Dust being minimized		✓
Tracking of wastes outside of cell being controlled		✓
Waste setback from berms	✓	
Leachate controlled & contained in cells	✓	
Odor control measures in-place	✓	
Vector control measures in-place (birds, rats, etc.)	✓	
Fire prevention & control measures in-place	✓	
Adequate working equipment onsite	✓	
<b>LEACHATE MANAGEMENT</b>		
Build-up of sediment in wetwells	✓	
Pumps & valves functioning properly	✓	
Flow conditions	✓	
Pump station vented properly	✓	
Electrical panel inspection	✓	
Flow meter inspection	✓	
Manholes intact and serviceable	✓	
<b>LEACHATE STORAGE &amp; DISPOSAL</b>		
Inspection of leachate storage <del>pond</del> & level i	✓	
Any signs of leachate seeps	✓	
Underdrain system monitoring being performed	✓	
Inspection of loading rack system & drain	✓	
Leachate forcemain system	✓	
<b>STORMWATER COLLECTION &amp; CONTROL SYSTEMS</b>		
Check outlet structures for condition	✓	
Drainage ditches clear and flowing	✓	
Signs of erosion	✓	
Check dams	✓	
Detention ponds	✓	
Silt fences installed properly	✓	
Check roadway ditches for erosion	✓	
<b>ACTIVE GAS COLLECTION SYSTEM</b>		
Condensate knockout system	✓	
Condition of wellheads ok	✓	
Presence of leakage on assembly	✓	
Noise/vibration in the motor or blower	✓	
Maintenance up-to-date	✓	
Condition of igniter system	✓	
Plumbness of stack	✓	

**JUNIPER RIDGE LANDFILL  
FACILITY INSPECTION REPORT**

**COMMENTS ON NON-COMPLIANT CONDITIONS:**

- ① Ash tracked out of cell, needs cleaning } scheduled
  - ② Roads dusty, need sweeping
  - ③ Litter on-site. Laborers to be on-site ~~next week~~ or week after
- [The following section contains 15 horizontal lines for additional handwritten notes.]

**REVIEW BY ENVIRONMENTAL COMPLIANCE MANAGER:**

 3/30/12  
Signature Date

Distribution: General Manager  
PCE Manager

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

INSPECTION MONTH\YEAR: April 2012      INSPECTION DATE: 4/13/12

NAME OF INSPECTOR: Jeremy Labbe

INSPECTION ITEM DESCRIPTION	INSPECTED NO ACTION TAKEN	NEEDS ACTION (See Comments)
<b>OPERATIONS</b>		
(place a check mark in the appropriate column)		
Access roads clear and free of debris	✓	
Active disposal area size minimized	✓	
Daily cover materials being utilized	✓	
Litter being controlled & collected as needed		✓ ①
Dust being minimized	✓	
Tracking of wastes outside of cell being controlled	✓	
Waste setback from berms		✓ ②
Leachate controlled & contained in cells	✓	
Odor control measures in-place	✓	
Vector control measures in-place (birds, rats, etc.)	✓	
Fire prevention & control measures in-place	✓	
Adequate working equipment onsite	✓	
<b>LEACHATE MANAGEMENT</b>		
Build-up of sediment in wetwells	✓	
Pumps & valves functioning properly	✓	
Flow conditions	✓	
Pump station vented properly	✓	
Electrical panel inspection	✓	
Flow meter inspection	✓	
Manholes intact and serviceable	✓	
<b>LEACHATE STORAGE &amp; DISPOSAL</b>		
Inspection of leachate storage tank & level	✓	
Any signs of leachate seeps	✓	
Underdrain system monitoring being performed	✓	
Inspection of loading rack system & drain	✓	
Leachate forcemain system	✓	
<b>STORMWATER COLLECTION &amp; CONTROL SYSTEMS</b>		
Check outlet structures for condition	✓	
Drainage ditches clear and flowing	✓	
Signs of erosion	✓	
Check dams	✓	
Detention ponds	✓	
Silt fences installed properly	✓	
Check roadway ditches for erosion	✓	
<b>ACTIVE GAS COLLECTION SYSTEM</b>		
Condensate knockout system	✓	
Condition of wellheads ok	✓	
Presence of leakage on assembly	✓	
Noise/vibration in the motor or blower	✓	
Maintenance up-to-date	✓	
Condition of igniter system	✓	
Plumbness of stack	✓	

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

## COMMENTS ON NON-COMPLIANT CONDITIONS:

- ① Litter around site → being picked up during inspection
- ② Some waste on synthetic intermediate cover from excavating trench on cell 6 needs to be cleaned up.
- ③ Oil spots on gravel pad near maintenance garage need to be picked up.

REVIEW BY ENVIRONMENTAL COMPLIANCE MANAGER:

 4/13/12  
Signature Date

Distribution: General Manager  
PCE Manager

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

INSPECTION MONTH/YEAR: May, 2012

INSPECTION DATE: 5/8/12

NAME OF INSPECTOR: Jeremy Labbe

INSPECTION ITEM DESCRIPTION	INSPECTED NO ACTION TAKEN	NEEDS ACTION (See Comments)
<b>OPERATIONS</b>		
(place a check mark in the appropriate column)		
Access roads clear and free of debris	✓	
Active disposal area size minimized	✓	
Daily cover materials being utilized	✓	
Litter being controlled & collected as needed	✓	
Dust being minimized	✓	
Tracking of wastes outside of cell being controlled	✓	
Waste setback from berms	✓	
Leachate controlled & contained in cells	✓	
Odor control measures in-place	✓	
Vector control measures in-place (birds, rats, etc.)	✓	
Fire prevention & control measures in-place	✓	
Adequate working equipment onsite	✓	
<b>LEACHATE MANAGEMENT</b>		
Build-up of sediment in wetwells	✓	
Pumps & valves functioning properly	✓	
Flow conditions	✓	
Pump station vented properly	✓	
Electrical panel inspection	✓	
Flow meter inspection	✓	
Manholes intact and serviceable	✓	
<b>LEACHATE STORAGE &amp; DISPOSAL</b>		
Inspection of leachate storage tank & level	✓	
Any signs of leachate seeps	✓	
Underdrain system monitoring being performed	✓	
Inspection of loading rack system & drain	✓	
Leachate forcemain system	✓	
<b>STORMWATER COLLECTION &amp; CONTROL SYSTEMS</b>		
Check outlet structures for condition	✓	
Drainage ditches clear and flowing		✓ (i)
Signs of erosion	✓	
Check dams	✓	
Detention ponds	✓	
Silt fences installed properly	✓	
Check roadway ditches for erosion	✓	
<b>ACTIVE GAS COLLECTION SYSTEM</b>		
Condensate knockout system	✓	
Condition of wellheads ok	✓	
Presence of leakage on assembly	✓	
Noise/vibration in the motor or blower	✓	
Maintenance up-to-date	✓	
Condition of igniter system	✓	
Plumbness of stack	✓	

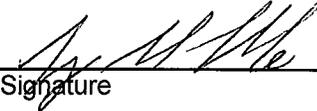
# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

## COMMENTS ON NON-COMPLIANT CONDITIONS:

① West side drainage ditch needs to be cleaned of silt.

② Oil spot in truck parking area near maintenance garage needs to be picked up and properly disposed

REVIEW BY ENVIRONMENTAL COMPLIANCE MANAGER:

  
Signature

3/8/12  
Date

Distribution: General Manager  
PCE Manager

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

INSPECTION MONTH/YEAR: June                      INSPECTION DATE: 06-29-12

NAME OF INSPECTOR: Jeffrey Pelletier

INSPECTION ITEM DESCRIPTION	INSPECTED NO ACTION TAKEN	NEEDS ACTION (See Comments)
<b>OPERATIONS</b>		
(place a check mark in the appropriate column)		
Access roads clear and free of debris		✓
Active disposal area size minimized	✓	
Daily cover materials being utilized	✓	
Litter being controlled & collected as needed		✓
Dust being minimized	✓	
Tracking of wastes outside of cell being controlled	✓	
Waste setback from berms	✓	
Leachate controlled & contained in cells	✓	
Odor control measures in-place	✓	
Vector control measures in-place (birds, rats, etc.)	✓	
Fire prevention & control measures in-place	✓	
Adequate working equipment onsite	✓	
<b>LEACHATE MANAGEMENT</b>		
Build-up of sediment in wetwells	✓	
Pumps & valves functioning properly	✓	
Flow conditions	✓	
Pump station vented properly	✓	
Electrical panel inspection	✓	
Flow meter inspection	✓	
Manholes intact and serviceable	✓	
<b>LEACHATE STORAGE &amp; DISPOSAL</b>		
Inspection of leachate storage tank & level	✓	
Any signs of leachate seeps	✓	
Underdrain system monitoring being performed	✓	
Inspection of loading rack system & drain	✓	
Leachate forcemain system	✓	
<b>STORMWATER COLLECTION &amp; CONTROL SYSTEMS</b>		
Check outlet structures for condition	✓	
Drainage ditches clear and flowing	✓	
Signs of erosion	✓	
Check dams	✓	
Detention ponds	✓	
Silt fences installed properly	✓	
Check roadway ditches for erosion		✓
<b>ACTIVE GAS COLLECTION SYSTEM</b>		
Condensate knockout system	✓	
Condition of wellheads ok	✓	
Presence of leakage on assembly	✓	
Noise/vibration in the motor or blower	✓	
Maintenance up-to-date	✓	
Condition of igniter system	✓	
Plumbness of stack	✓	

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

## COMMENTS ON NON-COMPLIANT CONDITIONS:

\* Road Muddy near Cell 8

\*\* light trash around access road & landfill

## Other things noticed:

- Deodorizer tote needs to be put undercover
- Oil spots were found under several pieces of equipment
- New floor drainage pipe needs to be cleaned.

REVIEW BY ENVIRONMENTAL COMPLIANCE MANAGER:

*SML*  
*Jeff K*  
Signature

*06-29-12*  
Date

Distribution: General Manager  
PCE Manager

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

INSPECTION MONTH/YEAR: July      INSPECTION DATE: 07-13-12

NAME OF INSPECTOR: Jeffrey Pelletier

INSPECTION ITEM DESCRIPTION	INSPECTED NO ACTION TAKEN	NEEDS ACTION (See Comments)
<b>OPERATIONS</b>		
(place a check mark in the appropriate column)		
Access roads clear and free of debris	✓	
Active disposal area size minimized	✓	
Daily cover materials being utilized	✓	
Litter being controlled & collected as needed	✓	
Dust being minimized	✓	
Tracking of wastes outside of cell being controlled	✓	
Waste setback from berms	✓	
Leachate controlled & contained in cells	✓	
Odor control measures in-place	✓	
Vector control measures in-place (birds, rats, etc.)	✓	
Fire prevention & control measures in-place	✓	
Adequate working equipment onsite	✓	
<b>LEACHATE MANAGEMENT</b>		
Build-up of sediment in wetwells	✓	
Pumps & valves functioning properly	✓	
Flow conditions	✓	
Pump station vented properly	✓	
Electrical panel inspection	✓	
Flow meter inspection	✓	
Manholes intact and serviceable	✓	
<b>LEACHATE STORAGE &amp; DISPOSAL</b>		
Inspection of leachate storage tank & level	✓	
Any signs of leachate seeps	✓	
Underdrain system monitoring being performed	✓	
Inspection of loading rack system & drain		✓
Leachate forcemain system	✓	
<b>STORMWATER COLLECTION &amp; CONTROL SYSTEMS</b>		
Check outlet structures for condition	✓	
Drainage ditches clear and flowing	✓	
Signs of erosion		✓
Check dams	✓	
Detention ponds	✓	
Silt fences installed properly	✓	
Check roadway ditches for erosion		✓
<b>ACTIVE GAS COLLECTION SYSTEM</b>		
Condensate knockout system	✓	
Condition of wellheads ok	✓	
Presence of leakage on assembly	✓	
Noise/vibration in the motor or blower	✓	
Maintenance up-to-date	✓	
Condition of igniter system	✓	
Plumbness of stack	✓	

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

## COMMENTS ON NON-COMPLIANT CONDITIONS:

\* Erosion noticed next to Manhole #13. The issue seems to be caused by stormwater that is overflowing the ditch and crossing the road. This must be fixed because it is flowing into the underdrain monitoring location (LF-UD-5-6).

\*\* Big oil spot was found near the leachate loadout rack.

## Other things noticed:

- Oil spots found under several pieces of equipment

REVIEW BY ENVIRONMENTAL COMPLIANCE MANAGER:

<sup>JML</sup>  
  
Signature

07-13-12  
Date

Distribution: General Manager  
PCE Manager

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

INSPECTION MONTH/YEAR: August

INSPECTION DATE: 08-01-12

NAME OF INSPECTOR: Jeffrey Pelletier

INSPECTION ITEM DESCRIPTION	INSPECTED NO ACTION TAKEN	NEEDS ACTION (See Comments)
<b>OPERATIONS</b>		
(place a check mark in the appropriate column)		
Access roads clear and free of debris	✓	
Active disposal area size minimized	✓	
Daily cover materials being utilized	✓	
Litter being controlled & collected as needed	✓	
Dust being minimized	✓	
Tracking of wastes outside of cell being controlled	✓	
Waste setback from berms	✓	
Leachate controlled & contained in cells	✓	
Odor control measures in-place	✓	
Vector control measures in-place (birds, rats, etc.)	✓	
Fire prevention & control measures in-place	✓	
Adequate working equipment onsite	✓	
<b>LEACHATE MANAGEMENT</b>		
Build-up of sediment in wetwells	✓	
Pumps & valves functioning properly	✓	
Flow conditions	✓	
Pump station vented properly	✓	
Electrical panel inspection	✓	
Flow meter inspection	✓	
Manholes intact and serviceable	✓	
<b>LEACHATE STORAGE &amp; DISPOSAL</b>		
Inspection of leachate storage tank & level		✓
Any signs of leachate seeps	✓	
Underdrain system monitoring being performed	✓	
Inspection of loading rack system & drain	✓	
Leachate forcemain system	✓	
<b>STORMWATER COLLECTION &amp; CONTROL SYSTEMS</b>		
Check outlet structures for condition	✓	
Drainage ditches clear and flowing	✓	
Signs of erosion		✓
Check dams	✓	
Detention ponds	✓	
Silt fences installed properly	✓	
Check roadway ditches for erosion		✓
<b>ACTIVE GAS COLLECTION SYSTEM</b>		
Condensate knockout system	✓	
Condition of wellheads ok	✓	
Presence of leakage on assembly	✓	
Noise/vibration in the motor or blower	✓	
Maintenance up-to-date	✓	
Condition of igniter system	✓	
Plumbness of stack	✓	

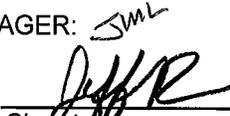
# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

## COMMENTS ON NON-COMPLIANT CONDITIONS:

\* Noticed alot of weeds and deeper rooted plants starting to come up in the leachate tank containment area. These need to be removed to prevent the penetration of the liner in the containment area.

\* West Side drainage channels/check dams are full of silt. The silt seems to be coming from the runoff off the landfill across road.

REVIEW BY ENVIRONMENTAL COMPLIANCE MANAGER:

  
Signature

08-07-12  
Date

Distribution: General Manager  
PCE Manager

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

INSPECTION MONTH/YEAR: September

INSPECTION DATE: 09-13-12

NAME OF INSPECTOR: Jeffrey Pelletier

INSPECTION ITEM DESCRIPTION	INSPECTED NO ACTION TAKEN	NEEDS ACTION (See Comments)
<b>OPERATIONS</b>		
(place a check mark in the appropriate column)		
Access roads clear and free of debris	✓	
Active disposal area size minimized	✓	
Daily cover materials being utilized	✓	
Litter being controlled & collected as needed	✓	
Dust being minimized	✓	
Tracking of wastes outside of cell being controlled	✓	
Waste setback from berms	✓	
Leachate controlled & contained in cells	✓	
Odor control measures in-place	✓	
Vector control measures in-place (birds, rats, etc.)	✓	
Fire prevention & control measures in-place	✓	
Adequate working equipment onsite	✓	
<b>LEACHATE MANAGEMENT</b>		
Build-up of sediment in wetwells	✓	
Pumps & valves functioning properly	✓	
Flow conditions	✓	
Pump station vented properly	✓	
Electrical panel inspection	✓	
Flow meter inspection	✓	
Manholes intact and serviceable	✓	
<b>LEACHATE STORAGE &amp; DISPOSAL</b>		
Inspection of leachate storage tank & level	✓	
Any signs of leachate seeps	✓	
Underdrain system monitoring being performed	✓	
Inspection of loading rack system & drain	✓	✓
Leachate forcemain system	✓	
<b>STORMWATER COLLECTION &amp; CONTROL SYSTEMS</b>		
Check outlet structures for condition	✓	
Drainage ditches clear and flowing	✓	
Signs of erosion	✓	
Check dams	✓	
Detention ponds	✓	
Silt fences installed properly	✓	
Check roadway ditches for erosion	✓	
<b>ACTIVE GAS COLLECTION SYSTEM</b>		
Condensate knockout system	✓	
Condition of wellheads ok	✓	
Presence of leakage on assembly	✓	
Noise/vibration in the motor or blower	✓	
Maintenance up-to-date	✓	
Condition of igniter system	✓	
Plumbness of stack	✓	

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

## COMMENTS ON NON-COMPLIANT CONDITIONS:

Site looked really good!

\* Noticed one oil spot near the leachate loading rack.  
I put a spill pad down to soak it up.

REVIEW BY ENVIRONMENTAL COMPLIANCE MANAGER:

Signature

*JML*  


09-13-12

Date

Distribution: General Manager  
PCE Manager

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

INSPECTION MONTH/YEAR: October      INSPECTION DATE: 10-18-12

NAME OF INSPECTOR: Jeffrey Peltner

INSPECTION ITEM DESCRIPTION	INSPECTED NO ACTION TAKEN	NEEDS ACTION (See Comments)
<b>OPERATIONS</b> (place a check mark in the appropriate column)		
Access roads clear and free of debris	✓	
Active disposal area size minimized	✓	
Daily cover materials being utilized		✓
Litter being controlled & collected as needed		✓
Dust being minimized	✓	
Tracking of wastes outside of cell being controlled	✓	
Waste setback from berms	✓	
Leachate controlled & contained in cells	✓	
Odor control measures in-place	✓	
Vector control measures in-place (birds, rats, etc.)	✓	
Fire prevention & control measures in-place	✓	
Adequate working equipment onsite	✓	
<b>LEACHATE MANAGEMENT</b>		
Build-up of sediment in wetwells	✓	
Pumps & valves functioning properly	✓	
Flow conditions	✓	
Pump station vented properly	✓	
Electrical panel inspection	✓	
Flow meter inspection	✓	
Manholes intact and serviceable	✓	
<b>LEACHATE STORAGE &amp; DISPOSAL</b>		
Inspection of leachate storage tank & level	✓	
Any signs of leachate seeps	✓	
Underdrain system monitoring being performed	✓	
Inspection of loading rack system & drain		✓
Leachate forcemain system	✓	
<b>STORMWATER COLLECTION &amp; CONTROL SYSTEMS</b>		
Check outlet structures for condition	✓	
Drainage ditches clear and flowing	✓	
Signs of erosion		✓
Check dams	✓	
Detention ponds	✓	
Silt fences installed properly	✓	
Check roadway ditches for erosion		✓
<b>ACTIVE GAS COLLECTION SYSTEM</b>		
Condensate knockout system	✓	
Condition of wellheads ok	✓	
Presence of leakage on assembly	✓	
Noise/vibration in the motor or blower	✓	
Maintenance up-to-date	✓	
Condition of igniter system	✓	
Plumbness of stack	✓	

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

## COMMENTS ON NON-COMPLIANT CONDITIONS:

\* Oil Spots were found under leachate loading rack

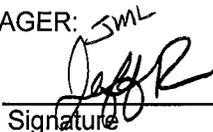
\*\* Stormwater was found again running across the road near Manhole #13. Will need to talk with Site Supervisor to come up with a better solution and fix better.

\*\*\* Light trash was found around the landfill. Will remind operators to utilize cover material better.

## Other Things Noticed:

- Light on Cell 5 Pump Station is broken. Glass Protector needs to be replaced.

REVIEW BY ENVIRONMENTAL COMPLIANCE MANAGER:

  
Signature

10-18-12  
Date

Distribution: General Manager  
PCE Manager

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

INSPECTION MONTH/YEAR: November

INSPECTION DATE: 11-08-12

NAME OF INSPECTOR: Jeffrey Pelletier

INSPECTION ITEM DESCRIPTION	INSPECTED NO ACTION TAKEN	NEEDS ACTION (See Comments)
<b>OPERATIONS</b>		
(place a check mark in the appropriate column)		
Access roads clear and free of debris	✓	
Active disposal area size minimized	✓	
Daily cover materials being utilized	✓	
Litter being controlled & collected as needed	✓	
Dust being minimized		✓
Tracking of wastes outside of cell being controlled	✓	
Waste setback from berms	✓	
Leachate controlled & contained in cells	✓	
Odor control measures in-place	✓	
Vector control measures in-place (birds, rats, etc.)	✓	
Fire prevention & control measures in-place	✓	
Adequate working equipment onsite	✓	
<b>LEACHATE MANAGEMENT</b>		
Build-up of sediment in wetwells	✓	
Pumps & valves functioning properly	✓	
Flow conditions	✓	
Pump station vented properly	✓	
Electrical panel inspection	✓	
Flow meter inspection	✓	
Manholes intact and serviceable	✓	
<b>LEACHATE STORAGE &amp; DISPOSAL</b>		
Inspection of leachate storage tank & level	✓	
Any signs of leachate seeps	✓	
Underdrain system monitoring being performed	✓	
Inspection of loading rack system & drain	✓	
Leachate forcemain system	✓	
<b>STORMWATER COLLECTION &amp; CONTROL SYSTEMS</b>		
Check outlet structures for condition	✓	
Drainage ditches clear and flowing		✓
Signs of erosion	✓	
Check dams	✓	
Detention ponds	✓	
Silt fences installed properly	✓	
Check roadway ditches for erosion	✓	
<b>ACTIVE GAS COLLECTION SYSTEM</b>		
Condensate knockout system	✓	
Condition of wellheads ok	✓	
Presence of leakage on assembly	✓	
Noise/vibration in the motor or blower	✓	
Maintenance up-to-date	✓	
Condition of igniter system	✓	
Plumbness of stack	✓	

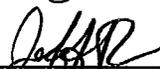
# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

## COMMENTS ON NON-COMPLIANT CONDITIONS:

\* Noticed Clean water runoff between Landfill temporary  
Liner and Sed pond is out of place and damaged.

\*\* Light Dust around landfill.

REVIEW BY ENVIRONMENTAL COMPLIANCE MANAGER: JML

  
Signature

11-08-12  
Date

Distribution: General Manager  
PCE Manager

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

INSPECTION MONTH/YEAR: December      INSPECTION DATE: 12-13-12

NAME OF INSPECTOR: Jeffrey Pelletier

INSPECTION ITEM DESCRIPTION	INSPECTED NO ACTION TAKEN	NEEDS ACTION (See Comments)
<b>OPERATIONS</b>		
(place a check mark in the appropriate column)		
Access roads clear and free of debris		✓
Active disposal area size minimized	✓	
Daily cover materials being utilized	✓	
Litter being controlled & collected as needed		✓
Dust being minimized	✓	
Tracking of wastes outside of cell being controlled	✓	
Waste setback from berms	✓	
Leachate controlled & contained in cells	✓	
Odor control measures in-place	✓	
Vector control measures in-place (birds, rats, etc.)	✓	
Fire prevention & control measures in-place	✓	
Adequate working equipment onsite	✓	
<b>LEACHATE MANAGEMENT</b>		
Build-up of sediment in wetwells	✓	
Pumps & valves functioning properly	✓	
Flow conditions	✓	
Pump station vented properly	✓	
Electrical panel inspection	✓	
Flow meter inspection	✓	
Manholes intact and serviceable	✓	
<b>LEACHATE STORAGE &amp; DISPOSAL</b>		
Inspection of leachate storage tank & level	✓	
Any signs of leachate seeps	✓	
Underdrain system monitoring being performed	✓	
Inspection of loading rack system & drain	✓	
Leachate forcemain system	✓	
<b>STORMWATER COLLECTION &amp; CONTROL SYSTEMS</b>		
Check outlet structures for condition	✓	
Drainage ditches clear and flowing	✓	
Signs of erosion	✓	
Check dams	✓	
Detention ponds	✓	
Silt fences installed properly	✓	
Check roadway ditches for erosion	✓	
<b>ACTIVE GAS COLLECTION SYSTEM</b>		
Condensate knockout system	✓	
Condition of wellheads ok	✓	
Presence of leakage on assembly	✓	
Noise/vibration in the motor or blower	✓	
Maintenance up-to-date	✓	
Condition of igniter system	✓	
Plumbness of stack	✓	

# JUNIPER RIDGE LANDFILL FACILITY INSPECTION REPORT

## COMMENTS ON NON-COMPLIANT CONDITIONS:

\* Noticed quite a bit of trash along the road,

## Other things found

- found oil spot under the skid steer in the tent.

REVIEW BY ENVIRONMENTAL COMPLIANCE MANAGER:

Signature

Date

Distribution: General Manager  
PCE Manager

*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

**ATTACHMENT E**

**Water Quality Monitoring Report**

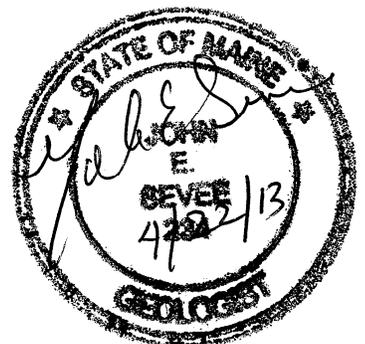
**2012 ANNUAL WATER QUALITY REPORT  
JUNIPER RIDGE LANDFILL**

**PREPARED FOR  
NEWSME LANDFILL OPERATIONS, LLC**

**April 2013**



ENVIRONMENTAL • CIVIL • GEOTECHNICAL • WATER • COMPLIANCE



## TABLE OF CONTENTS

<u>Section No.</u>	<u>Title</u>	<u>Page No.</u>
EXECUTIVE SUMMARY .....		ES-1
1.0 INTRODUCTION .....		1-1
1.1 Landfill Conditions .....		1-1
1.2 Hydrogeologic Setting.....		1-5
2.0 MONITORING LOCATIONS .....		2-1
2.1 2012 Monitoring Locations.....		2-1
2.2 Groundwater Locations.....		2-1
2.3 Surface Water Locations .....		2-4
2.4 Leachate Sample Locations .....		2-4
2.5 Leachate Pond Leak Detection Monitoring.....		2-5
2.6 Underdrain Monitoring .....		2-5
2.7 Annual Monitoring Well Specific Conductance Measurements .....		2-7
2.8 Landfill Gas Monitoring Program .....		2-9
3.0 MONITORING PARAMETERS .....		3-1
4.0 SAMPLING TECHNIQUES .....		4-1
4.1 Monitoring Wells .....		4-1
4.2 Surface Water Underdrain, Leak Detection, and Leachate Sampling Locations.....		4-1
4.3 Gas Monitoring .....		4-1
4.4 Sample Handling and Chain-of-Custody .....		4-2
5.0 DATA VALIDATION AND QUALITY CONTROL (QC)/QUALITY ASSURANCE (QA).....		5-1
6.0 WATER QUALITY EVALUATION .....		6-1
6.1 Groundwater Quality.....		6-4
6.1.1 Bedrock Groundwater .....		6-4
6.1.2 Soil Overburden Groundwater.....		6-11
6.2 Surface Water.....		6-19
6.3 Leachate.....		6-21
6.4 Leak Detection.....		6-22
6.5 Underdrains .....		6-22
7.0 GAS MONITORING .....		7-1
8.0 SUMMARY AND RECOMMENDATIONS.....		8-1
8.1 Summary .....		8-1
8.2 Recommendations.....		8-2

## LIST OF APPENDICES

APPENDIX A	2012 AND HISTORICAL FALL SPECIFIC CONDUCTANCE DATA (EXPANDED LOCATIONS)
APPENDIX B	2012 AND HISTORICAL WATER QUALITY DATA
APPENDIX C	2012 WATER QUALITY EVALUATION SHEETS AND BOX & WHISKER PLOTS
APPENDIX D	MANN-KENDALL TREND ANALYSIS RESULTS
APPENDIX E	DETECTED 2011 VOCs, SVOCs, PESTICIDES, HERBICIDES, AND PCBs FOR LEACHATE
APPENDIX F	2012 UNDERDRAIN AND LEAK DETECTION FIELD DATA
APPENDIX G	SUMMARY OF LEACHATE POND UNDERDRAIN AVERAGE DAILY SPECIFIC CONDUCTANCE MEASUREMENTS
APPENDIX H	2012 AND HISTORICAL GAS MEASUREMENT DATA

LIST OF FIGURES

<u>Figure No.</u>	<u>Title</u>	<u>Page No.</u>
1-1	SITE LOCATION MAP .....	1-2
1-2	SITE LAYOUT AND ENVIRONMENTAL MONITORING LOCATIONS .....	1-3
1-3	ENVIRONMENTAL MONITORING LOCATIONS ADJACENT TO LEACHATE POND.....	1-4
1-4	INTERPRETED PHREATIC SURFACE .....	1-7
1-5	INTERPRETED POTENTIOMETRIC SURFACE IN BEDROCK.....	1-8
2-1	MONITORING WELL LOCATIONS USED FOR ANNUAL CONDUCTIVITY MEASUREMENTS .....	2-8
6-1	PIPER DIAGRAM - JULY 2012 .....	6-7

LIST OF TABLES

<u>Table No.</u>	<u>Title</u>	<u>Page No.</u>
2-1	GROUNDWATER MONITORING LOCATIONS .....	2-3
2-2	SURFACE WATER, LEACHATE, UNDERDRAIN, AND LEAK DETECTION MONITORING LOCATIONS .....	2-4
2-3	MONITORING WELL AND PIEZOMETER LOCATIONS USED FOR ANNUAL SPECIFIC CONDUCTANCE MEASUREMENTS .....	2-9
3-1	2012 DETECTION MONITORING ANALYTICAL PROGRAM .....	3-2
6-1	2012 ANNUAL MAXIMUM SPECIFIC CONDUCTANCE VALUES AND CHLORIDE CONCENTRATIONS AT OVERBURDEN GROUNDWATER MONITORING LOCATIONS .....	6-13

**2012 ANNUAL WATER QUALITY REPORT  
JUNIPER RIDGE LANDFILL  
NEWSME LANDFILL OPERATIONS, LLC**

**EXECUTIVE SUMMARY**

During 2012, water quality samples were collected at the Juniper Ridge Landfill in accordance with the current Environmental Monitoring Program (EMP) (revised April 2010). Based on the results of these data collection activities, the water quality at the Juniper Ridge Landfill site can be summarized as follows:

- Site groundwater quality data do not show adverse effects from the performance of the landfill cells or leachate collection and transport systems. At most of the sampling locations, the 2012 data indicate that the water quality has remained consistent with recent historical data; however, consistent with observations made in 2011, water quality in three monitoring wells (i.e., MW-302R, MW-223A, and MW-223B) on the northwestern side of the site continues to show upward trends in several water quality parameters. A comparison of the water quality at these locations with the landfill leachate indicated that these trends are not leachate related but likely associated with infiltration of stormwater runoff from site access roads.
- The water quality results suggest that the current sampling program should be modified to better reflect current landfill conditions and operational approaches. These changes include adding surface water sampling location on the northwest side of the site and suspending several upgradient and downgradient monitoring well locations since they no longer serve a useful purpose.
- Samples from the landfill cell underdrains have relatively low parameter concentrations (e.g., chloride), which indicate the landfill liner system is performing as designed and the underdrains are not being influenced by landfill leachate. Some parameter values (e.g., specific conductance) measured in the landfill cell underdrain locations in 2012 are higher than the upgradient

groundwater monitoring locations. These values are likely attributed to landfill cell construction activity where the tie-in of the new cell liner to the old cell liner exposes the underdrain to surface water contribution during the construction period. This was the case for the Cell 6 underdrain in 2012. Cell 6 is directly adjacent to Cell 8, which was constructed during the 2012 construction season, and the water quality in this underdrain is reflective of this construction activity.

- The 2012 surface water quality data continues to indicate that there are no adverse impacts to downstream surface waters related to the landfill.

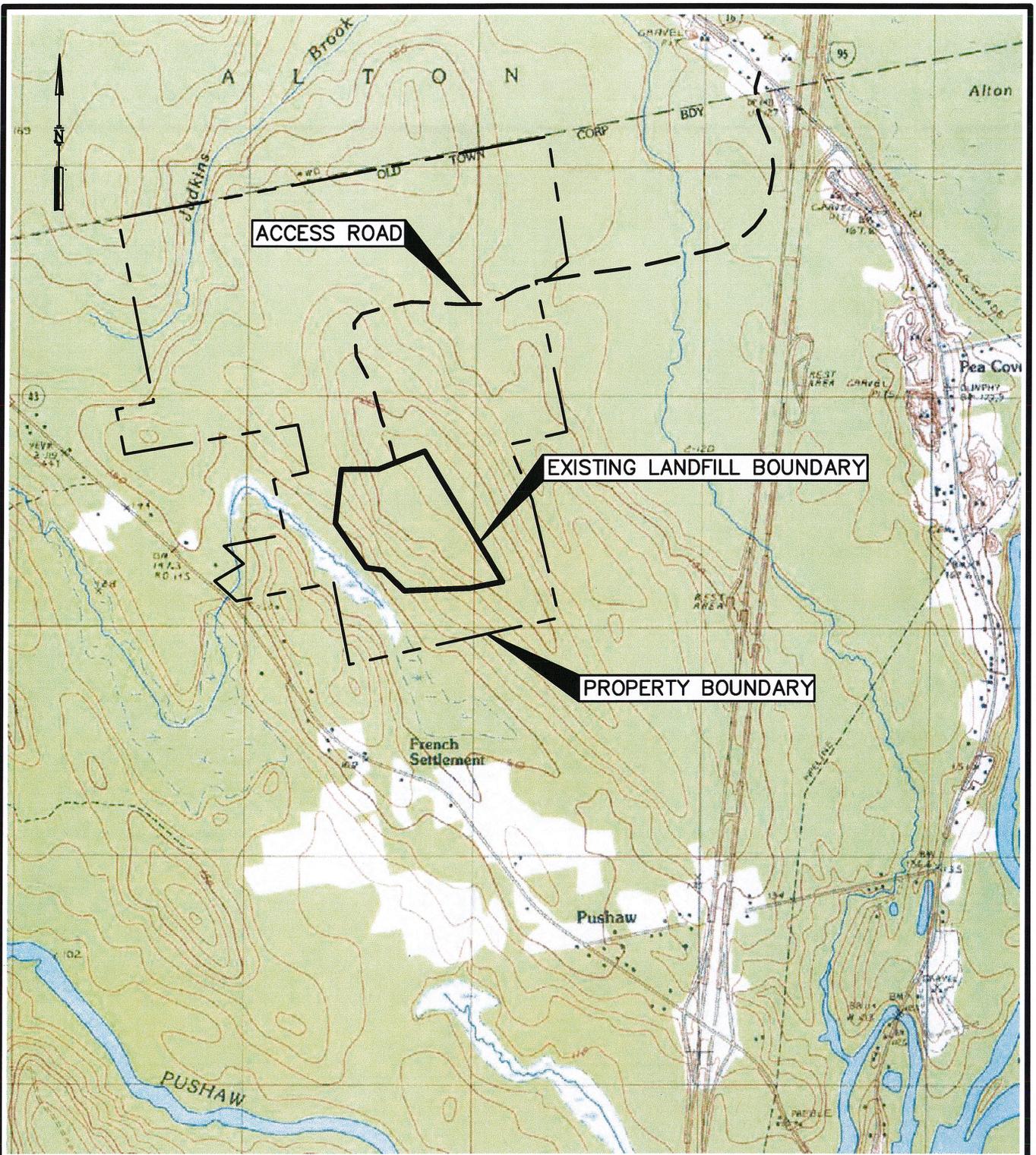
## **1.0 INTRODUCTION**

The Juniper Ridge Landfill (formerly the West Old Town Landfill), located in Old Town, Maine, is currently owned by the Maine State Planning Office (SPO) and is operated by NEWSME Landfill Operations, LLC (NEWSME Operations). The Juniper Ridge Landfill (JRL) was originally owned and operated by Georgia-Pacific (previously known as Fort James and James River Paper Company) as a secure, non-hazardous, generator-owned waste disposal facility. A comprehensive description of the site setting and hydrogeology is contained in the 1991 report by Sevee and Maher Engineers Inc. (SME) entitled: *James River Paper Company Inc., West Old Town Landfill Project, Old Town Maine, Volume III, Site Investigation and Hydrogeologic Evaluation, August 1991*. Figure 1-1 shows the location of the site. Figures 1-2 and 1-3 show the general site layout and monitoring locations.

Water quality has been monitored at the site since 1990 when the site was first selected for the landfill. This report describes the results of the water quality sampling and analyses for 2012 and compares the results to historical water quality at the site and to State and Federal water quality standards. The data evaluation includes statistical and graphical evaluations of trends in the data by sample location. Description of the site setting, facility layout, monitoring locations, site activities, and analytical parameters are also included herein.

### **1.1 Landfill Conditions**

The landfill has been designed and constructed as a secure waste disposal facility in that the groundwater beneath and adjacent to the site is protected by a composite liner and a leachate collection system. Leachate generated at the site is collected and stored in an on-site storage tank, then transported to the Old Town Fuel & Fiber wastewater treatment facility for treatment. The City of Brewer's treatment facility is utilized as a back-up leachate disposal location.



BASE MAP ADAPTED FROM 7.5 MIN  
 USGS TOPOGRAPHIC QUADRANGLE  
 OLD TOWN, MAINE-1988

FIGURE 1-1  
 SITE LOCATION MAP  
 JUNIPER RIDGE LANDFILL  
 OLD TOWN, MAINE



**SME**  
 Sevee & Maher Engineers, Inc.  
 ENVIRONMENTAL • CIVIL • GEOTECHNICAL • WATER • COMPLIANCE



SW-AR3  
DISCONTINUED

HYDROGEN SULFIDE  
MONITOR LOCATION A  
N 482095.70  
E 929404.13

HYDROGEN SULFIDE  
MONITOR LOCATION B  
N 477352.97  
E 930685.56

SW-AR1  
DISCONTINUED

SW-AR2  
DISCONTINUED

**NOTE**

MW-207 DECOMMISSIONED AFTER  
APRIL 2011 SAMPLING EVENT.

**LEGEND**

- GROUNDWATER SAMPLING LOCATION
- SURFACE WATER SAMPLING LOCATION
- GAS MONITORING LOCATION
- HYDROGEN SULFIDE MONITORING LOCATION
- PORE WATER SAMPLE LOCATION

NORTHEAST  
PROPERTY LINE

PROPERTY  
BOUNDARY

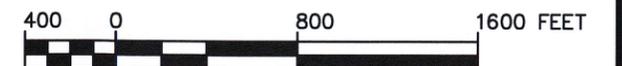
SOUTH PROPERTY LINE

STORMWATER  
DETENTION POND #5

SEE FIGURE 1-3

WEST PROPERTY LINE B

WEST PROPERTY LINE A



HYDROGEN SULFIDE  
MONITOR LOCATION D  
N 482955.24  
E 921878.25

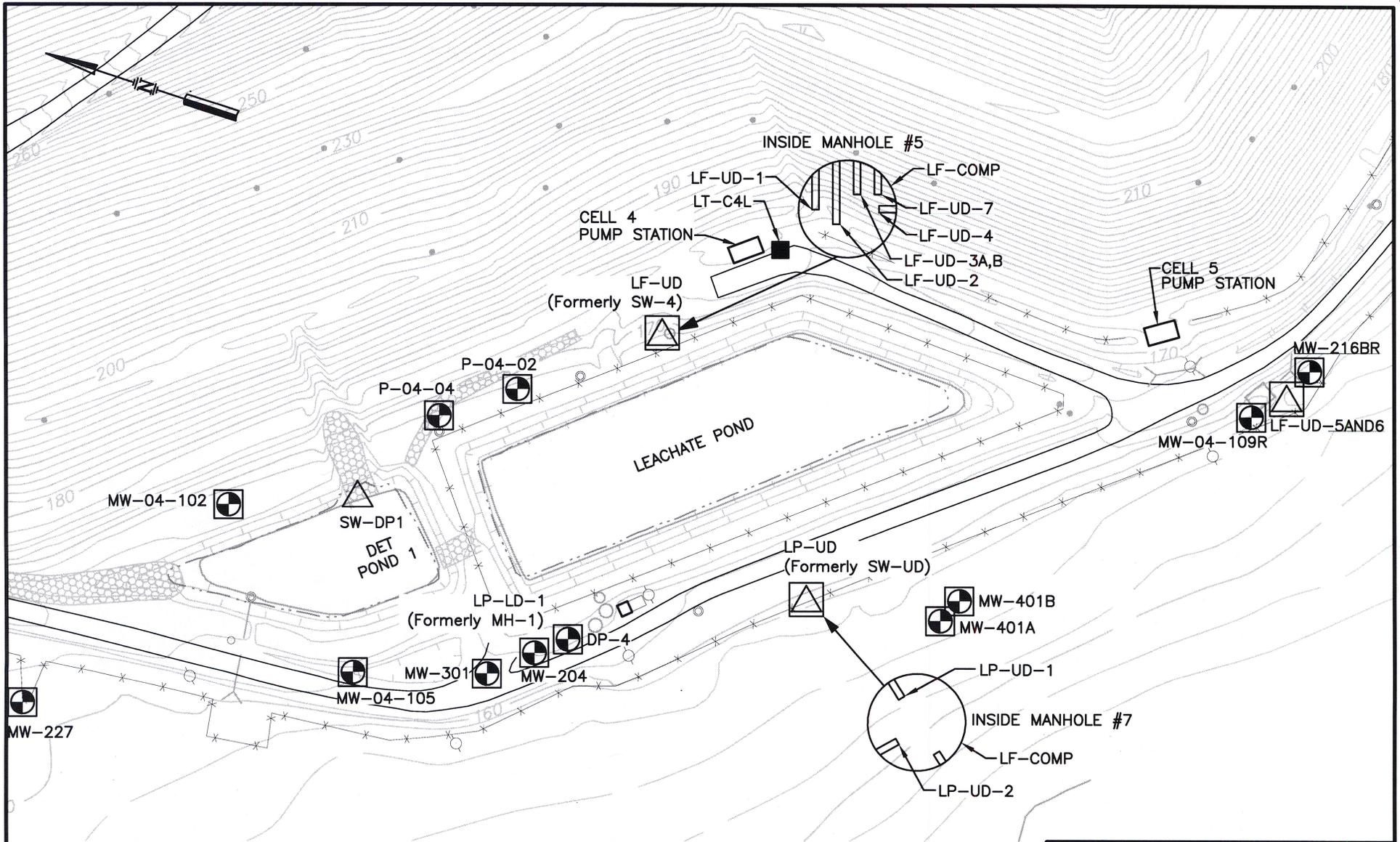
HYDROGEN SULFIDE  
MONITOR LOCATION C  
N 478101.11  
E 923701.00

**FIGURE 1-2**  
SITE LAYOUT AND  
ENVIRONMENTAL  
MONITORING LOCATIONS  
ENVIRONMENTAL MONITORING PLAN  
JUNIPER RIDGE LANDFILL  
OLD TOWN, MAINE



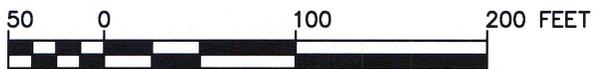
ENVIRONMENTAL • CIVIL • GEOTECHNICAL • WATER • COMPLIANCE

\\nservicfs\Casella\OldTown\Landfill\General\SiteInfo\EMP\Acad\EMP.dwg, 2/1/2013 12:08:17 PM, paf



**NOTE**

USE OF LEACHATE POND TO STORE LEACHATE DISCONTINUED WITH CONSTRUCTION OF CELL 4 IN 2008.



**LEGEND**

- GROUNDWATER SAMPLING LOCATION
- △ SURFACE WATER/UNDERDRAIN SAMPLING LOCATION
- GAS MONITORING LOCATION
- LEACHATE PUMP STATION

FIGURE 1-3  
 ENVIRONMENTAL MONITORING  
 LOCATIONS ADJACENT TO  
 LEACHATE POND  
 ENVIRONMENTAL MONITORING PLAN  
 JUNIPER RIDGE LANDFILL  
 OLD TOWN, MAINE



ENVIRONMENTAL • CIVIL • GEOTECHNICAL • WATER • COMPLIANCE

The facility was originally permitted for the disposal of pulp and papermaking residuals (primarily wastewater treatment plant sludges) from the Old Town mill (then owned by James River), bottom ash from Lincoln Pulp & Paper, and burn pile ash from the City of Old Town transfer station. In addition to the waste streams historically disposed of at the landfill, the landfill is now permitted to receive non-hazardous waste streams including, but not limited to, construction and demolition debris, municipal solid waste, incinerator ash, sludges, contaminated soils, and other solid waste for which the facility has either blanket or individual permits.

To date, Cells 1, 2, 3A, 3B, 4, 5, 6, 7, and 8 have been constructed; this accounts for approximately 56 acres of the permitted 68-acre facility. The majority of the waste filling in 2012 occurred in Cell 7, with a small amount of waste placed in Cell 8. As of December 2012, approximately 5,280,000 cubic yards of the site's permitted capacity remains. In 2012, Cell 8 was constructed which is an approximately 8-acre cell located on the southern side of the site, adjacent to the Cell 6. Cell 8 construction included the construction of a landfill cell, temporary stormwater storage ponds, and the leachate collection sump and pump station. Construction of Cell 8 began in May 2012 and was substantially completed in September 2012.

## 1.2 Hydrogeologic Setting

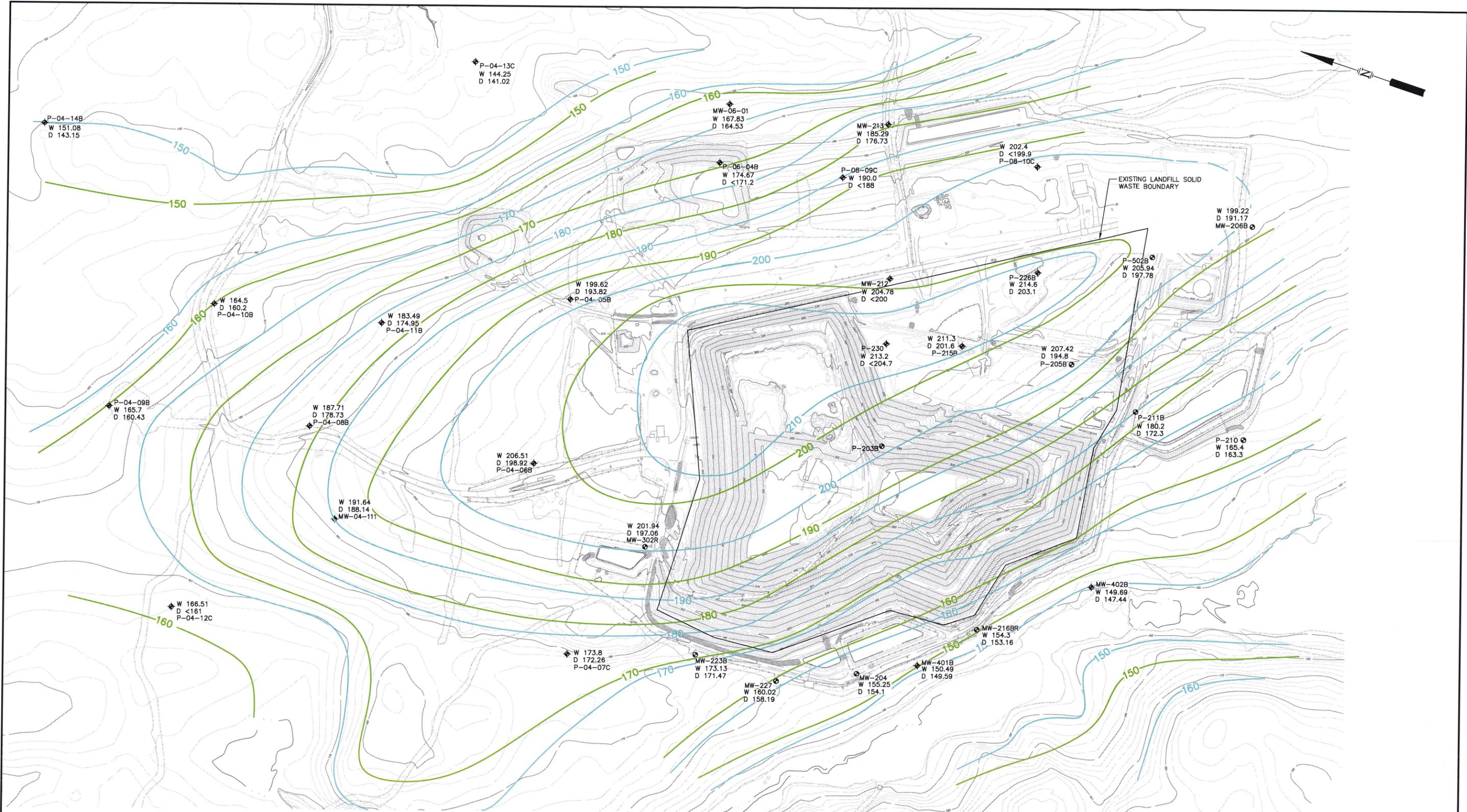
The existing JRL facility is located on the southwestern side of a northwest-southeast trending drumlin. The natural topography in the landfill area slopes downward to the southwest towards a large wetland and an unnamed stream which empties into Pushaw Stream (Class B). Pushaw Stream empties into the Stillwater River (Class B) which flows to the Penobscot River (Class B). Groundwater beneath the landfill is interpreted to follow the natural surficial topography and, therefore, generally flows towards the southwest and towards the unnamed stream. The large change in elevation from northeast to southwest across the landfill area results in upward groundwater seepage gradients near the unnamed stream and wetland area. Horizontal groundwater seepage gradients on the western side of the stream indicate that groundwater also moves from the west towards the stream, and, thus, the stream acts as a hydrologic boundary for groundwater flow from the landfill towards the west. The interpreted shallow groundwater phreatic surface and shallow bedrock groundwater potentiometric surface are

shown in Figures 1-4 and 1-5. The 2012 groundwater level data are generally consistent with the data utilized to construct these figures.

The site is underlain primarily by glacial till with marine clay of the Presumpscot Formation in the lower topographic areas (e.g., the wetlands in the southwestern portion of the site). Throughout the site, the glacial till generally consists of a very dense brown till, grading to very dense gray till with depth. The till typically ranges from 20 to 50 feet thick beneath the landfill and, thus, provides a natural containment layer for the landfill. In addition, there are several isolated, discontinuous washed till zones found beneath the till.

Bedrock beneath the facility has been identified as a light gray and brown metagraywacke and metaquartzite interbedded with dark gray phyllite. The metasediments are typically competent and unfoliated except for zones within the phyllite. The bedrock is mostly unweathered, although some discontinuous weathered zones have been observed. No faulting has been observed in bedrock cores and there are no faults mapped in the vicinity of the site. The bedrock surface beneath the landfill is locally variable; however, the surface generally slopes towards the southeast towards a bedrock trough that exists in the vicinity of the wetlands and unnamed stream at the southwest corner of the site. There are locations outside of the landfill boundary where no soil is present and bedrock is exposed at the ground surface. This is the case on the northwestern corner of the site adjacent to storm water Detention Pond #5.

Based on measured hydraulic conductivities at the site, horizontal hydraulic conductivities of the till vary between around  $10^{-7}$  to around  $10^{-5}$  cm/sec, resulting in estimated horizontal groundwater seepage rates from about 1 foot/year to about 40 feet/year. Slightly higher hydraulic conductivities were measured in the discontinuous washed till, which result in estimated localized horizontal groundwater seepage velocities ranging from 50 to 200 feet per year in the washed till. Measured hydraulic conductivities of the bedrock range from around  $10^{-7}$  to upper  $10^{-3}$  cm/sec resulting in estimated horizontal groundwater seepage rates of less than 1 foot per day to 40 feet per day in the bedrock fractures.



**NOTES**

1. EXISTING GROUND CONTOURS FROM NOVEMBER 6, 2012 AERIAL SURVEY PERFORMED BY AERIAL SURVEY AND PHOTO, INC. OF NORRIDGEWOCK, MAINE.
2. PROPERTY LINE LOCATIONS ARE A RESULT OF FIELD SURVEY PERFORMED BY HERRICK AND SALSBURY, INC. LAND SURVEYORS, ELLSWORTH, MAINE FOR TRYTON TREE FARM PROJECT, PATTEN CORPORATION-DOWNEAST, OLD TOWN, MAINE, FEBRUARY 23, 1988, REVISED APRIL 7, 1988.
3. LOCATIONS OF EXPLORATIONS ARE APPROXIMATE.
4. GROUND WATER CONTOURS BASED ON WATER LEVEL MEASUREMENTS RECORDED DURING 2007, AND FROM HISTORICAL DATA FOR SOME LOCATIONS BEYOND THE EXPANSION FOOTPRINT.

**LEGEND**

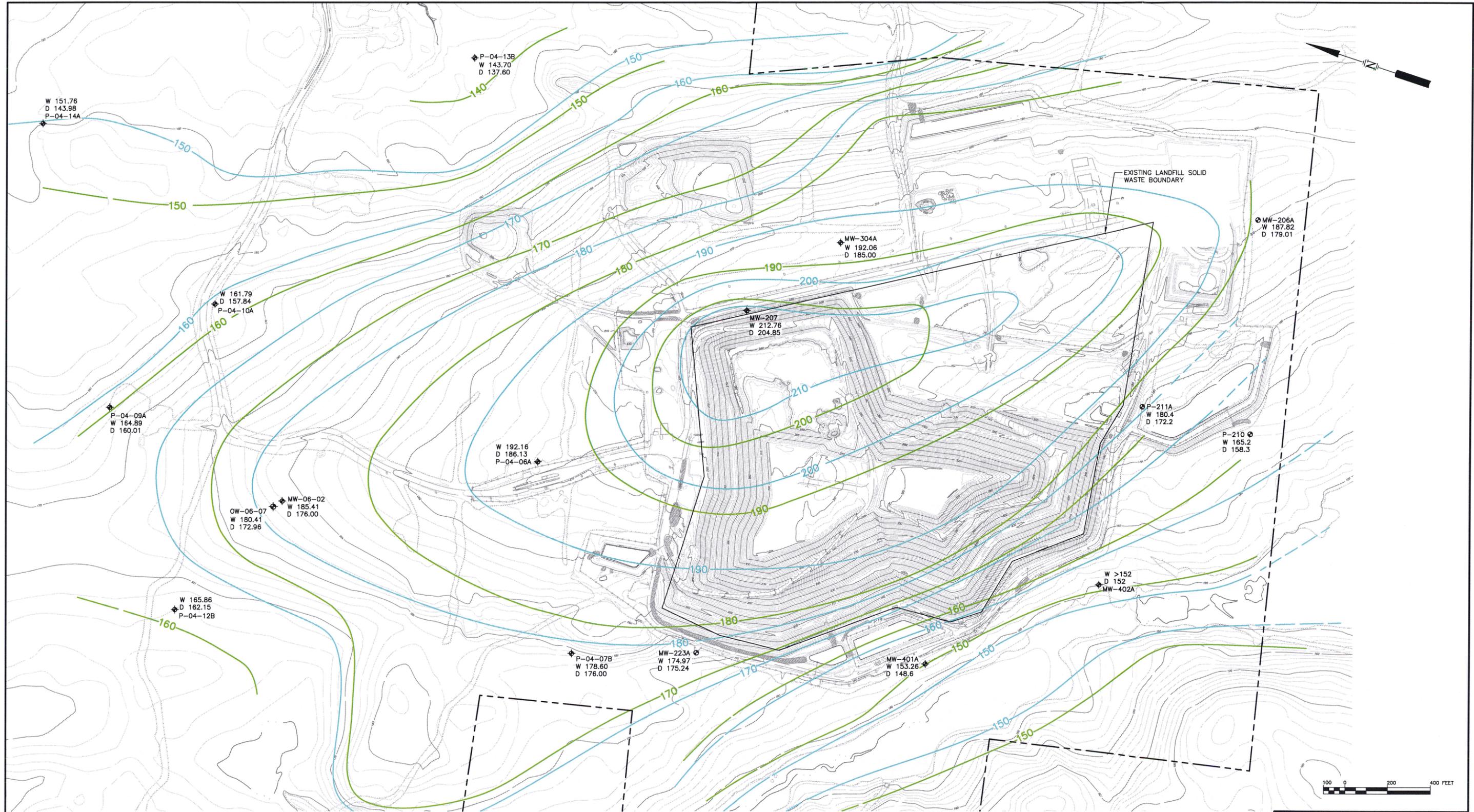
- 150— INTERPRETED WET-SEASON POTENTIOMETRIC SURFACE, (2007) IN BEDROCK (ELEVATION IN FEET NGVD).
- 150— INTERPRETED DRY-SEASON POTENTIOMETRIC SURFACE, (2007) IN BEDROCK (ELEVATION IN FEET NGVD).
- MW-227  
W 160.02  
D 158.19
- WELL/PIEZOMETER LOCATION WITH ELEVATION OF GROUNDWATER FOR WET (W) AND DRY (D) SEASON.



**FIGURE 1-4**  
**INTERPRETED PHREATIC SURFACE**  
**JUNIPER RIDGE LANDFILL**  
**OLD TOWN, MAINE**

**SME**  
 Sevee & Maher Engineers, Inc.  
 ENVIRONMENTAL • CIVIL • GEOTECHNICAL • WATER • COMPLIANCE  
 4 Blanchard Road, PO Box 85A, Cumberland Center, Maine 04021  
 Phone 207.829.5016 • Fax 207.829.5692 • www.smemaine.com

\\server\cfs\Casella\OldTown\landfill\expansion\Acad\2009-Design\Figures\FIGURES.dwg, 2/1/2013 9:12:45 AM, .pat



**NOTES**

1. EXISTING GROUND CONTOURS FROM NOVEMBER 6, 2012 AERIAL SURVEY PERFORMED BY AERIAL SURVEY AND PHOTO, INC. OF NORRIDGEWOCK, MAINE.
2. PROPERTY LINE LOCATIONS ARE A RESULT OF FIELD SURVEY PERFORMED BY HERRICK AND SALSBURY, INC. LAND SURVEYORS, ELLSWORTH, MAINE FOR TRYTON TREE FARM PROJECT, PATTEN CORPORATION-DOWNEAST, OLD TOWN, MAINE, FEBRUARY 23, 1988, REVISED APRIL 7, 1988.
3. LOCATIONS OF EXPLORATIONS ARE APPROXIMATE.
4. GROUND WATER CONTOURS BASED ON WATER LEVEL MEASUREMENTS RECORDED DURING 2007, AND FROM HISTORICAL DATA FOR SOME LOCATIONS BEYOND THE EXPANSION FOOTPRINT.

**LEGEND**

- 150 — INTERPRETED WET-SEASON POTENTIOMETRIC SURFACE, (2007) IN BEDROCK (ELEVATION IN FEET NGVD).
- 150 — INTERPRETED DRY-SEASON POTENTIOMETRIC SURFACE, (2007), IN BEDROCK (ELEVATION IN FEET NGVD).
- |  |   |
|--|---|
| <p>MW-223A<br/>W 174.97<br/>D 173.04</p> | <p>WELL/PIEZOMETER LOCATION WITH ELEVATION OF GROUNDWATER FOR WET (W) AND DRY (D) SEASON.</p> |
|--|---|

**FIGURE 1-5**  
**INTERPRETED POTENTIOMETRIC SURFACE IN BEDROCK JUNIPER RIDGE LANDFILL OLD TOWN, MAINE**

**SME**  
 Sevee & Maher Engineers, Inc.  
 ENVIRONMENTAL • CIVIL • GEOTECHNICAL • WATER • COMPLIANCE  
 4 Blanchard Road, PO Box 85A, Cumberland Center, Maine 04021  
 Phone 207.829.5016 • Fax 207.829.5692 • www.smeinc.com

I:\nserver\csc\casella\oldtown\landfill\expansion\acad\2009-design\figures\figures.dwg, 2/1/2013 9:29:47 AM, .pdf

## **2.0 MONITORING LOCATIONS**

### **2.1 2012 Monitoring Locations**

In 2012, water quality samples were collected during sampling events from 23 groundwater monitoring wells, three pore-water sample locations, five surface water locations, nine<sup>1</sup> underdrain locations, one leak detection location, and one leachate monitoring location. These monitoring points are summarized in Table 2-1 and Table 2-2 and their locations are shown in Figures 1-2 and 1-3. Groundwater, surface water, leachate, leak detection, and underdrain samples from the landfill site were collected in April, July, and October 2012. Measurement of field parameters (e.g., temperature and specific conductance) at the underdrain locations were completed on a monthly basis.

### **2.2 Groundwater Locations**

Groundwater samples were collected from 23 monitoring wells during each of the sampling events in 2012. Monitoring wells MW-206, MW11-207R, MW-212, MW-303/MW-303R, and MW-304A are positioned upgradient of the landfill. Monitoring well MW-303 was damaged during 2012 during construction activities related to the gas flare pad in the area of the well. The site gas flare will be installed at this location in 2013. This well was replaced, with the approval of the Maine Department of Environmental Protection (MEDEP), with monitoring well MW12-303R, which is located in the same geologic formation (till) upgradient of the landfill. Sampling of MW12-303R was initiated in October 2012.

Monitoring locations MW-204, MW-216BR, MW-223A, MW-223B, MW-227, MW-301, MW-401A, MW-401B, MW-402A, MW-402B, and MW09-901 are positioned downgradient of the landfill. Monitoring wells P-04-02, P-04-04, MW04-102, MW04-105, MW04-109R, and DP-4 are located in the proximity of the leachate pond and are also downgradient of the landfill. Monitoring well MW-302R (the replacement well of MW-302) is considered to be side-gradient to the landfill directly adjacent to storm water Detention Pond #5.

Stream-based pore-water sample locations PWS10-1, PWS10-2, and PWS10-3 were added to the groundwater monitoring program in April 2010. The pore-water sample locations are located downgradient of the landfill along the unnamed tributary to Pushaw Stream and represent groundwater in the sediments at the base of the stream. Information on the geologic formation in which each monitoring well is screened, as well as the elevation and distance below ground of each screened interval, is listed in Table 2-1.

---

<sup>1</sup> Not including composite samples taken at Manhole #5 and Manhole #7, if required see description of LF-COMP and LP-COMP on Table 2-2.

**TABLE 2-1  
GROUNDWATER MONITORING LOCATIONS**

<b>Monitoring Well</b>	<b>Position Relative to Landfill</b>	<b>Screen Depth Interval (feet-BGS)</b>	<b>Ground Surface Elevation (ft-MSL)</b>	<b>Screen Interval Elevation (ft-MSL)</b>	<b>Geologic Formation Screened</b>
MW-204	Downgradient	13.8 – 18.8	164.0	150.2 – 145.2	Till
MW-206	Upgradient	15.0 – 20.0	200.9	185.9 – 180.9	Till
MW11-207R	Upgradient	39.5 – 44.5	212.5	173.0 – 168.0	Bedrock
MW-212	Upgradient	12.0 – 17.0	217.0	205.0 – 200.0	Till
MW-223A	Downgradient	28.0 – 33.0	173.4	145.4 – 140.4	Bedrock
MW-223B	Downgradient	12.6 – 17.6	173.3	160.7 – 155.7	Till
MW-227	Downgradient	15.0 – 20.0	160.8	145.8 – 140.8	Till
MW-301	Downgradient	162.7 – 182.7	163.5	0.8 – -19.2	Bedrock
MW-302R	Side-gradient	19.5 – 29.5	204.5	185.0 – 175.0	Bedrock
MW-303	Upgradient	34.7 – 44.7	205.3	170.6 – 160.6	Till
MW12-303R	Upgradient	30.4 – 40.4	206.1	175.7 – 165.7	Till
MW-304A	Upgradient	29.5 – 39.5	214.7	185.2 – 175.2	Bedrock
MW-401A	Downgradient	98.8 – 108.8	153.6	54.8 – 44.8	Bedrock
MW-401B	Downgradient	10.0 – 20.0	154.2	144.2 – 134.2	Till
MW-402A	Downgradient	95.5 – 105.5	149.3	53.8 – 43.8	Bedrock
MW-402B	Downgradient	12.0 – 22.0	149.7	137.7 – 127.7	Till
DP-4	Downgradient (In proximity of leachate pond)	18.5 – 24.5	165.5	147.0 – 141.0	Till
P-04-02	Downgradient (In proximity of leachate pond)	(32.11 – 37.11) <sup>1</sup>	166.1	136.6 – 131.6	Till
P-04-04	Downgradient (In proximity of leachate pond)	(27.21 – 32.21) <sup>1</sup>	166.7	142.1 – 137.1	Till
MW04-102	Downgradient (In proximity of leachate pond)	10.0 – 15.0	167.0	157.0 – 152.0	Till
MW04-105	Downgradient (In proximity of leachate pond)	14.8 – 19.8	162.2	147.4 – 142.4	Till
MW04-109R	Downgradient (In proximity of leachate pond)	15.0 – 20.0	157.1	142.1 – 137.1	Till
MW-216BR	Downgradient	14.6 – 19.6	156.2	141.6 – 136.6	Till
MW09-901	Downgradient	15.0 – 20.0	161.9	146.9 – 141.9	Till
PWS10-1 <sup>2</sup>	Downgradient	about 12 to 18 inches	NA	NA	Stream Alluvium
PWS10-2 <sup>2</sup>	Downgradient	about 12 to 18 inches	NA	NA	Stream Alluvium
PWS10-3 <sup>2</sup>	Downgradient	about 12 to 18 inches	NA	NA	Stream Alluvium

**Notes**

1. Screened interval for P-04-02 and P-04-04 are from top of PVC well.
2. New probes installed for each sample event.

**TABLE 2-2**

**SURFACE WATER, LEACHATE, UNDERDRAIN, AND LEAK DETECTION MONITORING LOCATIONS**

<b>Location Designation</b>	<b>Water Body Description</b>	<b>Position Relative To Landfill</b>
SW-1	Unnamed tributary of Pushaw Stream	Downstream
SW-2	Unnamed tributary of Pushaw Stream	Upstream
SW-3	Unnamed tributary of Pushaw Stream	Downstream
SW-DP1	Storm Water Detention Pond #1	Detention pond
SW-DP6	Storm Water Detention Pond #6	Detention pond
LF-UD-1	Cell 1 underdrain at MH #5	Underdrain
LF-UD-2	Cell 2 underdrain at MH #5	Underdrain
LF-UD-3A,B	Cell 3A & Cell 3B underdrain at MH #5	Underdrain
LF-UD-4	Cell 4 underdrain at MH #5	Underdrain
LF-UD-5and6	Cell 5 & Cell 6 Underdrain (combined flow)	Underdrain
LF-UD-6	Cell 6 Underdrain	Underdrain
LF-UD-7	Cell 7 Underdrain at MH #5	Underdrain
LF-UD-8	Cell 8 Underdrain	Underdrain
LP-LD-1	Leachate pond leak detection at MH #1	Leachate pond leak detection
LP-UD-1	Leachate pond underdrain south end at MH #7	Leachate pond underdrain
LP-UD-2	Leachate pond underdrain north end at MH #7	Leachate pond underdrain
LF-COMP	Composite sample of LF-UD-1, LF-UD-2, LF-UD-3A,B, LF-UD-4, and LF-UD-7 when water level in manhole covers the inlet pipes at MH #5	Underdrain
LP-COMP	Composite sample of LP-UD-1 and LP-UD-2 when water level in manhole covers both of the inlet pipes at MH #7	Underdrain
LT-C4L	Leachate – Cell 4 pump station	Leachate

2.3 Surface Water Locations

Surface water samples were collected at five locations in 2012. SW-1, SW-2, and SW-3 are collected at the unnamed tributary to Pushaw Stream. SW-1 and SW-3 are located downstream of the landfill while SW-2 is located upstream of the landfill. SW-DP1 and SW-DP6 are collected at storm water Detention Pond #1 and storm water Detention Pond #6, respectively.

2.4 Leachate Sample Locations

During 2012, leachate samples were collected from the Cell 4 leachate pump station designated as LT-C4L. The location of LT-C4L is shown on Figure 1-3. Use of the leachate pond as the primary onsite leachate storage structure was discontinued with the construction of Cell 4 during the summer of 2008, resulting in elimination of the pond’s pump station sampling location SW-LCD. All leachate generated from Cells 1, 2, 3A, 3B, 4, and 7 flows to the Cell 4 pump station

where it is pumped to the site's above ground leachate storage tank. Leachate generated in Cell 5 and Cell 6 flows to the Cell 5 pump station where it is pumped directly to the site's aboveground leachate storage tank. Leachate from Cell 8 flows to the newly constructed Cell 8 pump station where it is pumped to the site's above ground leachate storage tank. Leachate samples associated with compliance monitoring for off-site wastewater treatment are collected at the leachate storage tank loading rack when transport tanker trucks are being loaded.

## 2.5 Leachate Pond Leak Detection Monitoring

The leachate pond's leak detection manhole (MH #1) is located outside the northwest corner of the leachate pond. This location is called LP-LD-1 and monitors the leak detection layer of the leachate pond. During 2012, tri-annual water quality field parameters were collected at this location.

As previously discussed, use of the leachate pond to store leachate was discontinued with the construction of Cell 4 in 2008. The pond is currently used as a stormwater detention pond for the collection of clean surface water runoff from covered areas of the landfill. Future monitoring of the leachate pond's leak detection system will involve the collection of only field parameters during the tri-annual monitoring of the site until the pond is again used to store leachate.

## 2.6 Underdrain Monitoring

The sample locations where underdrain samples were collected in 2012 are shown on Figures 1-2 and 1-3. The landfill underdrain system supplements as a cell leak detection system. Manhole MH #5, located northeast of the leachate pond, is the sample location which receives groundwater entering the underdrains beneath Cells 1, 2, 3A, 3B, 4, and 7. The underdrain for Cell 6 is sampled from a stilling well in the underdrain line. Flow from the Cell 6 underdrain is then connected to the Cell 5 underdrain line. The combined flow from the Cell 5 and Cell 6 underdrains then drains to a 6-inch diameter pipe outfall located on the southern perimeter of the landfill. Beginning in June 2010, samples collected from this 6-inch diameter pipe outfall are now a composite sample from the Cell 5 and Cell 6 underdrains (LF-UD-5 and

6); prior to June 2010, samples collected from this 6-inch diameter outfall pipe were for the Cell 5 underdrain only (LF-UD-5).

Underdrain samples were collected tri-annually for laboratory analysis and monthly for field parameters at sample locations LF-UD-1, LF-UD-2, LF-UD-3A,B, LF-UD-4, LF-UD-5 and 6, LF-UD-6, and LF-UD-7 during 2012, unless those locations were dry or their sample pipe inverts were submerged. The underdrain for Cell 8 was constructed in 2012 at a discrete location shown on Figure 1-2. Sampling of the Cell 8 underdrain is scheduled to begin in 2013.

Manhole location MH #7, which is located southwest of the leachate pond, is the sample location for LP-UD-1 and LP-UD-2, which monitor groundwater entering the southern and northern underdrains, respectively, of the leachate pond. LP-UD-1 and LP-UD-2 were monitored by SME tri-annually for laboratory parameters and monthly for field parameters by NEWSME in 2012. The leachate pond underdrain had previously been monitored continuously (i.e., daily average) for specific conductance; this continuous monitoring was ended in May 2012 since the leachate pond underdrain is now day-lighted and its water is not held for monitoring.

Historically, during times when LF-UD-1, LF-UD-2, LF-UD-3A,B, LF-UD-4, and LF-UD-7 were not able to be sampled separately due to pipe invert submergence, LF-COMP has been collected from the manhole MH #5. This sample provides a composite sample of the aforementioned underdrain locations. This condition occurred during the April 2012 monthly sampling event. LP-COMP samples were not collected during the tri-annual monitoring events in 2012 because the conditions did not exist where LP-UD-1 and LP-UD-2 were not able to be sampled separately due to pipe invert submergence. LP-COMP was sampled and monitored for field parameters during several of the monthly field parameter monitoring events.

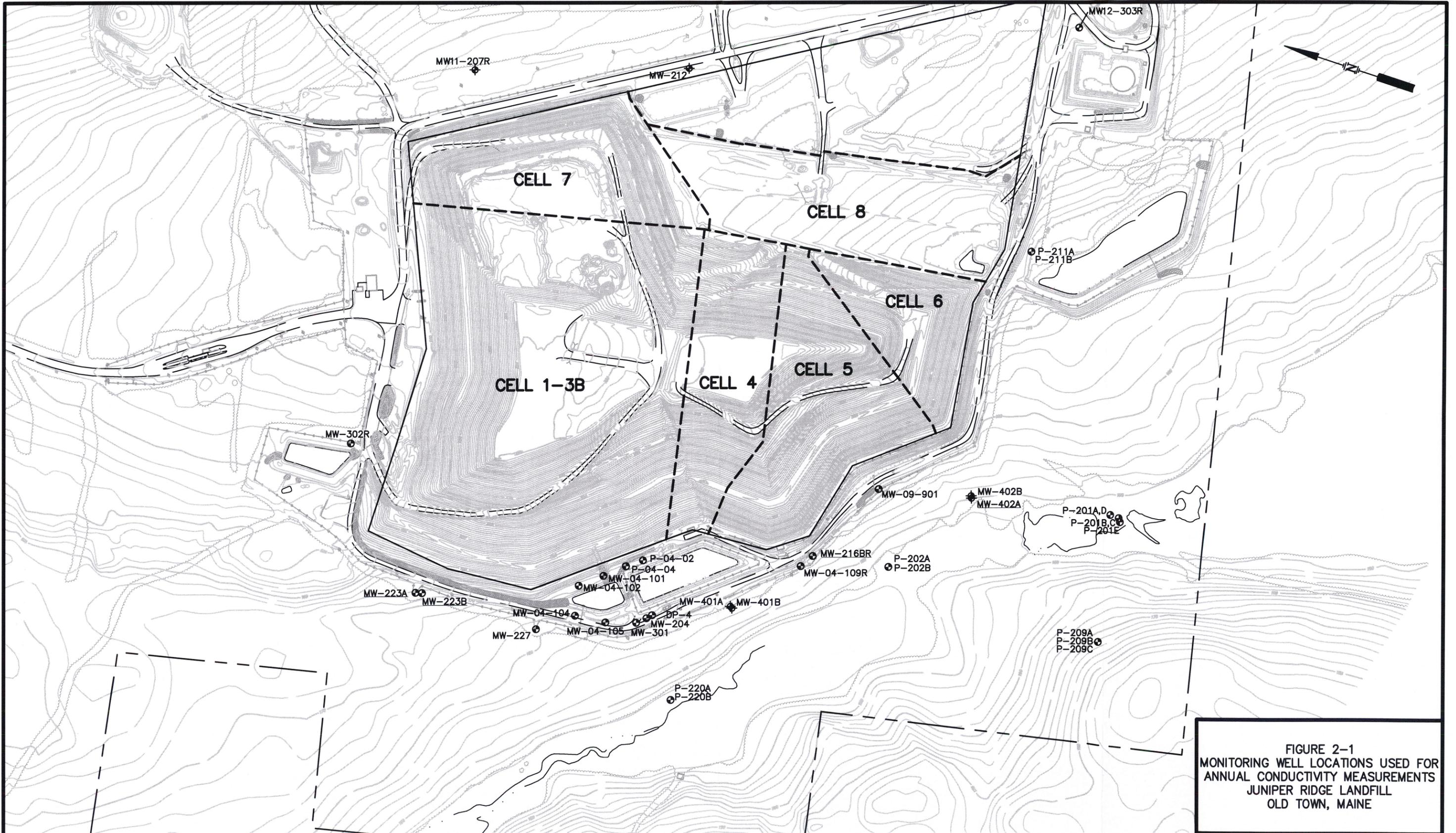
The results of the underdrain monitoring are discussed in Section 6.7.

It should also be noted that a correction was made to the SME database in regard to the Cell 3A and Cell 3B underdrain locations. Previously, the SME database had reported separate locations for Cell 3A (LF-UD-3A) and Cell 3B (LF-UD-3B), with the sample location for LF-UD-

3B consistently reported as dry (i.e., no flow). The sample location previously identified as LF-UD-3A actually represents composite flow from Cell 3A and Cell 3B. The correction results in removing the previously named LF-UD-3B location from the database and renaming the LF-UD-3A location LF-UD-3A,B. Future data transmittals will reflect this change.

## 2.7 Annual Monitoring Well Specific Conductance Measurements

At the request of the MEDEP, specific conductance measurements were taken from an expanded select list of monitoring wells surrounding the existing landfill operations at JRL during the fall sample round of 2012. Locations measured annually for specific conductance are shown on Figure 2-1 and listed in Table 2-3 below. A summary report table for the specific conductance data collected at the site to date is contained in Appendix A.



**NOTES**

1. EXISTING GROUND CONTOURS FROM NOVEMBER 6, 2012 AERIAL SURVEY PERFORMED BY AERIAL SURVEY AND PHOTO, INC. OF NORRIDGEWOCK, MAINE.
2. PROPERTY LINE LOCATIONS ARE A RESULT OF FIELD SURVEY PERFORMED BY HERRICK AND SALSBUURY, INC. LAND SURVEYORS, ELLSWORTH, MAINE FOR TRYTON TREE FARM PROJECT, PATTEN CORPORATION-DOWNEAST, OLD TOWN, MAINE, FEBRUARY 23, 1988, REVISED APRIL 7, 1988.



**FIGURE 2-1  
MONITORING WELL LOCATIONS USED FOR  
ANNUAL CONDUCTIVITY MEASUREMENTS  
JUNIPER RIDGE LANDFILL  
OLD TOWN, MAINE**



ENVIRONMENTAL • CIVIL • GEOTECHNICAL • WATER • COMPLIANCE

**TABLE 2-3**

**MONITORING WELL AND PIEZOMETER LOCATIONS  
USED FOR ANNUAL SPECIFIC CONDUCTANCE MEASUREMENTS**

DP-4	MW11-207R <sup>1</sup>
MW04-101	P-04-02
MW04-102	P-04-04
MW04-104	P-201A
MW04-105	P-201B
MW04-109R	P-201C
MW-204	P-201D
MW09-901	P-201E
MW-216BR	P-202A
MW-223A	P-202B
MW-223B	P-209A
MW-227	P-209B
MW-301	P-209C
MW-302R	P-211A
MW12-303R <sup>2</sup>	P-211B
MW-401A	P-220A
MW-401B	P-220B
MW-402A	MW-212 <sup>1</sup>
MW-402B	-
<p><u>Notes:</u></p> <ol style="list-style-type: none"> <li>1. Monitoring locations MW11-207R and MW-212 were added to the locations for annual specific conductance measurements in 2011.</li> <li>2. MW12-303R was added to the locations for annual specific conductance measurements in 2012.</li> <li>3. Monitoring locations MW04-110, P-214A, P-214B, and P-214C are included in the EMP (April 2010) for annual specific conductance measurements, but have since been decommissioned.</li> </ol>	

## 2.8 Landfill Gas Monitoring Program

Concurrent with the site tri-annual water quality monitoring events, site monitoring wells, underdrain locations, leachate manholes, the leak detection manhole, and the JRL site property boundaries were monitored for the presence of landfill-related gases during 2012 using a hand-held, GEM 2000 gas meter. Figures 1-2 and 1-3 show the gas monitoring locations associated with the landfill's water quality monitoring program.

### **3.0 MONITORING PARAMETERS**

Detection monitoring was performed in 2012 at the locations contained in Tables 2-1 and 2-2. The majority of the locations listed in Tables 2-1 and 2-2 were analyzed for the detection monitoring parameters listed in Table 3-1 in April, July, and October 2012. As requested by the MEDEP, multiple locations (LF-UD-1, LF-UD-2, LF-UD-3A,B, LF-UD-4, LF-UD-5 and 6, LF-UD-7, LP-UD-1, LP-UD-2, DP-4, MW-204, P-04-02, and MW-401B)<sup>2</sup> were analyzed for volatile organic compounds (VOCs) during the April 2012 monitoring event, and leachate location LT-C4L was analyzed for VOCs during all three 2012 monitoring events. The leachate location (LT-C4L) was also analyzed for the parameters listed in Appendix A, Column 3 of the Chapter 405 MEDEP Solid Waste Regulations during the April 2012 sample event.

---

<sup>2</sup> In April 2012, the pipe invert for LF-UD-1, LF-UD-2, LF-UD-3A,B, LF-UD-4, and LF-UD-7 were submerged, and a LF-COMP sample was collected.

TABLE 3-1

2012 DETECTION MONITORING ANALYTICAL PROGRAM

Water Quality Parameter	Method	PQL <sup>1</sup> (mg/l)
Total Dissolved Solids	SM 2540C	10
Total Suspended Solids	SM 2540D	4
Tannins/Lignins	SM 5550B	0.20
Ammonia (NH <sub>3</sub> -N)	SM 4500 NH3 E/4500NH3 B	0.5
Arsenic (As)	SW846/6010B/3010A	0.005
Calcium (Ca)	SW846/6010B/3010A	0.3
Iron (Fe)	SW846/6010B/3010A	0.05
Magnesium (Mg)	SW846/6010B/3010A	0.3
Manganese (Mn)	SW846/6010B/3010A	0.05
Potassium (K)	SW846/6010B/3010A	0.3
Sodium (Na)	SW846/6010B/3010A	0.3
Total Organic Carbon (TOC)	SW846/9060A	2.0
Chloride (Cl)	SW846/9056	1.0
Sulfate (SO <sub>4</sub> )	SW846/9056	2.0
Nitrate (NO <sub>3</sub> -N)	SW846/9056	0.3
Bicarbonate (HCO <sub>3</sub> -CaCO <sub>3</sub> )	SM 2320B	1.5
Volatile Organic Compounds (VOCs) <sup>3,7</sup>	U.S.EPA 8260B	0.0005 – 0.01
Chemical Oxygen Demand (COD)	Hach 8000	10
Sulfide <sup>8</sup>	SW846/9030B	0.10
Total Kjeldahl Nitrogen (TKN) <sup>4</sup>	SM 4500 NORC	0.30
Total Phosphorous <sup>5</sup>	U.S.EPA 365.3	0.04
Biochemical Oxygen Demand (BOD) <sup>6</sup>	SM 5210B	2
Cadmium (Cd)	SW846/6010B/3010A	0.0006
Copper (Cu)	SW846/6010B/3010A	0.003
Nickel (Ni)	SW846/6010B/3010A	0.005
Field Parameters		
Groundwater Elevation	Field Measurement	NA
Specific Conductance	Field Measurement	NA
Dissolved Oxygen (DO)	Field Measurement	NA
pH	Field Measurement	NA
Eh	Field Measurement	NA
Temperature	Field Measurement	NA
Turbidity	Field Measurement (APHA 2130)	NA
Monitoring Well Pumping Rate	Field Measurement	NA
Surface Water Flow Rate	Field Measurement	NA
Field Observations	Visual Observations	NA
Total Alkalinity (as CaCO <sub>3</sub> )	Field Measurement	5
<p>Notes:</p> <ol style="list-style-type: none"> <li>At dilution factor of unity</li> <li>NA = Not Applicable.</li> <li>VOCs are the 47 organic constituents listed in Appendix I of 40 CFR Part 258. PQLs for VOCs are reported at a dilution factor of unity.</li> <li>Monitoring wells and leachate only.</li> <li>Surface waters and underdrain only.</li> <li>Surface waters only (excluding stormwater detention ponds and underdrains).</li> <li>In April 2012, LF-COMP, MW-401B, LF-UD-5and6, LF-UD-6, LP-UD-2, DP-4, P-04-02, and MW-204 were analyzed for VOC compounds. Leachate location LT-C4L was analyzed for VOC compounds during all three monitoring events in 2012.</li> <li>In April 2012, leachate was analyzed for Appendix A, Column 3 parameters (from Chapter 405 MEDEP Solid Waste Regulations), including sulfide.</li> </ol>		

## **4.0 SAMPLING TECHNIQUES**

### **4.1 Monitoring Wells**

Groundwater samples were obtained from the monitoring wells utilizing the low-flow sample collection techniques in general accordance with the current EMP for the landfill (revised April 2010). The low-flow sampling program includes dedication of a small-diameter (1/8-inch I.D.) polyethylene tubing in each well. The tubing is secured at the top of the well such that the inlet of the tubing is placed approximately at the middle of the screen zone in each well. Prior to sampling, the static water level is measured in each well. A peristaltic pump with an adjustable flow rate is used to purge and sample monitoring wells with relatively shallow water tables. Monitoring wells with water tables greater than 28 feet below ground surface are sampled with dedicated deep well submersible pumps rather than a peristaltic pump due to the depth of the groundwater.

The low-flow sampling procedure at the JRL consists of purging the monitoring well at approximately 100 to 200 ml/min. While the wells are purged, water levels and measurements of the following parameters are taken through a flow-through-cell at regular intervals: specific conductance, temperature, pH, Eh, dissolved oxygen, and turbidity. Field parameters as well as water level measurements are monitored to determine if parameter stabilization has occurred as outlined in the EMP. Once stabilization of the field parameters has occurred, in particular water levels and turbidity, a sample is collected for chemical analysis. Several of the wells have very low recharge rates and, therefore, do not stabilize even under low purge rates. For these wells, a sample is obtained after purging the liquid present in the sampling tube and pump.

### **4.2 Surface Water Underdrain, Leak Detection, and Sampling Leachate Locations**

Grab samples are collected at the surface water, underdrain, leak detection, and leachate sampling locations, which is consistent with historical sampling methods and in accordance with the EMP. These samples are not filtered prior to analysis.

### **4.3 Gas Monitoring**

Gas monitoring at the monitor wells and underdrain locations was done using a GEM 2000 gas meter manufactured by Landtec of Colton, California with an auxiliary H<sub>2</sub>S pod. Measurement of headspace gas in the monitoring wells is measured by placing the probe tip into the upper few inches of the well casing immediately after the well cap is removed. Gas measurements at underdrain locations are measured by placing the probe at the manhole opening where underdrain samples are collected. The meter is calibrated daily before use. Methane, carbon dioxide, and oxygen are reported as percent by volume. Hydrogen sulfide is reported in parts per million by volume.

#### 4.4 Sample Handling and Chain-of-Custody

After collecting the water quality samples, the samples were preserved on ice in coolers and shipped by SME to Maine Environmental Laboratory of Yarmouth, Maine for analyses. Analytics Environmental Laboratory, LLC in Portsmouth, New Hampshire performed the VOC analyses. Katahdin Analytical Services of Scarborough, Maine performed the semi-volatile organic compounds (SVOCS), pesticides, herbicides, and polychlorinated biphenyls (PCBs) analyses for the spring (April) 2012 sampling event. Chain-of-custody sheets prepared by the sampling personnel accompanied the samples and contain the signatures documenting the transfer of the water quality samples from the field sampler to the receiving laboratory.

## **5.0 DATA VALIDATION AND QUALITY CONTROL (QC)/QUALITY ASSURANCE (QA)**

QA/QC activities associated with sampling include the utilization of standardized collection procedures and sample data records, calibration of field instruments, and the use of chain-of-custody procedures. SME followed EMP (revised April 2010) procedures to ensure that both the field instruments and protocols employed generate data that is reliable and provided valid analysis results; instruments were calibrated, analyses were conducted to determine potential matrix interference as necessary, precision and accuracy were checked, and hold-times were verified. Analytical QA/QC involves the use of approved analytical protocols by a qualified laboratory. Water quality samples were all analyzed within the required hold-times.

Data validation and laboratory quality control procedures were followed and documented as described in the MEDEP Solid Waste Management Rules, Chapter 405. During 2012 sampling rounds, duplicate water quality samples were obtained from several monitoring locations, as discussed in water quality data submittals for each round. Reports on Relative Percent Difference (RPD), calculated ratios of TDS to specific conductance, and values falling outside of historic ranges for each sampling round were presented in each of the three data transmittals provided in 2012.

## **6.0 WATER QUALITY EVALUATION**

Groundwater and surface water quality samples were collected at monitoring locations designated in the EMP (revised April 2010) during April, July, and October 2012. Laboratory analytical reports, field data sheets, and data validation documentation have been presented in tri-annual data submittals forwarded to MEDEP during 2012 for each sampling round.

Noteworthy observations in the data for 2012 have been identified and are reported below for groundwater monitoring locations (Section 6.1), surface water monitoring locations (Section 6.2), leachate monitoring (Section 6.3), leak detection monitoring (Section 6.4), and underdrain monitoring (Section 6.5). Appendix B contains tables of water quality data collected from 1990 through 2012 for the sampling locations and parameters identified in this report. Water quality data not specifically referenced in this report are considered to be generally consistent with the previously collected water quality data for the JRL and are not changing significantly over time. The methods used for analyzing the water quality data in 2012 are summarized below.

**Box and Whisker Plots and Data Summary Sheets.** 2012 water quality data for each monitoring location are summarized in the data summary sheets contained in Appendix C of this document. The summary sheet prepared for each sampling location contains a map and description of the monitoring point, a 2012 water quality data summary, and a statistical summary of the historic data prior to 2012.

Also included in Appendix C are box and whisker plots of select monitoring parameters for each of the sampling locations. The box and whisker plots graphically illustrate the annual concentration ranges and annual median value for the analytical results of each parameter, and also provide a useful way to visually identify long-term and short-term trends in the water quality data. Where long-term trends occur in the data, the trends are typically visually detectable on the plots. Plotting the range of annual values on the box and whisker plots also provides a sense of the variability of the annual data (statistically expressed as a standard deviation) and whether or not an apparent trend may be real or lies within the inherent variability of the data. Visual observation of water quality trends over time using the historical data (including 2012 data) is aided by using a fast-Fourier transform regression of each of the summary parameter

annual mean concentration values. A graph of the fast-Fourier regression accompanies the box and whisker plots in Appendix C.

**Mann-Kendall Trend Analyses.** Mann-Kendall trend analyses were run for the JRL water quality data to screen for potential statistically significant changes in water quality parameter concentrations over time. The Mann-Kendall analysis was chosen because it is nonparametric and is robust to outliers, missing data, and non-detects. Time-series plots of water quality parameter concentrations often contain multiple trends over time due to various factors. In order to evaluate current trends for this annual report, the Mann-Kendall trend analyses were run for the site data over two time periods; from the end of 2012 back five years and three years. The three-year and five-year timeframes are suitable for evaluating landfill performance and changes in water quality related to recent site operations and clearly identify ongoing trends.

The Mann-Kendall test was run with a 0.05 Type-I error (i.e., 95% confidence level). For this evaluation, we consider a statistically significant trend to be one in which the potential Type-I error is less than 0.05. The Mann-Kendall results for groundwater, surface water, leachate, leak detection, and underdrain locations are included in Appendix D and are discussed by location in Sections 6.1 through 6.5. It should be noted that trend analyses resulting from analytical data that is always or almost always non-detect are at times positive for increasing or decreasing trend screenings due to changes in the laboratory detection limit reported. In those cases, those trends are interpreted and reported as no trends; these instances are identified in Appendix D. This occurrence is frequent for JRL site water quality due to the generally low parameter concentrations in groundwater at the site. Examples of parameters for which this occurs frequently include ammonia and nitrate, which are typically non-detect at most groundwater monitoring locations, but had increased reporting limits in 2012.

The trend analysis is used as one of the screening tools to review the water quality and must be viewed in conjunction with other factors such as the specific parameter exhibiting the trend and the parameter concentration detected at the monitoring locations (i.e., a specific parameter could have an increasing trend, but remain within a range consistent with upgradient concentrations). The results of the trend screening analyses are compared visually with the

time-series plots (box and whisker plots) described above to aid in assessing the actual significance of statistical trend.

Although rapid increases in concentrations of multiple parameters at a monitoring location may reflect site operational impact such as spillage of leachate or a landfill liner failure, changes in one or only a few parameters at a given monitoring location are also potentially the result of changes in groundwater conditions unrelated to the landfill leachate (e.g., decreases in natural precipitation recharge to the groundwater will change redox, alkalinity, and pH conditions, which allows the release of various constituents such as iron, manganese, and arsenic from soils and bedrock into the groundwater). Generally, at a given monitoring well, an increase in landfill leachate contribution should result in increased chloride concentrations due to its presence at high concentrations in the JRL leachate (i.e., between 2,560 mg/L to 21,500 mg/L at LT-C4L since sampling began at that location in April 2009) and the conservative nature of chloride in terms of adsorption, precipitation, and degradation. Therefore, sudden increases in chloride concentration is believed to be a reliable indicator of landfill impacts resulting from the presence of JRL leachate assuming that no other natural or anthropogenic sources of chloride are present. Specific conductance is also a useful parameter for assessing water quality across the site as it gives an indication of the total dissolved constituents at each monitoring location. Nearly all other chemical constituents are subject to changes in concentrations resulting from interactions between soil, rock, and groundwater in addition to the presence of leachate. It is important to note, however, that increases in chloride may also be due to runoff and recharge from salting or dust control of nearby roadways. Therefore, increases in multiple (4 or more) parameters, especially when including chloride, are believed to be the most reliable indicator of *potential* landfill leachate impacts that require further investigation. At these locations, further analysis of water quality data is completed to ascertain the potential causes for the change in water quality.

**Concentrations above MCL, MEG, MFCCC.** Parameters measured at the site groundwater monitoring wells and pore-water sample locations that were above their U.S. EPA Maximum Contamination Levels (MCLs) or Maine Maximum Exposure Guidelines (MEGs) during 2012 are identified in detail Sections 6.1 and 6.2. In summary, only one parameter (i.e., arsenic) of the parameters analyzed at groundwater monitoring locations, was detected above an MCL in 2012.

Arsenic concentrations were detected above their MCL at eight locations during one or more monitoring event in 2012. Although arsenic concentrations were above the arsenic MCL at multiple locations, the arsenic levels at the site (reported as high as 0.021 mg/L in 2012 at MW-402A in July 2012) are consistent with arsenic concentrations occurring naturally in Maine groundwater and are not interpreted as impact from the landfill (Ayotte, Montgomery, Flanagan and Robinson, 2003. Arsenic in Groundwater in Eastern New England: Occurrence, Controls and Human Health Impacts; Loiselle, Marvinney and Smith, 2001. Spatial Distribution of Arsenic in Ground Water Wells in Maine; Ayotte, Nielson, Robinson, and Moore, 1999. Relation of Arsenic, Iron, and Manganese in Ground Water to Aquifer Type, Bedrock Lithochemistry and Land Use in the New England Coastal Basins). Only three parameters (i.e., arsenic, manganese, and sodium) were detected at concentrations above an MEG in 2012. Manganese and sodium were above their respective MEGs at only two locations each. The sample results did not detect concentrations of nitrate, cadmium, copper, iron, nickel, ammonia, or VOCs<sup>3</sup> above their respective MCL or MEG at the groundwater monitoring locations sampled in 2012.

Parameters measured at the site surface water monitoring locations that were above their Maine Freshwater Criterion Continuous Concentrations (MFCCCs) are identified in detail in Section 6.2. In summary, MFCCCs cadmium, copper, and iron were above their respective MFCCCs at multiple surface water monitoring locations in 2012. There were no MFCCC exceedances for chloride, arsenic, nickel, or ammonia at any of the surface water monitoring locations in 2012.

## 6.1 Groundwater Quality

6.1.1 Bedrock Groundwater. Groundwater quality in the bedrock is measured at seven monitoring wells. Bedrock groundwater upgradient of the site is monitored at MW-304A and MW11-207R. Both upgradient bedrock groundwater monitoring wells are currently located in areas that have not been disturbed by site operations, and are presently considered to be unaffected by both landfill leachate and landfill operations. Bedrock groundwater downgradient of the landfill area is monitored at MW-223A, MW-301, MW-401A, and MW-402A. Monitoring

---

<sup>3</sup> Groundwater analyses for VOCs occurs only at DP-4, P-04-02, MW-204, and MW-401B.

well MW-302R monitors groundwater along the northwestern side of the landfill and is interpreted to be cross-gradient of the landfill rather than downgradient. Notable observations in bedrock groundwater quality during 2012 are as follows:

#### 6.1.1.1 Upgradient Bedrock Groundwater Monitoring Wells

- MW11-207R is located outside of the construction and operational area of the landfill and replaced MW-207 in 2011. Consistent with the 2011 data, there were no exceedances of MCLs or MEGs for parameters analyzed at MW11-207R in 2012. Water quality at MW11-207R in 2012 was consistent with data from the fall round of 2011. The 2012 annual maximum specific conductance value of 103  $\mu\text{mhos/cm}$  and chloride concentration of 2.1 mg/L at MW11-207 were very low and in the range expected in an upgradient groundwater monitoring well.

Monitoring well MW-304A is located upgradient from the landfill and outside of the area of landfill construction. There were no MCL or MEG exceedances of analyzed parameters at MW-304A in 2012. In 2012 and historically, groundwater quality data from MW-304A has not indicated influence from site activities. The Mann-Kendall analyses indicate that there are no statistically significant increasing or decreasing trends (95% confidence level) for multiple parameters (4 or more) at MW-304A for 5-year or 3-year periods from the end of 2012. The 2012 annual maximum specific conductance value of 141  $\mu\text{mhos/cm}$  and chloride concentration of 1.9 mg/L at MW-304A were very low and in the range expected in an upgradient groundwater monitoring well.

#### 6.1.1.2 Downgradient Bedrock Groundwater Monitoring Wells

- Water quality from downgradient bedrock monitoring well MW-223A includes parameter concentrations greater than those at the upgradient bedrock monitoring wells. There were no MCL or MEG exceedances of analyzed parameters at MW-223A in 2012; however, MW-223A has statistically significant increasing trends (95% confidence level) for chloride, specific conductance,

arsenic, calcium, magnesium, potassium, sodium, total dissolved solids, bicarbonate, and turbidity for the past five years. Similarly, eight parameters, including chloride, have statistically significant increasing trends (95% confidence level) over the past three years at MW-223A. Six parameters were detected at new historic maximum values during one or more sampling event in 2012, including specific conductance, alkalinity, calcium, total dissolved solids, and chloride.

Multiple parameter concentrations have increased in recent years at MW-223A. Review of the data indicates that the increases are subtle between about 2007 and the end of 2008, and more pronounced since 2009. The annual maximum specific conductance value and chloride concentration in 2012 at MW-223A were 400  $\mu\text{mhos/cm}$  and 24.4 mg/L, respectively, which were both historic maximum concentrations at this location. In comparison, these values were 189  $\mu\text{mhos/cm}$  (specific conductance) and 2.6 mg/L (chloride) during the October 2008 sampling event. In our evaluation of MW-223A water quality in 2011,<sup>4</sup> we noted that its parameter concentrations and trends were not dissimilar to what has been observed historically at some upgradient groundwater quality monitoring wells located in both the overburden and the bedrock (e.g., MW-303, MW-207, and MW-212).

While these changes do suggest that something is affecting water quality in this well, the current specific conductance and chloride levels do not suggest landfill leachate impact. Comparison of MW-223A to landfill leachate collected from LT-C4L is illustrated on a piper diagram for July 2012 water quality data on Figure 6-1. The diagram indicates that water quality at MW-223A in July 2012 still remains generally similar to upgradient groundwater monitoring locations and

---

<sup>4</sup> SME 2012, Juniper Ridge Landfill, NEWSME Landfill Operations, LLC 2011 Annual Water Quality Report.

# Piper Diagram Casella - July 2012

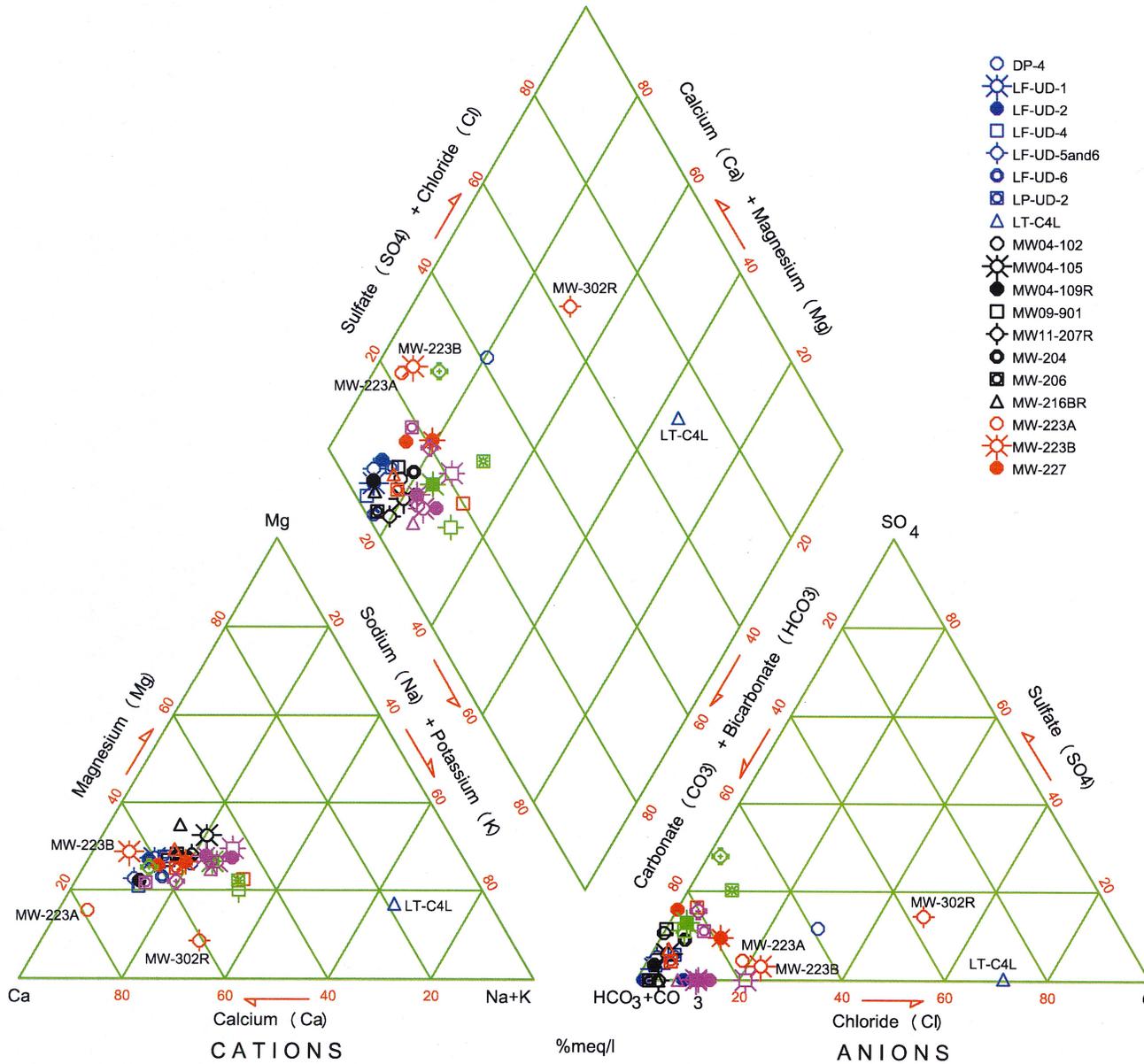


FIGURE 6-1  
PIPER DIAGRAM  
JULY 2012 WATER QUALITY  
JUNIPER RIDGE LANDFILL  
OLD TOWN, MAINE



ENVIRONMENTAL • CIVIL • GEOTECHNICAL • WATER • COMPLIANCE

other downgradient groundwater monitoring locations, and it remains distinct from the leachate water quality. Additionally, given that the landfill underdrain location samples have not historically exhibited parameter values indicative of landfill leachate influence, the increasing parameter values detected at MW-223A in the past several years are likely attributed to groundwater quality changes associated with construction of the landfill, or from a source associated with site activities, and do not indicate the presence of leachate in the groundwater beneath the landfill.

The location of MW-223A relative to the location of site infrastructure suggests that the current water quality changes at this well (i.e., increasing parameter values) may be related to infiltration of surface water runoff in the vicinity of the northwest corner of the landfill; which is partially directed toward storm water Detention Pond #5, and partially around the northwest corner of the landfill toward storm water Detention Pond #1 (SW-DP1). It should be noted that similar water quality trends and concentrations have been observed at MW-223B, the shallow companion well to MW-223A, and MW-302R, which is located proximate to Detention Pond #5. Water quality data for MW-223B and MW-302R are discussed further on later sections.

- MW-301 is a deep bedrock monitoring well (screened 162.7 feet-BGS to 182.7 feet-BGS) located downgradient from the landfill in proximity of the leachate pond. There were no MCL or MEG exceedances of analyzed parameters at MW-301 in 2012. Parameter concentrations at MW-301 remained relatively low in 2012, with no statistically significant increasing or decreasing trends (95% confidence level) for multiple parameters (4 or more) over the past three-year and five-year periods back from 2012. The concentrations of several parameters are marginally higher than at the upgradient bedrock monitoring locations, but are still at low levels (e.g., the 2012 annual maximum specific conductance value at MW-301 in 2012 was 202  $\mu\text{mhos/cm}$  in July 2012 compared to the annual maximum value of 141  $\mu\text{mhos/cm}$  reported for MW-304A in 2012). The 2012 annual maximum chloride concentration at MW-301 was 2.3 mg/L, which is an

indication that the subtle differences in water quality at MW-301 compared to upgradient water quality are not a result of leachate influence.

- Downgradient bedrock monitoring wells MW-401A and MW-402A both have relatively low parameter concentrations, similar to or only slightly greater than those measured upgradient of the landfill. There were no MCL or MEG exceedances of analyzed parameters at MW-401A in 2012. Consistent with historical data, arsenic was detected above its MCL and MEG (i.e. 0.010 mg/L) at MW-402A in April 2012 at 0.019 mg/L, July 2012 at 0.021 mg/L, and October 2012 at 0.017 mg/L. Arsenic concentrations at MW-402A were lower in 2012 than during 2011. The presence of arsenic above the MCL standard in this well is consistent with the presence of natural arsenic concentrations in groundwater in the State of Maine as discussed earlier in Section 6.0. Besides arsenic, there were no other parameters above their respective MCL or MEG at MW-402A in 2012.

There were no statistically significant increasing trends (95% confidence level) over that past three years at either MW-401A or MW-402A, and only one parameter, arsenic, had a statistically significant increasing trend at both MW-401A and MW-402A over the past five years.

The 2012 annual maximum specific conductance value and chloride concentration at MW-401A were 126  $\mu$ mhos/cm and 1.9 mg/L, respectively. The 2012 annual maximum specific conductance value and chloride concentration at MW-402A were 125  $\mu$ mhos/cm and 2.3 mg/L, respectively. These parameter values are low and comparable to upgradient monitoring locations for both MW-401A and MW-402A, and do not indicate water quality impacts from the landfill.

### 6.1.1.3 Cross-gradient Bedrock Groundwater Monitoring Well

- Monitoring well MW-302R is located cross-gradient of the landfill on the northwest side of the site, but downgradient from the garage facility, former topsoil and stump stockpile area, and a subsurface wastewater disposal field. Moreover, MW-302R is directly adjacent to storm water Detention Pond #5. The roadways uphill and adjacent to MW-302R drain into a ditch that passes alongside of the well and into Detention Pond #5. Thus, the water quality at MW-302R is influenced by site features other than the landfill. Although this well is screened in the bedrock, the bedrock surface appears to be within a few feet of the bottom the detention pond. The greater extent of fluctuation of the water level in this well compared to other site monitoring wells, as summarized on the data tables included in Appendix B, suggest that there is a hydraulic connection between the bottom of the pond and this well.

With the exception of sodium, there were no MCL or MEG exceedances of analyzed parameters at MW-302R in 2012. Sodium exceeded its MEG (i.e. 20 mg/L) at MW-302R in October 2012 at a concentration of 28.6 mg/L. Sodium and chloride concentrations at MW-302R are higher than the sodium and chloride concentrations detected at upgradient bedrock groundwater monitoring wells. A sodium concentration of 28.6 mg/L (October 2012) and chloride concentration of 66.1 mg/L (October 2012) were detected above previous historic maximum concentrations. As illustrated above in Figure 6-1, MW-302R is shown to have a distinct water quality signature as compared to other groundwater monitoring locations at the site. These differences in water quality are likely attributed to runoff from the above mentioned roadway drainage ditch near MW-302R, or perhaps from a hydraulic connection between Detention Pond #5 and MW-302R. Portions of the ditch are located on bedrock, and the ditch collects runoff from the landfill access road.

The sodium and chloride concentrations at MW-302 have a wide range of seasonal fluctuation, with a sodium concentration of 13.2 mg/L in April 2012 and

a chloride concentration of 28.2 mg/L in April 2012. While sodium and chloride have statistically significant increasing trends (95% confidence level) over the past five years, only one other parameter (sulfate) has a statistically significant increasing trend over that period. Sodium and chloride do not have a statistically significant increasing trend over the past three years.

Given the noted parameter concentrations at MW-302R in recent years, which have continued in 2012, additional site activities should be undertaken to address the water quality at this location. These activities should focus on the stormwater control structures such as the ditch and detention pond described above. Our recommendations for these activities are described in Section 8.0 of this report.

6.1.2 Soil Overburden Groundwater. During 2012, groundwater quality in the overburden was monitored at 16 monitoring wells, and three pore-water sample locations. The soil overburden consists of glacial till at the upper site elevations and marine clay along the unnamed stream west of the landfill. Notable observations in soil overburden groundwater quality are as follows.

#### 6.1.2.1 Upgradient Overburden Groundwater Monitoring Wells

Soil overburden groundwater upgradient of the site is monitored at three locations: MW-206, MW-212, and MW-303/MW12-303R (MW-303 was decommissioned after the April 2012 sampling event and replaced by MW12-303R prior to the October 2012 sampling event). While the overburden groundwater monitoring wells upgradient from the landfill are not influenced by landfill leachate, MW-303/MW12-303R and MW-212 are located in areas that could be influenced by landfill operations (e.g., near roadways, near temporary storm water structures, or in areas that have been affected by disturbance of vegetation and soils).

- Upgradient soil overburden monitoring wells MW-206, MW-212, and MW-303 generally have relatively low historic parameter concentrations. MW-303 was replaced by MW12-303R following the April 2012 sampling event and was

installed in the same geologic formation (till) as MW-303; the groundwater quality measured at MW12-303R in October 2012 is similar to that measured at MW-303 in April 2012. In 2012, MW-212 was dry during all three monitoring events; it is not uncommon for MW-212 to be dry during sampling events.

While MW-206 and MW-303<sup>5</sup> have multiple (four or more) parameters with statistically significant increasing trends (95% confidence level) over the past five years, the parameter values remain relatively low and the increasing trends are likely attributed to site construction, development, and operational activities. A visual inspection of the data shows that the increases in parameter concentrations are least evident at MW-206. The water quality in this well demonstrates that background groundwater quality at the site can vary over time irrespective of landfill operations.

The 2012 annual maximum specific conductance values and chloride concentrations at upgradient monitoring wells MW-206 and MW-303/MW12-303R are included below on Table 6-1. Table 6-1 also includes the 2012 annual maximum chloride concentrations and specific conductance values for all downgradient overburden monitoring wells for reference throughout this section.

None of the analyzed parameters at MW-206 and MW-303/MW12-303R in 2012 were above applicable MCL or MEG concentrations. Parameter concentrations that exceeded historical minimum and maximum concentration values for the upgradient overburden monitoring locations are identified on the individual water quality summary sheets contained in Appendix C.

---

<sup>5</sup> Note that the statistically significant trend analyses for MW-303 includes data only through April 2012 due to the well replacement.

TABLE 6-1

2012 ANNUAL MAXIMUM SPECIFIC CONDUCTANCE VALUES  
AND CHLORIDE CONCENTRATIONS AT  
OVERBURDEN GROUNDWATER MONITORING LOCATIONS

Location Designation	Specific Conductance (µmhos/cm)	Chloride (mg/L)	Position Relative To Landfill
MW-206	157	1.8	Upgradient
MW-212	Dry	Dry	Upgradient
MW-303	243	7.5	Upgradient
MW12-303R	189	4.9	Upgradient
DP-4	334	31.6	Downgradient
MW-204	193	4.8	Downgradient
MW-223B	338	25.4	Downgradient
MW-227	201	2.6	Downgradient
MW-401B	310	12.0	Downgradient
MW-402B	157	2.5	Downgradient
P-04-02	283	8.8	Downgradient
P-04-04	185	2.0	Downgradient
MW04-102	230	1U	Downgradient
MW04-105	299	5.6	Downgradient
MW04-109R	408	5.8	Downgradient
MW-216BR	415	9.3	Downgradient
MW09-901	197	2.5	Downgradient
PWS10-1	162	8.4	Downgradient
PWS10-2	86	8.3	Downgradient
PWS10-3	73	4.5	Downgradient
Note: U – not detected above laboratory reporting limit			

6.1.2.2 Downgradient Overburden Groundwater Monitoring Wells

Overburden groundwater downgradient of the landfill area was monitored at 13 monitoring well locations (DP-4, MW-204, MW-223B, MW-227, MW-401B, MW-402B, P-04-02, P-04-04, MW04-102, MW04-105, MW04-109R, MW-216BR, and MW09-901) and three pore-water monitoring locations (PWS10-1, PWS10-2, and PWS10-3).

- As shown above in Table 6-1, the 2012 annual maximum specific conductance values at the downgradient overburden monitoring locations remain low; all downgradient overburden monitoring locations have specific conductance values under 500 µmhos/cm. Chloride concentrations also remain relatively low at the downgradient monitoring locations. This, along with the low concentrations of chloride in the landfill underdrain location samples (discussed below in Section 6.5), and the chloride in the site leachate (e.g., 9,880 mg/L at LT-C4L in October

2012) suggests that the subtle differences in overburden groundwater quality downgradient from the landfill (compared to the upgradient locations) are likely attributed to general site construction, development, and operational activities. It should be noted that chloride concentrations at DP-4 in 2012 (31.6 mg/L in October 2012) rebounded from lower concentrations detected in 2011 (9.9 mg/L in October 2011); however, they remain within their historical range at this location. Overall, water quality at DP-4 generally continues to improve from previous site operations in the early to mid-2000s.

- Volatile organic compounds (VOCs) were analyzed at DP-4, MW-204, P-04-02, and MW-401B in April of 2012. No VOCs were detected above the laboratory reporting limit at any of these locations in 2012.
- Parameter concentrations that above MCLs or MEGs at downgradient overburden groundwater monitoring locations in 2012 are identified below:

Arsenic was present above the MCL and MEG (i.e., 0.010 mg/L) in 2012 at:

- DP-4 (0.011 mg/L in April 2012, 0.011 mg/L in July 2012),
- MW-223B (0.011 mg/L in October 2012),
- MW-227 (0.012 mg/L in April 2012, 0.011 mg/L in July 2012, 0.014 mg/L in October 2012),
- MW-401B (0.017 mg/L in April 2012, 0.011 mg/L in July 2012, 0.016 mg/L in October 2012),
- MW-402B (0.018 mg/L in April 2012, 0.017 mg/L in July 2012, 0.02 mg/L in October 2012),
- MW04-109R (0.017 mg/L in October 2012), and
- MW-216BR (0.012 mg/L in April 2012, 0.012 mg/L in July 2012, 0.016 mg/L in October 2012).

The arsenic concentrations at each of these locations are consistent with historical concentrations. As stated above, arsenic concentrations reported for

the JRL site are consistent with arsenic concentrations occurring naturally in Maine groundwater and are not interpreted as impact from the landfill.

Manganese was present above the MEG (i.e. 0.5 mg/L) in 2012 at:

- DP-4 (1.85 mg/L in April 2012, 1.59 mg/L in July 2012, 1.92 mg/L in October 2012), and
- MW04-105 (0.59 mg/L in October 2012).

The manganese concentrations at each of these locations are consistent with historical concentrations.

Sodium was present above its MEG (i.e. 20 mg/L) in 2012 at:

- P-04-02 (25.8 mg/L in October 2012).

The sodium concentration at this location is consistent with historical concentrations.

There were no other parameters at concentrations above MCLs or MEGs at downgradient overburden groundwater locations in 2012 for the parameters analyzed. It should be noted that while no VOCs were detected above the laboratory reporting limit at any of the downgradient overburden monitoring locations in 2012, several VOCs have reporting limits above their respective MCLs and/or MEGs, including vinyl chloride, 1,2-dibromoethane, 1,2,3-trichloropropane, 1,2-dibromo-3-chloropropane, and acrylonitrile.

Also of note is that cadmium, which was detected at concentrations above its MEG (0.001 mg/L) for the first time in 2011 at MW-223B, MW-227, MW-401B, PWS10-1, and PWS10-2, was not detected at concentrations above its MEG at any of the groundwater or pore-water monitoring locations in 2012.

- Groundwater quality from many of the soil overburden downgradient monitoring locations continues to improve from water quality impacts from previous site operations in the early to mid-2000s. Seven of the overburden downgradient monitoring wells (DP-4, MW04-105, MW09-901, MW-204, MW-216BR, MW-401B, and P-04-02) have statistically significant decreasing trends (95% confidence level) for four or more parameters over the past five and/or three years. Parameter values at these overburden downgradient monitoring wells are now typically approaching or are near equivalent to those values observed at the upgradient overburden monitoring wells. For example, the 2012 annual maximum specific conductance value and chloride concentration at MW04-105 were 299  $\mu\text{mhos/cm}$  and 5.6 mg/L, respectively; these values are in comparison to a historical maximum specific conductance value of 703  $\mu\text{mhos/cm}$  in 2005 and a historical maximum chloride concentration of 30.9 mg/L in 2005.

While there are five downgradient soil overburden monitoring locations with statistically significant increasing trends (95% confidence level) for multiple parameters (four or more) over the past five and/or three years (i.e., MW04-102, MW-216BR, MW-223B, MW-227, and P-04-02), visual assessments of the trends suggest that at four of those locations (MW04-102, MW-216BR, MW-227, P-04-02) most of the parameters with increasing trends are at low concentrations that generally lie within the historical range of the data and/or have very subtle trends which don't warrant any further investigation. MW-223B, on the other hand, shows sustained increases in multiple parameter values over the past five years or longer. The Mann-Kendall analyses show statistically significant increasing trends (95% confidence level) at MW-223B for chloride, specific conductance, magnesium, manganese, potassium, ammonia, and total dissolved solids over the past five years, and for chloride, magnesium, total dissolved solids, and sulfate over the past three years. While these are statistically significant increasing trends, it should be stressed that the parameter values are generally remaining low and near to upgradient concentrations. The current chloride concentrations at MW-223B, however, are above upgradient concentrations; and with the increasing trends for multiple parameters, including chloride, and similar

trends and concentrations at its deeper companion well (i.e., MW-223A), the water quality at MW-223B does warrant further investigation.

Comparison of MW-223B to landfill leachate collected from LT-C4L is illustrated on the piper diagram for July 2012 water quality data on Figure 6-1. The diagram indicates that water quality at MW-223B in July 2012 remains generally similar to upgradient groundwater monitoring locations and other downgradient groundwater monitoring locations, and it remains distinct from the leachate water quality. Additionally, given that the landfill underdrain location samples have not historically exhibited parameter values indicative of landfill leachate influence, the increasing parameter values detected at MW-223B in the past several years are may be attributed to groundwater quality changes associated with construction at the landfill, or from surface water runoff infiltration into the groundwater system around the landfill, and do not indicate the presence of leachate in the groundwater beneath the landfill. The location of MW-223B relative to the location of site infrastructure suggests that the water quality at this well may be related to stormwater runoff infiltration in the vicinity of the northwest corner of the landfill, which is partially directed toward storm water Detention Pond #1 (SW-DP1) through a drainage ditch in the vicinity of MW-223B.

Groundwater quality at MW-402B and P-04-04 does not exhibit statistically significant increasing or decreasing trends (95% confidence level) for multiple parameters, and these wells generally have groundwater quality similar to upgradient overburden monitoring well MW-206, which is located outside of the area of landfill operations.

Groundwater quality at MW04-109R, which replaced MW04-109 in 2009, has historically had multiple parameter values that are moderately higher than upgradient values. While groundwater quality at MW04-109R does not have statistically significant increasing or decreasing trends (95% confidence level) for multiple parameters (four or more) over the past three years, visual assessment of the water quality data at MW04-109 indicates that multiple parameter values at

this location have had generally steady declines since 2009 (e.g., chloride, specific conductance, calcium, magnesium, and total dissolved solids).

- Pore-water sample locations PWS10-1, PWS10-2, and PWS10-3, which are located along the landfill side of the bank of the unnamed tributary to Pushaw Stream, have been sampled since 2010. These sampling locations are intended to be representative of groundwater quality as it discharges to the stream. In 2012, multiple parameter values were lower than during the two previous years of sampling at PWS10-1 and PWS10-3; ten parameters were at new historic minimum values at PWS10-1. The Mann-Kendall analyses indicate that there are three-year statistically significant decreasing trends (95% confidence level) for chloride, specific conductance, arsenic, calcium, potassium, sodium, total dissolved solids, and bicarbonate at PWS10-1, and for specific conductance, calcium, magnesium, total dissolved solids, and bicarbonate at PWS10-3. Pore-water sample quality at PWS10-2 has been consistent (i.e., no trends) since 2010. 2012 pore-water sample quality at PWS10-1, PWS10-2, and PWS10-3 is generally similar to groundwater quality upgradient from the landfill; exceptions include higher pore-water concentrations of iron, organic carbon, and chemical oxygen demand, which is consistent with the local hydrology of the sample locations (i.e., shallow fluctuating water table with high organic matter associated with the wetland and stream). There were not statistically significant increasing trends (95% confidence level) for multiple parameters (four or more) at PWS10-1, PWS10-2, or PWS10-3 for the past three years. None of the parameters sampled for at PWS10-1, PWS10-2, and PWS10-3 were above MCL or MEG standards during 2012.

## 6.2 Surface Water

Surface water at the site was monitored in 2012 at three locations on the southwest side of the landfill along an unnamed tributary to Pushaw Stream (SW-1, SW-2, and SW-3). Surface water was also monitored at two surface water detention ponds (SW-DP1 and SW-DP6) during 2012. Parameter concentrations that exceeded historical minimum and maximum concentration values for these surface water monitoring locations are identified on the individual water quality summary sheets contained in Appendix C. Notable observations in the surface water sampling data for 2012 are as follows:

- Along the unnamed tributary to Pushaw Stream, surface water quality at SW-1, SW-2, and SW-3 was generally consistent with historical data from those locations. Parameter concentrations during the 2012 sampling events at downstream locations SW-1 and SW-3 were generally similar to those measured at SW-2 located upstream of the landfill. Parameters analyzed at SW-1 and SW-3, located downstream from the landfill, remain at relatively low values that do not indicate influence from landfill leachate. There were not statistically significant increasing or decreasing trends (95% confidence level) for multiple parameters (four or more) at SW-1, SW-2, or SW-3 for the past three-year or five-year periods.
- SW-DP1 is collected from a surface water detention pond at the downstream western edge of the JRL site. SW-DP6 is a surface water detention pond sampling location at the southern end of the site. Parameter concentrations at SW-DP1 were generally similar to historical concentrations for most parameters. There were no statistically significant increasing trends (95% confidence level) for multiple parameters (four or more) at SW-DP1 for the past three-year and five-year periods. There were statistically significant decreasing trends for chloride, sodium, organic carbon, and chemical oxygen demand for the past five years at SW-DP1.

- Surface water quality monitoring at SW-DP6 began in October 2009. While many parameter concentrations measured at SW-DP6 in 2011 were generally greater than those concentrations recorded at SW-DP1, multiple parameter values decreased to values more consistent with SW-DP1 in 2012. There were statistically significant decreasing trends (95% confidence level) for chloride, calcium, sodium, and total dissolved oxygen for the past three years at SW-DP6. There were no parameters with statistically significant increasing trends at SW-DP6 for the past three years.
  
- Parameter concentrations that were above the MFCCC surface water standards in 2012 include:
  - Iron concentrations were above the MFCCC (i.e., 1 mg/L) at: SW-1 at 2.32 mg/L in July 2012; SW-2 at 1.41 mg/L in July 2012; SW-3 at 1.34 mg/L in July 2012; SW-DP1 at 2.94 mg/L in April 2012 and 1.93 mg/L in October 2012; and at SW-DP6 at 1.32 mg/L in July 2012 and 2.63 mg/L in October 2012.
  
  - Copper concentrations were above the MFCCC (i.e., 0.00236 mg/L) at: SW-1 at 0.0027 mg/L in October 2012; SW-DP1 at 0.0082 mg/L in October 2012; and SW-DP6 at 0.006 mg/L in October 2012.
  
  - Cadmium concentrations were above the MFCCC (i.e. 0.00008 mg/L) at: SW-1 at 0.00019 mg/L in October 2012; SW-2 at 0.0002 in October 2012, and SW-DP1 at 0.00016 mg/L in October 2012.

There was no first time monitored parameters were above their respective MFCCC concentrations at the surface water monitoring locations in 2012. No other parameters were at concentrations above their respective MFCCC's at the surface water monitoring locations in 2012.

### 6.3 Leachate

The landfill leachate is sampled and analyzed as part of the ongoing water quality monitoring program. Landfill leachate has been sampled and analyzed at LT-4CL since 2009, which is a pump station that pumps leachate collected from Cell 1, Cell 2, Cell 3A, Cell 3B, Cell 4, and Cell 7 to the onsite leachate storage tank. Leachate from Cell 5 and Cell 6 is collected from a separate pump station, and leachate from Cell 8 is also collected from a separate pump station. Quarterly samples of the leachate are collected from the onsite leachate storage tank as part of the landfill pre-treatment sampling program. During 2012, many leachate constituent concentrations measured at LT-C4L were generally lower than the historical data collected at this location since 2009. Twelve of the monitored parameters, excluding VOCs, were at new historic minimum values during one or more of the 2012 monitoring events. While there are not statistically significant increasing or decreasing trends (95% confidence level) for multiple parameters (four or more) at LT-C4L for the past three years, visual observation of the data indicates that many of the monitored leachate quality parameter values have generally declined since 2009. Included with the parameters with declining values are specific conductance and chloride. The specific conductance values recorded at LT-C4L in 2012 ranged from a historic minimum of 11,470  $\mu\text{mhos/cm}$  in April 2012 to 25,300  $\mu\text{mhos/cm}$  in July. Chloride concentrations at LT-C4L in 2012 ranged from a historic minimum of 2,560 mg/L in April 2012 to 9,880 mg/L in October 2012. The historic maximum for these two parameters are 30,700  $\mu\text{mhos/cm}$ , and 21,500 mg/l respectively

In addition to these declines, several leachate quality parameters increased to new historic maximum values in 2012, including arsenic, iron, manganese, copper, ammonia, nitrate, bicarbonate, organic carbon, and chemical oxygen demand. Parameter concentrations that exceeded historic minimum and maximum concentration values in 2012 are identified on the leachate quality summary sheet contained in Appendix C.

Leachate was monitored for SVOCs, herbicides, pesticides, and PCBs during the April 2012 monitoring event, and for VOCs during the April, July, and October 2012 monitoring events. Appendix E summarizes the VOC, SVOC, herbicide, pesticide, and PCB detections above the laboratory reporting limits in 2012. Nine VOCs were detected in LT-C4L at low levels above

their respective laboratory detection limits in 2012, including acetone, methyl ethyl ketone, toluene, ethylbenzene, m,p-xylene, 1,2-dichloroethane, 4-methyl-2-pentanone, trichlorofluoromethane, and iodomethane. Trichlorofluoromethane was a first time detection at LT-C4L with a concentration of 6.4 µg/L in April 2012 and iodomethane was a first time detection with a concentration of 35 µg/L in July 2012, although the laboratory reporting limit has been as high as 50 µg/L for both compounds.

No SVOCs, herbicides, pesticides, or PCBs were detected above the laboratory detection limits in 2012 at LT-C4L.

#### 6.4 Leak Detection

The 2012 leak detection monitoring at the leachate pond leak detection manhole location, LP-LD-1, indicates the leachate pond liner is intact and functioning properly. Because the pond is no longer used as the primary leachate storage structure on site, this monitoring location was dropped from the detection monitoring program at the end of 2009 and monitoring has currently been reduced to field parameters; this will continue unless the pond is again used to store leachate.

In 2012, pH, temperature, corrected Eh, dissolved oxygen, alkalinity, and turbidity values were consistent with recent historical data. Specific conductance data at LP-LD-1 has decreased over the past two years, and has become more stable. In the mid-2000s, measured specific conductance values ranged widely between 944 µmhos/cm and 56 µmhos/cm. In 2012, specific conductance values ranged from 123 µmhos/cm in October 2012 to 206 µmhos/cm in July 2012, which is consistent with specific conductance data from upgradient groundwater monitoring locations. The 2012 monthly leak detection field data for LP-LD-1 is presented in Appendix F, and the historical tri-annual LP-LD-1 water quality data is included in Appendix B.

#### 6.5 Underdrains

The 2012 monthly landfill and leachate pond underdrain field data is presented in Appendix F, and the 2012 and historical tri-annual underdrain water quality data is included in Appendix B.

During 2012, the landfill underdrain samples had relatively low parameter concentrations and high dissolved oxygen levels. The results are generally similar to upgradient groundwater monitoring locations, thus confirming that the landfill liner systems are performing as designed. Slight increases in some parameter concentrations at the landfill cell underdrain locations are likely attributed to the soil disturbances associated with the construction of Cell 5, Cell 6, Cell 7, and Cell 8 during the last four years, and the stormwater management associated with the construction of those cells (i.e., pumping all stormwater to Detention Pond #4 located immediately upgradient of Cells 1 through 4 of the landfill). Notable observations for the underdrain monitoring locations in 2012 are discussed below in this Section.

VOCs were analyzed at all sampled underdrain locations (both landfill and leachate pond underdrains) in April of 2012. Consistent with the sampling procedures described in Section 2.0, a composite sample, LF-COMP, was taken of LF-UD-1, LF-UD-2, LF-UD-3A,B, LF-UD-4, and LF-UD-7 in April 2012 due to a water level in Manhole #5 (MH #5) higher than the individual underdrain pipes (i.e., individual samples were not taken). Additionally, there was no flow at LP-UD-1 during the April 2012 sampling event. Tetrachloroethene was detected at a low concentration of 1.5 µg/L in the sample collected from LF-UD-6 in April 2012. This was a first time detection of tetrachloroethene at LF-UD-6; however, this location had only been sampled once before in April 2011. Tetrachloroethene had not been detected historically in the leachate sample collected from LT-C4L, nor in the leachate samples collected as part of the pre-treatment testing. While the detection limit for tetrachloroethene in LT-C4L is at times high due to sample dilution, the detection limit was 0.5 µg/L in October 2010, July 2011, and October 2011 and this compound was not detected during these sampling rounds. VOCs will be sampled as part of the April 2013 sampling event, including at the LF-UD-6 underdrain location. No other VOCs were detected above the laboratory reporting limits in 2012 at any of the sampled underdrain locations.

The underdrain monitoring locations were sampled for the detection monitoring program parameters summarized in Section 3.0 during all three 2012 monitoring events. As stated above, individual samples were not collected for landfill underdrain sampling locations LF-UD-1, LF-UD-2, LF-UD-3A,B, LF-UD-4, and LF-UD-7 in April 2012 due to a water level in MH #5 higher than the individual underdrain pipes, and composite sample LF-COMP was collected. In

addition to this: (1) monitoring locations LF-UD-3A,B and LF-UD-7 were dry during the July 2012 and October 2012 monitoring events; (2) monitoring location LF-UD-1 was dry during the October 2012 monitoring event; and (3) LP-UD-1 was dry during all three 2012 monitoring events.

Chloride concentrations detected in the landfill and leachate pond underdrain monitoring locations remained low during the 2012 monitoring events. Chloride was detected at an annual low concentration of 2.5 mg/L among the underdrain locations at LF-UD-5 and 6, and an annual high concentration of 12.6 mg/L at LF-UD-2. Low concentrations of chloride, a major constituent of the leachate water quality, at the landfill cell underdrain sample locations signifies that the landfill liner is performing as designed.

At locations with sufficient data, Mann-Kendall trend analyses were run to determine the presence of three-year and five-year statistically significant increasing and/or decreasing trends for parameters (95% confidence level) analyzed at the landfill and leachate pond underdrain locations. There was insufficient data for both three-year and five-year trend analyses for sample locations LF-COMP, LF-UD-3A,B, LF-UD-6, LF-UD-7, LP-COMP, and LP-UD-1; and there was insufficient data for five-year trend analyses for LF-UD-4 and LF-UD-5 and 6. Underdrain sampling locations with statistically significant increasing or decreasing trends for multiple parameters (four or more) include the following.

- Five parameters have statistically significant increasing trends (95% confidence level) at LF-UD-1 over the past five years, including specific conductance, temperature, potassium, phosphorus, and total suspended solids. Visual assessment of the data indicates that specific conductance levels have been generally stable over the past three years at LF-UD-1, and at values consistent with upgradient overburden groundwater in areas developed for landfill operations (e.g., monthly specific conductance values for LF-UD-1 in 2012 ranged from 173  $\mu\text{mhos/cm}$  in January to 384  $\mu\text{mhos/cm}$  in August). Of the parameters at LF-UD-1 with five-year increasing trends, only temperature also has a three-year increasing trend, which suggests more recent stabilization of these parameters.

- Five parameters have statistically significant increasing trends (95% confidence level) at LF-UD-2 over the past five years, including specific conductance, temperature, manganese, total dissolved solid, and chloride. Similar to LF-UD-1, visual assessment of the data at LF-UD-2 indicates that specific conductance levels have been generally stable for the past two years, and at values generally consistent with upgradient overburden groundwater in areas developed for landfill operations. Of the parameters at LF-UD-1 with five-year increasing trends, only chloride also has a three-year increasing trend, which suggests stabilization of the remaining parameters. Chloride concentrations at LF-UD-2 have been generally increasing since 2009, but remain at a relatively low concentration in comparison to the concentration of chloride in the leachate at LT-C4L. The 2012 annual maximum concentration of chloride at LF-UD-2 was 12.6 mg/L, which is a historic maximum concentration. It is possible, based on the relative location of the Cell 2 underdrain, that the increasing trend in the chloride concentrations is related to the surface water ditch that may be influencing the water quality in MW-302R (discussed in Section 6.1.1). A portion of the Cell 2 underdrain is situated at a lower elevation than the surface water ditch. While the chloride levels in LF-UD-2 remain at low concentrations, the chloride concentrations at LF-UD-2 will be closely watched in 2013 to further observe the behavior of the existing trend.
- Four parameters have statistically significant increasing trends (95% confidence level) at LP-UD-2 over the past five years (i.e., specific conductance, arsenic, bicarbonate, and alkalinity) and three years (temperature, Eh, potassium, and turbidity). Visual assessment of the data at LP-UD-2 indicates that specific conductance levels have been generally declining since 2010, which is corroborated by a statistically significant decreasing trend for the past three years. There are also five parameters at LP-UD-2 with statistically significant decreasing trends over the past five years, including nitrate, sulfate, organic carbon, chloride, and turbidity.

Review of the data for underdrain locations with increasing trends indicate parameter trends that are subtle and occur over relatively low concentration ranges; they are, therefore, not interpreted to be related the performance of the landfill liner system. Leachate pond underdrain LP-UD-2 had statistically significant decreasing trends for four or more parameters during the last three-year and/or five-year periods. LP-UD-2 had statistically significant decreasing trends for four or more parameters over the past three years and five years, each including chloride.

The leachate pond underdrain has been monitored continuously (i.e., daily average) for specific conductance; however, as agreed upon with MEDEP, beginning in May 2012, the leachate pond underdrain is now day-lighted and its water is not held for monitoring. The 2012 daily specific conductance monitoring results from January 2012 through early May 2012 averaged 162  $\mu\text{S}/\text{cm}$  and were all below 500  $\mu\text{S}/\text{cm}$ . A summary of the average daily specific conductance measurements during this period is contained in Appendix G.

## **7.0 GAS MONITORING**

As part of the 2012 environmental monitoring program, methane gas was measured during the collection of water quality samples at the site monitoring well standpipes, underdrain outfalls, leachate collection system, leak detection system, and JRL site property boundaries using a hand-held gas meter.<sup>6</sup> During 2012, all methane gas monitoring results were below the meter detection limit. Hydrogen sulfide (H<sub>2</sub>S) was monitored at all of the above locations in 2012 and was not detected at any of the locations. Historical and 2012 gas monitoring results for the site are contained in Appendix H. The 2012 gas monitoring results indicate no landfill-related gases are present at the monitored locations.

---

<sup>6</sup> GEM2000 multi-gas meter accuracy is  $\pm 0.3\%$  for detections ranging from 0-5%, and  $\pm 0.1\%$  for detections ranging from 5-15%.

## **8.0 SUMMARY AND RECOMMENDATIONS**

### **8.1 Summary**

In general, the 2012 data for the JRL is consistent with the historical data for the site. With few exceptions, the downgradient groundwater quality is similar to or has parameter concentrations only slightly greater than that of the upgradient groundwater. Given that the upgradient groundwater is in close proximity to the recharge area and thus receives atmospheric water regularly in contrast to the downgradient wells, which represent groundwater that has traveled up to 2,000 feet through soil and rock, it is expected that the downgradient wells will have higher dissolved constituents present. The 2012 site water quality can be summarized as follows:

- Groundwater monitoring wells do not show adverse impacts from the landfill or leachate pond engineered systems (i.e., liner system, leachate collection, transport and storage systems).
- During 2012, some of the soil overburden and bedrock monitoring wells and landfill underdrains recorded parameter concentrations and trends that suggest that water quality at these locations is consistent with water quality at a site with various construction related activities associated with landfill cell construction. There are no indications of leachate impacts from site operations. In 2012, three of the wells (i.e., MW-302R, MW-223A, and MW-223B) continue to show influence of site activities that warrant further investigation. The location of these wells, their parameter concentrations, and the location of site infrastructure relative to these wells suggest that the water quality at these locations may be related to infiltration of stormwater runoff in the vicinity of the northwest corner of the JRL, which is partially directed through drainage ditches toward storm water Detention Pond #5 (near MW-302R), and is partially directed through drainage ditches toward storm water Detention Pond #1 (near MW-223A and MW-223B).

Given the noted parameter concentrations at MW-302R, MW-223A, and MW-223B in recent years, which have generally continued to increase in 2012,

additional site activities should be undertaken to address the water quality at these locations. These activities should focus on the storm water control structures such as the ditches and Detention Pond #5. Our recommendations for potential activities include modifying Detention Pond #5 to include a liner system, and soil filter to collect solids that runoff the access roads on the northwest side of the landfill. The ditches and roadway which are currently gravel would also be paved to better direct the “first flush” of stormwater to the pond. The modification will also likely require relocating monitoring well MW-302R away from the pond.

- Samples from the landfill underdrains have low overall parameter concentrations and relatively low chloride concentrations, indicating they are not influenced by landfill leachate and verifying that the landfill liner systems are performing as designed.
- Surface water downstream of the site along the unnamed tributary to Pushaw Stream appears to be un-affected by the landfill operations, with SW-1 and SW-3 having similar parameter concentrations as upstream location SW-2. Additionally, pore-water samples along the unnamed tributary to Pushaw Stream do not show adverse impacts from the landfill.
- A correction was made to the SME database in regard to the Cell 3A and Cell 3B underdrain locations. Previously, the SME database had reported separate locations for Cell 3A (LF-UD-3A) and Cell 3B (LF-UD-3B), with the sample location for LF-UD-3B consistently reported as dry (i.e., no flow). The sample location previously identified as LF-UD-3A actually represents composite flow from Cell 3A and Cell 3B. The correction results in removing the previously named LF-UD-3B location from the database and renaming the LF-UD-3A location LF-UD-A,B. Future data transmittals will reflect this change.

## 8.2 Recommendations

Based on review of 2012 and recent historical water quality data for all monitoring locations at the JRL, it is apparent that the current sampling program requires modification to better reflect current landfill conditions and operational approaches. SME recommends the following changes to the current site monitoring program for year 2013.

- Due to recent historical water quality changes at MW-302R (i.e., multiple increasing parameter values), and that well's proximity to and apparent hydraulic connection to storm water Detention Pond #5, SME recommends that Detention Pond #5 (SW-DP5) be added in the summer 2013 to the tri-annual monitoring program for the detection monitoring parameters identified for surface water locations in Table 3-1 of this report.
- Other monitoring locations at the site appear to no longer serve a useful purpose. Several monitoring wells were introduced to the monitoring program in the early to mid-2000s in response to impacts caused by the leachate storage pond in the early 2000s. This resulted in a cluster of seven monitoring wells in an area of only about 30,300 square feet (i.e., P-04-02, P-04-04, DP-4, MW04-102, MW04-105, MW-204, and MW-301). Recent historical water quality data at those locations demonstrate that the impacts in those wells have subsided and that water quality in those wells are now approaching or at upgradient water quality conditions. Based on these improvements to groundwater quality, in addition to the fact that the leachate storage pond is currently used only to collect storm water runoff, SME recommends that P-04-02, P-04-04, and MW04-102 be suspended from the sampling program beginning in the summer 2013.
- Two downgradient overburden groundwater monitoring wells, MW-216BR and MW04-109R, are located in close proximity to one another and are screened in the till at similar elevations. MW-216BR is screened at an elevation from 141.6 feet-MSL to 136.6 feet-MSL. MW04-109R is screened at an elevation from 142.1 to 137.1 feet-MSL. Water quality at these two locations is generally similar, with the greater concentrations generally observed at MW04-109R. SME

recommends that MW-216BR be suspended from the sampling program in the summer 2013.

- As leachate storage in the leachate collection pond was suspended with the construction of Cell 4 in the summer of 2008, SME recommends that the two underdrain sampling locations for the leachate pond, LP-UD-1 and LP-UD-2, be suspended from the sampling program beginning in the summer 2013.
- SME recommends that upgradient monitoring wells MW-212, which historically is frequently dry, and MW-304A, which are similar in location and water quality to MW11-207, be suspended from the sampling program beginning in the summer 2013.
- Due to their historical consistency of being non-detect or detected at very low concentrations at monitoring locations across the JRL site, SME recommends that ammonia and copper be removed from the monitoring program at all locations beginning in the summer 2013. The leachate would still be analyzed for these parameters.

In addition to these changes, landfill Cell 8 underdrain location LF-UD-8 will be added to the tri-annual monitoring program for detection monitoring and monthly field parameter monitoring in 2013.

**APPENDIX A**

**2012 AND HISTORICAL FALL SPECIFIC CONDUCTIVITY  
DATA (EXPANDED LOCATIONS)**

REPORT PREPARED: 11/21/2012 12:09 FOR: Juniper Ridge Landfill	SUMMARY REPORT Conductivity and Water Levels			Page 1 of 5 SEVEE & MAHER ENGINEERS, INC. 4 BLANCHARD ROAD CUMBERLAND CENTER, ME 04021
Date	Specific Conductance µmhos/cm @25°C	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet

**DP-4**

DP-4 is located downgradient of the landfill and leachate pond and monitors groundwater quality within the overburden.

10/26/2009	409	13.68	155.69	27.05
10/18/2010	401	14.98	154.39	27.1
10/24/2011	256	16.95	152.42	27.06
10/24/2012	302	14.08	155.29	27.06

**MW04-101**

In proximity of Leachate Pond

10/28/2008	176			
10/27/2009	191	4.1	163.82	23.75
10/18/2010	198	5.1	162.82	23.75
10/25/2011	177	5.7	162.22	23.75
10/22/2012	196	5.45	162.47	23.75

**MW04-102**

MW04-102 monitors groundwater in the overburden downgradient of the landfill and upgradient of Stormwater Detention Pond-1.

10/27/2009	236	5.27	164.95	17.84
10/19/2010	232	5.85	164.37	17.97
10/25/2011	209	6.5	163.72	17.85
10/22/2012	221	5.78	164.44	17.98

**MW04-104**

In proximity of Leachate Pond

10/28/2008	192			
10/27/2009	213	7.3	160.76	28
10/18/2010	229	8	160.06	28
10/25/2011	206	8	160.06	28
10/22/2012	231	7.5	160.56	28

**MW04-105**

MW04-105 monitors groundwater in the overburden downgradient of the landfill and Stormwater Detention Pond-1.

10/26/2009	528	5.8	159.79	22.75
10/18/2010	306	6.9	158.69	22.75
10/25/2011	217	6.9	158.69	22.75
10/22/2012	252	6.6	158.99	22.75

**MW04-109R**

MW04-109R is located to the south of Cell #5 of the expansion landfill and near Manhole #5. This well monitors water quality within the overburden downgradient of the landfill.

10/19/2010	488	6.6	153.53	22.92
10/25/2011	416	6.62	153.51	22.95
10/23/2012	404	6.4	153.73	22.92

**MW09-901**

MW09-901 is located to the south of Cell #5 and detention pond #2 of the expansion landfill. This well monitors water quality within the overburden downgradient of the landfill.

10/19/2010	300	9.25	155.85	22.75
10/23/2012	197	8.8	156.3	22.73

**MW11-207R**

MW11-207R monitors bedrock groundwater quality upgradient of the landfill. This well replaced MW-207.

10/24/2011	83	11.5	203.63	44
10/22/2012	88	6.57	208.56	44.2

**MW12-303R**

10/23/2012	189	27.47		43.32
------------	-----	-------	--	-------

**MW-204**

MW-204 monitors the overburden water quality downgradient from the landfill.

10/26/2009	309	8.7	156.05	24.42
10/19/2010	200	9.32	155.43	24.45

REPORT PREPARED: 11/21/2012 12:09 FOR: Juniper Ridge Landfill	SUMMARY REPORT Conductivity and Water Levels	Page 2 of 5 SEVEE & MAHER ENGINEERS, INC. 4 BLANCHARD ROAD CUMBERLAND CENTER, ME 04021		
Date	Specific Conductance µmhos/cm @25°C	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet

<b>MW-204</b>	MW-204 monitors the overburden water quality downgradient from the landfill.			
10/26/2011	180	9.1	155.65	24.45
10/24/2012	193	9.05	155.7	24.45
<b>MW-212</b>	MW-212 monitors the overburden groundwater upgradient of the landfill.			
10/24/2011	D	D		D
10/22/2012	D	D		D
<b>MW-216BR</b>	MW-216BR is located to the south of Cell #5 of the expansion landfill and near Manhole #5. This well monitors water quality within the overburden downgradient of the landfill.			
10/19/2010	289	5.51	153.89	22.46
10/25/2011	400	5.48	153.92	22.48
10/23/2012	334	5.2	154.2	22.45
<b>MW-223A</b>	MW-223A monitors the bedrock water quality downgradient of the landfill.			
10/27/2009	271	1.35	175.19	35.44
10/19/2010	326	2.2	174.34	35.42
10/25/2011	367	0.7	175.84	35.56
10/23/2012	390	0.5	176.04	35.48
<b>MW-223B</b>	MW-223B monitors the overburden water quality downgradient of the landfill.			
10/27/2009	331	2.65	173.28	19.95
10/19/2010	316	3.45	172.48	20
10/25/2011	327	2.2	173.73	19.93
10/23/2012	333	2.1	173.83	20.05
<b>MW-227</b>	MW-227 monitors water quality in the overburden downgradient of the landfill.			
10/27/2009	182	4.1	160.13	22.2
10/19/2010	189	4.42	159.81	22.3
10/25/2011	188	4.05	160.18	22.28
10/23/2012	201	4.23	160	22.3
<b>MW-301</b>	MW-301 monitors the water quality within the bedrock downgradient of the landfill.			
10/26/2009	276	4.25	162.11	185.15
10/19/2010	340	4.96	161.4	182.45
10/26/2011	204	4.11	162.25	185.1
10/24/2012	171	4.56	161.8	179.61
<b>MW-302R</b>	MW-302R monitors the water quality in the shallow bedrock beside the landfill, but not directly downgradient of the landfill.			
10/27/2009	470	8.46	198.4	32.25
10/18/2010	649	8.05	198.81	32.22
10/24/2011	400	6.6	200.26	32.2
10/22/2012	463	4.12	202.74	32.2
<b>MW-401A</b>	MW-401A monitors bedrock water quality downgradient of the landfill and leachate pond.			
10/28/2009	165	4.12	152.71	111.98
10/20/2010	191	5.52	151.31	112.1
10/24/2011	128	3.62	153.21	112.02
10/22/2012	119	0.93	155.9	112.02
<b>MW-401B</b>	MW-401B is located downgradient of the landfill and leachate pond and monitors groundwater quality in the overburden.			
10/28/2009	520	6.6	150.72	23.2
10/20/2010	514	6.82	150.5	23.1
10/24/2011	319	6.63	150.69	23.12

Date	Specific Conductance µmhos/cm @25°C	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet
------	--	---------------------------	-------------------------------	--------------------

**MW-401B**

MW-401B is located downgradient of the landfill and leachate pond and monitors groundwater quality in the overburden.

10/22/2012	310	6.35	150.97	23.13
------------	-----	------	--------	-------

**MW-402A**

MW-402A monitors water quality within the bedrock downgradient of the landfill.

10/28/2009	183	F1		108.45
10/20/2010	197	F1		108.35
10/26/2011	130	0	152.2	108.35
10/24/2012	116	F1		108.35

**MW-402B**

MW-402B monitors water quality within the overburden downgradient of the landfill.

10/28/2009	215	2.98	149.76	25.26
10/20/2010	246	3.4	149.34	25.18
10/26/2011	160	2.95	149.79	25.18
10/24/2012	141	2.9	149.84	25.2

**P-04-02**

P-04-02 monitors the water quality in the overburden downgradient of the landfill, between the leachate pond and landfill toe.

10/27/2009	242	7.55	161.19	37.2
10/20/2010	214	8.5	160.24	37.15
10/26/2011	!	!		!
10/24/2012	245	6.65	162.09	39.98

**P-04-04**

P-04-02 monitors the water quality in the overburden downgradient of the landfill, between the leachate pond and landfill toe.

10/27/2009	175	7.96	161.39	32.21
10/20/2010	177	9	160.35	32.25
10/26/2011	181	9.3	160.05	32.3
10/24/2012	158	8.9	160.45	32.33

**P-201A**

10/29/2008	123	F1		
10/27/2009	328	F1		70.25
10/19/2010	287	2.46	147.09	Q
10/25/2011	131	1.92	147.63	21.84
10/23/2012	118	1.8	147.75	7.5 Q

**P-201B**

10/29/2008	146			
10/27/2009	195	F1		68.1
10/19/2010	248	F1		67.92
10/25/2011	150	0.05	152.13	68.1
10/23/2012	120	F1		71.1

**P-201C**

10/29/2008	136			
10/27/2009	209	2.45	149.74	49.45
10/19/2010	235	2.29	149.9	49.4
10/25/2011	147	2.25	149.94	49.53
10/23/2012	121	F1		42.85

**P-201D**

10/29/2008	127			
10/27/2009	325	0.05	151.28	43.15
10/19/2010	220	0.7	150.63	42.4

REPORT PREPARED: 11/21/2012 12:09 FOR: Juniper Ridge Landfill	SUMMARY REPORT Conductivity and Water Levels			Page 4 of 5 SEVEE & MAHER ENGINEERS, INC. 4 BLANCHARD ROAD CUMBERLAND CENTER, ME 04021
Date	Specific Conductance µmhos/cm @25°C	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet

**P-201D**

10/25/2011	143	F1		43.02
10/23/2012	128	3.1	148.23	49.46

**P-201E**

10/29/2008	249			
10/27/2009	532	2.2	150.06	Q
10/19/2010	286	F1		71.1
10/25/2011	225	F1		69.8
10/23/2012	135	F1		67.93

**P-202A**

10/27/2008	162			
10/27/2009	125	2.55	146.83	21.35
10/19/2010	250	3.1	146.28	21.3
10/26/2011	175	1.98	147.4	21.3
10/22/2012	171	2.1	147.28	21.3

**P-202B**

10/27/2008	155			
10/27/2009	250	2.2	147.17	Q
10/19/2010	312	2.35	147.02	16.05
10/26/2011	212	2.9	146.47	6.05
10/22/2012	171	2.25	147.12	6.1 Q

**P-209A**

10/29/2008	69			
10/27/2009	93	3.85	174.94	55.95
10/19/2010	282	6.58	172.21	55.9
10/25/2011	124	F1		55.9
10/23/2012	45	F1		55.91

**P-209B**

10/29/2008	100			
10/27/2009	70	4.25	174.57	30.75
10/19/2010	240	6.85	171.97	30.71
10/25/2011	69	0.15	178.67	30.66
10/23/2012	76	F1		30.75

**P-209C**

10/29/2008	71			
10/27/2009	D	D		12.75
10/19/2010	D	D		12.76
10/25/2011	95	3.15	175.73	12.82
10/23/2012	55	3.2	175.68	12.75

**P-211A**

10/27/2008	73			
10/27/2009	83	5.5	178.07	25.6
10/18/2010	87	6	177.57	25.6
10/25/2011	140	5.4	178.17	25.6
10/22/2012	176	3.8	179.77	25.62

**P-211B**

REPORT PREPARED: 11/21/2012 12:09 FOR: Juniper Ridge Landfill	SUMMARY REPORT Conductivity and Water Levels			Page 5 of 5 SEVEE & MAHER ENGINEERS, INC. 4 BLANCHARD ROAD CUMBERLAND CENTER, ME 04021
Date	Specific Conductance µmhos/cm @25°C	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet

**P-211B**

10/27/2008	115			
10/27/2009	96	6.1	177.87	13.43
10/18/2010	101	6.4	177.57	13.42
10/25/2011	123	6.1	177.87	13.45
10/22/2012	165	4.3	179.67	13.43

**P-220A**

10/29/2008	170			
10/27/2009	223	F1		40.9
10/18/2010	264	F1		40.95
10/26/2011	172	F1		40.91
10/22/2012	157	F1		40.82

**P-220B**

10/29/2008	157			
10/27/2009	239	F1		22.85
10/18/2010	309	F1		22.85
10/26/2011	202	F1		22.82
10/22/2012	233	F1		22.85

Notes: TYPE - Sample Type Qualifier where D = Duplicate Sample.

**Concentration Qualifier Notes:**

- I - The sampling location was damaged or destroyed.
- D - The sampling location was dry.
- F1 - Well was flowing
- Q - An obstruction prevented the collection of data.

**APPENDIX B**

**2012 AND HISTORICAL WATER QUALITY DATA**

SUMMARY REPORT  
 Field Data

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
1/30/2004	XX	GWDP4X039	965	6.3	6	14.12	155.25			0.6		14.8	
5/6/2004	XX	GWXXXX00D	601	6.3	9.8	14.78	154.59		272	1	290	7.1	
7/26/2004	XX	GWXXXX041	417	7.1	14.6	13.92	155.45		318	6	255	36.2	
10/26/2004	XX	GWXXXX07H	346	7	16.5	13.81	155.56	27.04	266	5	230	9.9	
5/9/2005	XX	GWXXXX13I	264	6.9	9.6	13.25	156.12		239	1	215	6	
8/1/2005	XX	GWXXXX17E	295	6.7	15.8	13.8	155.57		295	2	175	16.8	
9/20/2005	XX	GWXXXX1A4	380	7.3	16.6	14.38	154.99	27.06	228	4	135	0.7	
5/22/2006	XX	GWXXXX1EJ	340	6.8	10.3	14.59	154.78		188	1	105	27.8	
7/24/2006	XX	GWXXXX1HG	270	7.1	19.6	14.52	154.85		251	1	150	3	
9/11/2006	XX	GWXXXX209	333	6.2	19.2	14.96	154.41	27.07	238	1	125	4.3	
5/14/2007	XX	GWXXXX23G	381	6.8	11.6	15	154.37		196	1	75	28	
7/23/2007	XX	GWXXXX280	278	6.4	7.2	15.28	154.09		233	6	175	18.6	
9/10/2007	XX	GWXXXX2AA	334	6.5	15.3	15.65	153.72	27.1	337	1	115	9.6	
5/19/2008	XX	GWXXXX2E4	356	6.6	9.5	14.4	154.97		-51	2	150	5.7	
7/29/2008	XX	GWXXXX2H8	362	6.4	17.4	17.19	152.18		64	1	105	5.9	
10/27/2008	XX	GWXXXX2J1	366	6.4	11.7	15.3	154.07	27.05	154	1	75	4.2	
4/13/2009	XX	GWXXXX336	442	6.3	7.1	14.55	154.82		279	4	70	8.5	
7/6/2009	XX	GWXXXX37A	380	6.7	15.3	14.59	154.78		308	5	130	12.1	
10/26/2009	XX	GWXXXX3F5	499	6.5	13.2	13.68	155.69	27.05	253	3	100	4.5	
4/26/2010	XX	GWXXXX404	271	6.3	13.2	14.8	154.57		216	3	100	3.3	
7/19/2010	XX	GWXXXX438	100	5.6	23.9	15.41	153.96		345	2	125	8.1	
10/18/2010	XX	GWXXXX46C	396	6.3	11.3	14.98	154.39	27.1	352	2	50	2.6	
4/25/2011	XX	GWXXXX4AD	277	6.4	12.2	13.9	155.47		282	1	70	2.5	
7/18/2011	XX	GWXXXX4EB	282	6.4	18.2	14.35	155.02		233	1	95	0.6	
10/24/2011	XX	GWXXXX4I6	256	6.7	13.8	16.95	152.42	27.06	312	0.8	70	1.6	
4/25/2012	XX	GWXXXX52G	334	6.3	9.1	14.1	155.27		232	1	120	5.9	
7/25/2012	XX	GWXXXX57F	313	6.2	13.8	15.3	154.07		25	0.6	120	3.7	
10/24/2012	XX	GWXXXX5E6	302	7.3	9.4	14.08	155.29	27.06	221	1	100	7.9	
<b>LF-COMP</b>													
5/25/2011	XX	LCMPX4FE	405	6.8	23.3				352	5	100	0.07	
6/20/2011	XX	LCMPX4G5	370	7	23.8				376	5	125	1	
7/19/2011	XX	LFXXXX4F1	368	6.8	24.7				404	4	113	0	
8/3/2011	XX	LCMPX4JF	223	7.1	22.7				337	5	90	129.3	
10/8/2011	XX	LCMPX4J4	371	7.1	24.8				370	6	80	0.6	
11/30/2011	XX	LCMPX501	351	7.1	20				382	6	90	24.9	
12/29/2011	XX	LCMPX506	362	7.4	17.2				341	6	125	1.1	
1/26/2012	XX	LCMPX581	381	7.5	17				372	6	140	1.05	
2/24/2012	XX	LCMPX589	366	7.5	13.7				371	5	145	0.91	
3/23/2012	XX	LCMPX5A0											
4/16/2012	XX	LCMPX5A8											
4/24/2012	XX	LFXXXX538	314	7.2	17.8								
5/3/2012	XX	LCMPX5B2	400	7	18.7				403	6	85	4.4	
6/29/2012	XX	LCMPX5BD	394	6.9	22.5				446	5	140	11.82	
7/31/2012	XX	LCMPX5C4	389	7.3	29.7				444	6	125	0.07	
8/31/2012	XX	LCMPX5F5	421	6.9	22.1				383	8	150	0.33	
9/27/2012	XX	LCMPX5FG	373	7.3	21.2				384	6	150	0.27	
11/13/2012	XX	LCMPX5G7	307	7.6	17.7				348	8	150	0.14	
									355	6	135	3.91	

**SUMMARY REPORT**  
 Field Data

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
12/31/2012	XX	LFOMPX5GI	306	7.7	11.4				406	8	130	5.27	
<b>LF-UD-1</b>													
7/28/2004	XX	LFUD1X05E	245	6.6	9				305	8	120	0	
8/30/2004	XX	LFUD1X080	H2	H2	H2				H2	H2	H2	H2	
9/27/2004	XX	LFUD1X086	366	6.8	10.2				208	5	100	0.8	
10/27/2004	XX	LFUD1X076	230	6.7	12.5				326	6	155	0	
11/23/2004	XX	LFUD1X101	258	7.6	10.4				249	6	100	0.8	
12/22/2004	XX	LFUD1X107	235	7.1	9.5				201	8	120	4	
1/26/2005	XX	LFUD1X119	317	7.9	5.2				300	6	115	0.1	
2/24/2005	XX	LFUD1X11G	D	D	D				D	D	D	D	
3/29/2005	XX	LFUD1X14H	182	6.3	8.6				337	6	75	0	
4/28/2005	XX	LFUD1X152	H2	H2	H2				H2	H2	H2	H2	
5/11/2005	XX	LFUD1X137	246	6.3	11.9				330	6	135	0	
6/22/2005	XX	LFUD1X17A	287	7.4	13.4				426	6	110	0	
7/27/2005	XX	LFUD1X16F	185	7.1	17.1				309	6	125	1.2	
8/29/2005	XX	LFUD1X180	238	7.4	16.6				259	6	100	4.6	
9/21/2005	XX	LFUD1X18D	155	7.6	16.2				294	6	100	1.1	
10/21/2005	XX	LFUD1X18A	246	8.1	9.1				220	5	110	3.8	
11/21/2005	XX	LFUD1X18H	218	7	13.2				231	2	100	2.6	
12/27/2005	XX	LFUD1X1C3	256	7.9	2.6				274	5	90	2.2	
1/23/2006	XX	LFUD1X1C8	246	7.5	8				428	6	80	1.2	
2/23/2006	XX	LFUD1X1CD	194	7	8.6				387	5	100	0.4	0.0033
3/15/2006	XX	LFUD1X1D0	247	7.1	8.1				447	6	85	2.5	0.0033
4/27/2006	XX	LFUD1X1G1	211	7.6	13.2				363	6	105	2.2	0.00446
5/24/2006	XX	LFUD1X1E8	247	6.8	13.2				369	6	135	0.7	0.00223
6/13/2006	XX	LFUD1X1A	295	6.5	15.1				469	5	140	0	0.0033
7/25/2006	XX	LFUD1X1H5	256	6.6	18.4				173	6	175	1.2	0.0056
8/16/2006	XX	LFUD1X20H	248	7.2	16.9				348	4	90	0	0.0022
9/11/2006	XX	LFUD1X1J	211	7.2	14.7				279	6	100	1.2	0.0011
10/19/2006	XX	LFUD1X213	280	7.5	14.3				236	6	150	0	
11/21/2006	XX	LFUD1X219	249	8	7.4				221	4	115	2	0.0045
12/5/2006	XX	LFUD1X21E	266	8.3	7.2				312	3	100	4	0.0045
1/24/2007	XX	LFUD1X247	373	6.3	7.5				295	2	105	1.3	0.0067
2/22/2007	XX	LFUD1X255	340	7.2	6.8				217	6	75	0	0.0033
3/21/2007	XX	LFUD1X25C	102	7.4	9.4				299	6	115	0.2	0.0022
4/26/2007	XX	LFUD1X25J	375	7.4	12.8				229	5	135	1	0.0033
5/16/2007	XX	LFUD1X235	302	6.7	10.2				335	5	140	1	0.0011
6/21/2007	XX	LFUD1X289	264	6.3	16.8				382	6	130	1.8	0.0022
7/25/2007	XX	LFUD1X279	353	7.6	18.6				302	6	195	2.6	0.0022
8/16/2007	XX	LFUD1X2AJ	305	6.9	17.3				289	6	140	0.2	0.0006
9/12/2007	XX	LFUD1X28J	I	I	I				I	I	I	I	
10/24/2007	XX	LFUD1X285	611	7.9	12.1				235	6	150	0.8	0.0011
11/27/2007	XX	LFUD1X28B	359	7.3	9.7				324	6	125	0.8	0.0022
12/18/2007	XX	LFUD1X28H	360	7.9	7.4				294	6	110	1.2	0.0006
1/9/2008	XX	LFUD1X2C3	261	6.6	10.4				273	6	145	0.8	0.0022
2/25/2008	XX	LFUD1X2EF	317	6.8	5.1				374	5	120	3.6	0.0022
3/13/2008	XX	LFUD1X2F1	279	7.2	0.6				352	6	115	4.9	0.0022
4/17/2008	XX	LFUD1X2F7	459	7.3	13.6				305	5	115	1.1	0.0022
5/20/2008	XX	LFUD1X2DD	304	7.4	12.2				400	6	150	0.8	0.0022

SUMMARY REPORT  
 Field Data

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
6/9/2008	XX	LFUD1X2HH	336	7.2	16.1				293	5	100	1.2	0.0022
7/28/2008	XX	LFUD1X2GH	314	6.7	19.2				404	5	185	1.5	0.0022
8/28/2008	XX	LFUD1X307	438	7.3	21.9				376	5	160	1.2	0.0006
9/25/2008	XX	LFUD1X30D	295	6.7	16.7				239	6	100	0.9	0.0006
10/28/2008	XX	LFUD1X2J7	300	7.3	13.5				298	8	135	0	0.0004
11/17/2008	XX	LFUD1X30J	324	8.1	11.1				365	5	120	0.5	0.0017
12/23/2008	XX	LFUD1X315	328	7.3	8.7				208	6	175	0.5	0.0022
1/14/2009	XX	LFUD1X33G	280	7.9	5.3				247	6	95	1.2	0.0033
2/2/2009	XX	LFUD1X343	365	7.1	9.4				388	5	110	0.8	0.0011
3/11/2009	XX	LFUD1X34B	283	6.8	9				276	6	145	1.4	0.0017
4/15/2009	XX	LFUD1X32F	371	7.9	11.2				424	5	150	0.5	0.0022
5/28/2009	XX	LFUD1X34J	415	6.8	16.2				264	5	135	4	0.0011
6/23/2009	XX	LFUD1X357	H2	H2	H2				H2	H2	H2	H2	H6
7/8/2009	XX	LFUD1X36J	H2	H2	H2				H2	H2	H2	H2	H6
8/4/2009	XX	LFUD1X381	F6	F6	F6				F6	F6	F6	F6	F6
9/1/2009	XX	LFUD1X38A	H2	H2	H2				H2	H2	H2	H2	H6
10/27/2009	XX	LFUD1X3EE	H2	H2	H2				H2	H2	H2	H2	H6
11/11/2009	XX	LFUD1X3FH	F6	F6	F6				F6	F6	F6	F6	F6
12/8/2009	XX	LFUD1X3G7	F6	F6	F6				F6	F6	F6	F6	F6
1/21/2010	XX	LFUD1X3GJ	F6	F6	F6				F6	F6	F6	F6	F6
2/23/2010	XX	LFUD1X3HB	F6	F6	F6				F6	F6	F6	F6	F6
3/17/2010	XX	LFUD1X3I0	389	6.5	15.4				375	6	150	2.6	0.0006
4/27/2010	XX	LFUD1X3JD	356	7.5	13.4				245	6	160	0.2	0.0011
5/18/2010	XX	LFUD1X40G	F6	F6	F6				F6	F6	F6	F6	F6
6/22/2010	XX	LFUD1X415	F6	F6	F6				F6	F6	F6	F6	F6
7/20/2010	XX	LFUD1X42H	F6	F6	F6				F6	F6	F6	F6	F6
8/30/2010	XX	LFUD1X449	F6	F6	F6				F6	F6	F6	F6	F6
9/28/2010	XX	LFUD1X441	F6	F6	F6				F6	F6	F6	F6	F6
10/19/2010	XX	LFUD1X461	F6	F6	F6				F6	F6	F6	F6	F6
11/11/2010	XX	LFUD1X473	F6	F6	F6				F6	F6	F6	F6	F6
12/16/2010	XX	LFUD1X47J	H2	H2	H2				H2	H2	H2	H2	H2
1/24/2011	XX	LFUD1X47B	356	8	12.8				244	8	485	0	0.0006
2/24/2011	XX	LFUD1X4BG	483	7.1	13.6				310	5	345	2.3	0.0011
3/25/2011	XX	LFUD1X4C6	H2	H2	H2				H2	H2	H2	H2	H2
4/26/2011	XX	LFUD1X4A2	331	7.4	15.4				360	5	240	0.5	0.0022
5/25/2011	XX	LFUD1X4F5	H2	H2	H2				H2	H2	H2	H2	H2
6/20/2011	XX	LFUD1X4FG	H2	H2	H2				H2	H2	H2	H2	H2
7/19/2011	XX	LFUD1X4E0	347	6.7	24.4				290	4	125	0	0.0022
8/3/2011	XX	LFUD1X4J6	H2	H2	H2				H2	H2	H2	H2	H2
10/8/2011	XX	LFUD1X4IE	353	7	23.7				375	6	100	0.1	0.0006
10/25/2011	XX	LFUD1X4HF	368	6.8	17.7				311	6	200	4.5	0.0006
11/30/2011	XX	LFUD1X509	349	7.6	17.6				361	5	115	0.56	0.0006
12/29/2011	XX	LFUD1X4JH	337	8	14.2				324	6	115	0.1	0.0011
1/26/2012	XX	LFUD1X589	173	7.5	13.7				371	8	150	2.03	0.0006
2/24/2012	XX	LFUD1X591	382	7.4	15.3				371	5	150	2.23	0.0006
3/23/2012	XX	LFUD1X59C	349	7.2	16.7				399	6	150	0.22	0.0003
4/16/2012	XX	LFUD1X5A3	359	7	17.3				387	6	150	0.04	0.0006
4/24/2012	XX	LFUD1X525	H2	H2	H2				H2	H2	H2	H2	H2
5/3/2012	XX	LFUD1X5AE	364	7	16.7				438	8	150	0.79	0.0006
6/29/2012	XX	LFUD1X5B5	338	6.6	21.4				427	6	125	0.64	0.0006

**SUMMARY REPORT**  
 Field Data

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
7/24/2012	XX	LFUD1X574	355	6.5	20.4				316	6	200	1.8	0.0022
7/31/2012	XX	LFUD1X5BG	375	7.1	24.1				341	8	160	0.17	0.0003
8/31/2012	XX	LFUD1X5EH	384	6.7	21.1				206	5	135	0.32	0.0003
9/27/2012	XX	LFUD1X5F8	317	8.1	18.6				375	6	125	0.01	0.0003
10/23/2012	XX	LFUD1X5DF	F6	F6	F6				F6	F6	F6	F6	F6
11/13/2012	XX	LFUD1X5FJ	288	8	14.8				362	6	135	0.87	
12/31/2012	XX	LFUD1X5GA	290	7.7	10.6				409	8	120	0.72	
<b>LF-UD-2</b>													
7/28/2004	XX	LFUD2X06F	231	6.8	11.5				207	8	135	0	
8/30/2004	XX	LFUD2X081	H2	H2	H2				H2	H2	H2	H2	
9/27/2004	XX	LFUD2X087	280	6.9	11.1				206	6	125	0	
10/27/2004	XX	LFUD2X077	224	7.6	13.6				336	8	130	0	
11/23/2004	XX	LFUD2X102	224	7.6	8.4				234	6	100	1.2	
12/22/2004	XX	LFUD2X108	208	7.4	8.3				211	8	85	6.6	
1/26/2005	XX	LFUD2X11A	286	7.8	6.8				246	5	110	0	
2/24/2005	XX	LFUD2X11H	D	D	D				D	D	D	D	
3/29/2005	XX	LFUD2X14I	182	6.3	8.6				337	6	75	0	
4/28/2005	XX	LFUD2X153	H2	H2	H2				H2	H2	H2	H2	
5/11/2005	XX	LFUD2X138	193	6.8	14.6				306	8	145	0	
6/22/2005	XX	LFUD2X17B	265	7.5	14.4				320	6	135	1.2	
7/27/2005	XX	LFUD2X16G	187	7.5	18				256	6	105	0.9	
8/29/2005	XX	LFUD2X181	221	7.2	15.4				287	6	110	1.2	
9/21/2005	XX	LFUD2X18E	291	7.7	16.5				298	5	105	2.4	
10/21/2005	XX	LFUD2X186	225	8.3	9.8				287	3	125	1.8	
11/21/2005	XX	LFUD2X18D	209	7.1	12.9				413	5	95	1.3	
12/27/2005	XX	LFUD2X18J	235	7.8	2.4				377	5	105	0.2	0.0067
1/23/2006	XX	LFUD2X1C4	218	7.6	9.7				423	5	110	1.3	0.0067
2/23/2006	XX	LFUD2X1C9	237	7.6	10.2				366	6	125	2.2	0.00668
3/15/2006	XX	LFUD2X1CG	232	7.5	10.3				403	6	120	0.8	0.00446
4/27/2006	XX	LFUD2X1FH	234	7.1	10.5				485	6	160	1.4	0.0067
5/24/2006	XX	LFUD2X1E9	204	7.1	15.2				377	5	80	0	0.0056
6/13/2006	XX	LFUD2X1H6	231	6.9	16.4				255	6	115	0.8	0.0022
7/25/2006	XX	LFUD2X1H6	235	7	19.3				244	6	130	0.2	
8/16/2006	XX	LFUD2X20I	230	7.4	18.3				208	2	100	0	0.0056
9/11/2006	XX	LFUD2X1LJ	134	7.3	16				214	4	100	2	0.0067
10/19/2006	XX	LFUD2X214	301	7.4	14.7				336	4	100	2	0.0056
11/21/2006	XX	LFUD2X21A	246	8.3	11				219	5	80	0	0.0056
12/5/2006	XX	LFUD2X21F	274	8.3	10.1				297	5	85	0.3	0.0022
1/24/2007	XX	LFUD2X248	305	6	3.6				202	6	110	0.6	0.0045
2/22/2007	XX	LFUD2X258	288	7.8	6.9				380	6	120	0.3	0.0033
3/21/2007	XX	LFUD2X25D	154	6.8	10.6				353	6	120	1.8	0.0045
4/26/2007	XX	LFUD2X260	250	7.9	16.7				221	6	155	1.2	0.0045
5/16/2007	XX	LFUD2X236	246	7.6	12.6				315	6	140	0.5	0.0011
6/21/2007	XX	LFUD2X28A	217	6.5	19.1				265	5	120	1.8	0.0011
7/25/2007	XX	LFUD2X27A	274	7.5	18.7				221	6	140	1.2	0.0022
8/16/2007	XX	LFUD2X280	252	7.2	18.3				252	6	140	0.6	0.0045
9/12/2007	XX	LFUD2X2A0	272	8.3	17				221	6	140	1.2	0.0022
10/24/2007	XX	LFUD2X2B6	377	8.3	12.9				252	6	140	0.6	0.0045
11/27/2007	XX	LFUD2X2BC	319	7.5	12.3								

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

SUMMARY REPORT  
Field Data

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
12/18/2007	XX	LFUD2X281	248	8.1	6.2				302	6	75	1.4	0.0011
1/9/2008	XX	LFUD2X2C4	174	6.6	11.4				241	6	130	0.9	0.0045
2/25/2008	XX	LFUD2X2EG	249	7.7	9				344	5	105	1	0.0045
3/13/2008	XX	LFUD2X2F2	243	8	2.2				316	5	80	1.5	0.0045
4/17/2008	XX	LFUD2X2F8	246	7.3	15.4				311	5	90	0.3	0.0045
5/20/2008	XX	LFUD2X2DE	253	7.9	14.3				377	6	140	1.2	0.0045
6/9/2008	XX	LFUD2X2HI	257	7.5	17				294	5	75	0.1	0.0045
7/28/2008	XX	LFUD2X2GI	254	6.9	20.1				410	5	170	1.1	0.0033
8/28/2008	XX	LFUD2X308	430	7.9	19.9				353	5	140	1.4	0.0022
9/25/2008	XX	LFUD2X30E	224	7.1	17.7				216	6	95	0.6	0.0011
10/29/2008	XX	LFUD2X2J8	231	8.1	13.6				386	6	105	1	0.0022
11/17/2008	XX	LFUD2X310	253	8	12.3				372	6	120	1	0.0022
12/23/2008	XX	LFUD2X316	234	7.8	8.7				168	6	100	0.2	0.0045
1/14/2009	XX	LFUD2X33H	215	8	7.9				303	5	75	1	0.0045 A6
2/2/2009	XX	LFUD2X344	276	7.4	12.6				388	5	85	1.2	0.0022
3/11/2009	XX	LFUD2X34C	233	6.8	10.2				308	5	95	1.1	0.0022
4/15/2009	XX	LFUD2X32G	288	7.7	14.2				446	5	90	0.8	0.0045
5/28/2009	XX	LFUD2X350	331	7.4	18.3				238	6	140	4.8	0.0022
6/23/2009	XX	LFUD2X358	H2	H2	H2				H2	H2	H2	H2	H6
7/8/2009	XX	LFUD2X370	H2	H2	H2				H2	H2	H2	H2	H6
8/4/2009	XX	LFUD2X382	432	6.9	20.2				335	5	220	0.6	0.0022
9/1/2009	XX	LFUD2X38B	H2	H2	H2				H2	H2	H2	H2	H6
10/27/2009	XX	LFUD2X3EF	H2	H2	H2				H2	H2	H2	H2	H6
11/11/2009	XX	LFUD2X3F1	457	7.4	18.7				375	6	120	0.5	0.0033
12/8/2009	XX	LFUD2X3G8	320	8.2	12.6				221	6	130	0.4	0.0045
1/21/2010	XX	LFUD2X3H0	335	7.1	11.2				264	6	110	8.2	0.0056
2/23/2010	XX	LFUD2X3HC	309	8.2	15.1				201	6	155	0.2	0.0056
3/17/2010	XX	LFUD2X3I1	296	6.7	17.6				358	5	145	5.2	0.0078
4/27/2010	XX	LFUD2X3JE	250	8	12.9				248	6	140	0.5	0.0045
5/18/2010	XX	LFUD2X40H	286	7.8	19.1				315	4	100	1.1	0.0056
6/22/2010	XX	LFUD2X416	309	7.8	21.1				305	5	130	0.4	0.0045
7/20/2010	XX	LFUD2X421	352	8	22.1				343	5	245	2.4	0.0223
8/30/2010	XX	LFUD2X44A	455	7.6	24.2				303	5	220	8.5	0.0011
9/28/2010	XX	LFUD2X442	499	7.2	20.3				340	6	175	0	0.0022
10/19/2010	XX	LFUD2X462	709	6.8	11.7				438	5	160	0	0.0006
11/11/2010	XX	LFUD2X474	323	8.2	13.1				245	4	135	0.5	0.0033
12/16/2010	XX	LFUD2X480	H2	H2	H2				H2	H2	H2	H2	H2
1/24/2011	XX	LFUD2X47C	286	8	12				251	6	350	0	0.0011
2/24/2011	XX	LFUD2X48H	328	7.6	16.1				321	6	260	0	0.0033
3/25/2011	XX	LFUD2X4C7	H2	H2	H2				H2	H2	H2	H2	H2
4/26/2011	XX	LFUD2X4A3	273	7.7	17.2				325	5	35	0.8	0.0056
5/25/2011	XX	LFUD2X4F6	H2	H2	H2				H2	H2	H2	H2	H2
6/20/2011	XX	LFUD2X4FH	H2	H2	H2				H2	H2	H2	H2	H2
7/19/2011	XX	LFUD2X4E1	277	7.4	23.2				269	5	100	0	0.0045
8/3/2011	XX	LFUD2X4J7	H2	H2	H2				H2	H2	H2	H2	H2
10/8/2011	XX	LFUD2X4IF	291	7.4	24.5				364	6	100	0.1	0.0022
10/25/2011	XX	LFUD2X4HG	302	6.4	18.3				329	6	120	2.7	0.0045
11/30/2011	XX	LFUD2X50A	288	8	19.2				345	6	100	0.27	0.0022
12/29/2011	XX	LFUD2X4J1	288	8.2	16.3				318	9	110	0.2	0.0022
1/26/2012	XX	LFUD2X58A	297	8	16.8				357	8	115	0.37	0.0011

SUMMARY REPORT  
 Field Data

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance	pH	Temperature	Water Level Depth	Water Level Elevation	Well Depth	Corrected Eh	Dissolved Oxygen	Alkalinity (CaCO3) (field)	Turbidity (field)	Flow Rate
			µmhos/cm @25°C	Standard Units	Degrees Celsius	Feet	Feet	mV	mg/L	mg/L	NTU	cf/s	
2/24/2012	XX	LFUD2X592	310	7.3	16.8				273	4	130	0.82	0.0011
3/23/2012	XX	LFUD2X59D	302	7.25	17.9				393	5	125	0.26	0.0011
4/16/2012	XX	LFUD2X5A4	311	7	20.9				391	6	130	0.18	0.0011
4/24/2012	XX	LFUD2X526	H2	H2	H2				H2	H2	H2	H2	H2
5/3/2012	XX	LFUD2X5AF	318	6.9	18.5				458	6	115	0.1	0.0011
6/29/2012	XX	LFUD2X5B6	305	6.8	22.8				444	6	100	0.21	0.0011
7/24/2012	XX	LFUD2X575	316	6.8	22.6				495	5	225	1.5	0.0056
7/31/2012	XX	LFUD2X5BH	345	7.1	28.4				364	8	120	0.01	0.0011
8/31/2012	XX	LFUD2X5EI	368	6.8	22.6				349	6	125	0	0.0011
9/27/2012	XX	LFUD2X5F9	321	8.1	21.3				360	6	150	0.01	0.0006
10/23/2012	XX	LFUD2X5DG	307	7.1	14.3				518	5	100	1.2	0.0045
11/13/2012	XX	LFUD2X5G0	276	8	17.5				346	6	115	0.63	0.0011
12/31/2012	XX	LFUD2X5GB	293	7.7	13.7				399	6	115	0.72	0.0003

LF-UD-3A,B

1/24/2007	XX	LFUD3X24C	482	6.2	7.5				372	4	90	1.8	0.0045
2/22/2007	XX	LFUD3X25A	471	8.3	5				209	5	110	0	0.0022
3/21/2007	XX	LFUD3X25H	249	7	9.7				278	5	135	0.4	0.0017
4/26/2007	XX	LFUD3X264	339	8	14.2				335	6	125	0	0.0045
5/16/2007	XX	LFUD3X246	386	8	11.1				373	6	150	0.3	0.0011
6/21/2007	XX	LFUD3X28E	443	6.8	19.8				300	6	195	2.1	0.0022
7/25/2007	XX	LFUD3X288	F6	F6	F6				F6	F6	F6	F6	F6
8/16/2007	XX	LFUD3X284	F6	F6	F6				F6	F6	F6	F6	F6
9/12/2007	XX	LFUD3X2AI	F6	F6	F6				F6	F6	F6	F6	F6
10/24/2007	XX	LFUD3X28A	F6	F6	F6				F6	F6	F6	F6	F6
11/27/2007	XX	LFUD3X28G	329	7.7	11.7				247	6	90	0.5	0.0033
12/18/2007	XX	LFUD3X2C2	219	7.8	6.8				356	6	85	1	0.0022
1/9/2008	XX	LFUD3X2C8	126	6.5	9.3				249	6	90	0.6	0.0067
2/25/2008	XX	LFUD3X2F0	294	7.9	7.7				302	7.7	105	0.8	0.0045
3/13/2008	XX	LFUD3X2F6	236	8.2	7.7				311	5	90	0	0.0056
4/17/2008	XX	LFUD3X2FC	311	7.2	14.9				315	6	190	0.9	0.0022
5/20/2008	XX	LFUD3X2EE	314	8	13.3				337	6	160	1.8	0.0045
6/9/2008	XX	LFUD3X2I2	269	7.4	15.8				288	6	150	1	0.0033
7/28/2008	XX	LFUD3X2HG	D	D	D				D	D	D	D	D
8/28/2008	XX	LFUD3X30C	D	D	D				D	D	D	D	D
9/25/2008	XX	LFUD3X30I	D	D	D				D	D	D	D	D
10/29/2008	XX	LFUD3X306	F6	F6	F6				F6	F6	F6	F6	F6
11/17/2008	XX	LFUD3X314	F6	F6	F6				F6	F6	F6	F6	F6
12/23/2008	XX	LFUD3X31A	D	D	D				D	D	D	D	D
1/14/2009	XX	LFUD3X341	F6	F6	F6				F6	F6	F6	F6	F6
2/2/2009	XX	LFUD3X348	F6	F6	F6				F6	F6	F6	F6	F6
3/11/2009	XX	LFXXX34G	F6	F6	F6				F6	F6	F6	F6	F6
4/15/2009	XX	LFXXX33F	411	8.1	14.8				447	5	200	0.5	0.0033
5/28/2009	XX	LFXXX354	505	7.7	16.7				94	6	185	5	0.0003
6/23/2009	XX	LFXXX35C	H2	H2	H2				H2	H2	H2	H2	H2
7/8/2009	XX	LFXXX37I	H2	H2	H2				H2	H2	H2	H2	H2
8/4/2009	XX	LFXXX386	401	6.9	19.7				274	6	275	1.8	0.0006
9/1/2009	XX	LFXXX38F	H2	H2	H2				H2	H2	H2	H2	H2
10/27/2009	XX	LFXXX39C	H2	H2	H2				H2	H2	H2	H2	H2
11/1/2009	XX	LFXXX3G2	F6	F6	F6				F6	F6	F6	F6	F6

SUMMARY REPORT  
 Field Data

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance		pH	Temperature	Water Level Depth	Water Level Elevation	Well Depth	Corrected Eh	Dissolved Oxygen	Alkalinity (CaCO3) (field)	Turbidity (field)	Flow Rate
			µmhos/cm @25°C	Fect										
12/8/2009	XX	LFUD3A3GC	439		8.4	10.3				215	5	170	0.5	0.0056
1/21/2010	XX	LFUD3A3H4	405		7.5	9.4				248	6	185	1.2	0.0033
2/23/2010	XX	LFUD3A3HG	402		8.2	13.6				215	5	190	0.1	0.0045
3/17/2010	XX	LFUD3A3I5	490		6.6	18.3				340	5	205	1.9	0.0067
4/27/2010	XX	LFXXX40C	408		7.9	14.3				270	6	160	0.4	0.0045
5/18/2010	XX	LFUD3A411	400		7.9	19.1				315	5	160	0.5	0.0022
6/22/2010	XX	LFUD3A419	F6		F6	F6				F6	F6	F6	F6	F6
7/20/2010	XX	LFXXX43G	F6		F6	F6				F6	F6	F6	F6	F6
8/30/2010	XX	LFUD3A44D	F6		F6	F6				F6	F6	F6	F6	F6
9/28/2010	XX	LFUD3A445	F6		F6	F6				F6	F6	F6	F6	F6
10/19/2010	XX	LFXXX46J	F6		F6	F6				F6	F6	F6	F6	F6
11/11/2010	XX	LFUD3A477	565		8.2	14.7				201	5	200	0.6	0.0022
12/16/2010	XX	LFUD3A483	H2		H2	H2				H2	H2	H2	H2	H2
1/24/2011	XX	LFUD3A47F	385		8.1	14.2				255	8	475	0	0.0011
2/24/2011	XX	LFUD3A4C0	453		7.3	17.8				326	6	360	0	0.0022
3/25/2011	XX	LFUD3A4CA	H2		H2	H2				H2	H2	H2	H2	H2
4/26/2011	XX	LFXXX481	370		7.9	17.4				309	5	265	0.5	0.0045
5/25/2011	XX	LFUD3A4F9	H2		H2	H2				H2	H2	H2	H2	H2
6/20/2011	XX	LFUD3A4G0	H2		H2	H2				H2	H2	H2	H2	H2
7/19/2011	XX	LFXXX4EJ	H2		H2	H2				H2	H2	H2	H2	H2
8/3/2011	XX	LFUD3A4JA	H2		H2	H2				H2	H2	H2	H2	H2
10/8/2011	XX	LFUD3A4II	H8		H8	H8				H8	H8	H8	H8	H8
10/25/2011	XX	LFXXX4IC	F6		F6	F6				F6	F6	F6	F6	F6
11/30/2011	XX	LFUD3A50D	H8		H8	H8				H8	H8	H8	H8	H8
12/29/2011	XX	LFUD3A50I	H8		H8	H8				H8	H8	H8	H8	H8
1/26/2012	XX	LFXXX68D	H8		H8	H8				H8	H8	H8	H8	H8
2/24/2012	XX	LFXXX68E	H8		H8	H8				H8	H8	H8	H8	H8
3/23/2012	XX	LFXXX69G	F6		F6	F6				F6	F6	F6	F6	F6
4/16/2012	XX	LFXXX6A7	F6		F6	F6				F6	F6	F6	F6	F6
4/24/2012	XX	LFXXX63A	H2		H2	H2				H2	H2	H2	H2	H2
5/3/2012	XX	LFXXX65A	H8		H8	H8				H8	H8	H8	H8	H8
6/29/2012	XX	LFXXX6B9	H8		H8	H8				H8	H8	H8	H8	H8
7/24/2012	XX	LFXXX681	F6		F6	F6				F6	F6	F6	F6	F6
7/31/2012	XX	LFXXX6C0	H8		H8	H8				H8	H8	H8	H8	H8
8/31/2012	XX	LFXXX6F1	H8		H8	H8				H8	H8	H8	H8	H8
9/27/2012	XX	LFXXX6FC	H8		H8	H8				H8	H8	H8	H8	H8
10/23/2012	XX	LFXXX6EC	F6		F6	F6				F6	F6	F6	F6	F6
11/13/2012	XX	LFXXX6G3	H8		H8	H8				H8	H8	H8	H8	H8
12/31/2012	XX	LFXXX6GE	H8		H8	H8				H8	H8	H8	H8	H8
<b>LF-UD-4</b>														
3/11/2009	XX	LFXXX34I	F6		F6	F6				F6	F6	F6	F6	F6
4/15/2009	XX	LFXXX34A	366		7.2	13				491	6	120	0.8	0.0033
5/28/2009	XX	LFXXX35E	F6		F6	F6				F6	F6	F6	F6	F6
6/23/2009	XX	LFXXX35E	H2		H2	H2				H2	H2	H2	H2	H2
7/8/2009	XX	LFXXX380	H2		H2	H2				H2	H2	H2	H2	H2
8/4/2009	XX	LFXXX388	F6		F6	F6				F6	F6	F6	F6	F6
9/1/2009	XX	LFXXX38H	H2		H2	H2				H2	H2	H2	H2	H2
10/27/2009	XX	LFXXX3FE	H2		H2	H2				H2	H2	H2	H2	H2
11/11/2009	XX	LFXXX3G4	562		7.2	20				418	6	110	1.1	0.0045

SUMMARY REPORT  
 Field Data

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
12/8/2009	XX	LFUD4X3GE	470	8.3	12.1				218	5	115	0	0.0022
1/21/2010	XX	LFUD4X3H6	473	7.4	11.1				263	6	125	0	0.0056
2/23/2010	XX	LFUD4X3HI	406	7.8	14.1				322	5	170	0	0.0078
3/17/2010	XX	LFUD4X3I7	427	6.9	17.1				322	5	145	2.6	0.0067
4/27/2010	XX	LFXXX40E	F6	F6	F6				F6	F6	F6	F6	F6
5/18/2010	XX	LFUD4X413	371	7.1	18.8				325	4	125	1.1	H6
6/22/2010	XX	LFUD4X41B	373	7	21.3				321	5	165	0	H6
7/20/2010	XX	LFXXX43	F6	F6	F6				F6	F6	F6	F6	F6
8/30/2010	XX	LFUD4X44F	464	7.4	23.8				303	6	215	9.1	0.0011
9/28/2010	XX	LFUD4X447	F6	F6	F6				F6	F6	F6	F6	F6
10/19/2010	XX	LFXXX471	F6	F6	F6				F6	F6	F6	F6	F6
11/11/2010	XX	LFUD4X479	459	7.3	14.7				233	4	125	0.2	H6
12/16/2010	XX	LFUD4X485	H2	H2	H2				H2	H2	H2	H2	H2
1/24/2011	XX	LFUD4X47H	H6	H6	H6				H6	H6	H6	H6	H6
2/24/2011	XX	LFUD4X4C2	H8	H8	H8				H8	H8	H8	H8	H8
3/25/2011	XX	LFUD4X4CC	H2	H2	H2				H2	H2	H2	H2	H2
4/26/2011	XX	LFXXX483	F12	F12	F12				F12	F12	F12	F12	F12
5/25/2011	XX	LFUD4X4FB	H2	H2	H2				H2	H2	H2	H2	H2
6/20/2011	XX	LFUD4X4G2	H2	H2	H2				H2	H2	H2	H2	H2
7/19/2011	XX	LFXXXHG2	H2	H2	H2				H2	H2	H2	H2	H2
8/3/2011	XX	LFUD4X4JC	H2	H2	H2				H2	H2	H2	H2	H2
10/8/2011	XX	LFUD4X4J0	H2	H2	H2				H2	H2	H2	H2	H2
10/25/2011	XX	LFXXX4GA	F6	F6	F6				F6	F6	F6	F6	F6
11/30/2011	XX	LFUD4X50F	H2	H2	H2				H2	H2	H2	H2	H2
12/29/2011	XX	LFUD4X503	H2	H2	H2				H2	H2	H2	H2	H2
1/26/2012	XX	LFUD4X58F	H2	H2	H2				H2	H2	H2	H2	H2
2/24/2012	XX	LFUD4X596	H8	H8	H8				H8	H8	H8	H8	H8
3/23/2012	XX	LFUD4X59H	444	7.3	17.3				395	5	200	0.29	0.0006
4/16/2012	XX	LFUD4X5A8	437	7.2	20.7				390	8	200	0.32	0.0011
4/24/2012	XX	LFXXX536	H2	H2	H2				H2	H2	H2	H2	H2
5/3/2012	XX	LFUD4X5AJ	H2	H2	H2				H2	H2	H2	H2	H2
6/29/2012	XX	LFUD4X5BA	H8	H8	H8				H8	H8	H8	H8	H8
7/24/2012	XX	LFXXX682	434	6.9	23.2				488	6	300	1.2	0.0045
7/31/2012	XX	LFUD4X5C1	457	7.3	30.7				403	8	140	0.19	0.0006
8/31/2012	XX	LFUD4X5F2	485	6.9	22.6				375	5	200	0.11	0.0006
9/27/2012	XX	LFUD4X5FD	447	7.9	21				375	6	170	0.03	0.0006
10/23/2012	XX	LFXXX6CA	362	7	16.2				571	5	150	1.6	0.0022
11/13/2012	XX	LFUD4X5G4	387	7.8	17.3				355	6	200	0.85	0.0003
12/31/2012	XX	LFUD4X5GF	416	7.8	12.1				358	6	165	0.49	0.0003
<b>LF-UD-5</b>													
12/8/2009	XX	LFUD5X3G1	395	8.3	4.2				264	6	125	0.1	0.0067
1/21/2010	XX	LFUD5X3HA	350	7.6	6.1				309	5	120	0	0.0033
2/23/2010	XX	LFUD5X3HU	337	7.9	7				220	6	135	0.4	0.0078
3/17/2010	XX	LFUD5X3B8	337	7.3	9.5				324	6	130	0.9	0.0056
4/27/2010	XX	LFXXX40F	345	7.4	10.1				285	5	130	0.4	0.0045
5/18/2010	XX	LFUD5X414	349	7.6	12.3				285	5	105	0.2	0.0067
<b>LF-UD-Sand6</b>													
6/22/2010	XX	LFUD5X41C	355	7.7	18.9				328	6	140	6.5	0.0022

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
7/20/2010	XX	LFXXX43J	407	7	19.1				213	6	200	1.5	0.0002
8/30/2010	XX	LFUDS44G	470	7.8	23.3				324	6	245	8.1	0.0006
9/28/2010	XX	LFUDS448	428	7	18.2				332	6	160	0	0.0033
10/19/2010	XX	LFXXX472	652	6.9	10.9				434	5	150	4.2	0.0006
11/11/2010	XX	LFUDS47A	440	8.1	10.7				238	4	150	238	0.0022
12/16/2010	XX	LFUDS486	472	6.7	8.9				307	6	165	0	0.0022
1/24/2011	XX	LFUDS471	414	8	13.4				275	6	435	0	0.0045
2/24/2011	XX	LFUDS4C3	515	7.3	16.1				354	5	375	1.2	0.0022
3/25/2011	XX	LFUDS4CD	440	7.6	13.7				281	8	150	1.5	0.0022
4/26/2011	XX	LFXXX4B4	450	6.9	16.8				367 G7	5	415	1.5	0.0033
5/25/2011	XX	LFUDS4FC	510 G7	7.4 G7	20.7 G7				382	8 G7	113 G7	18 G7	
6/20/2011	XX	LFUDS4G3	469	7.2	22.6				403	5	175	0	0.0022
7/19/2011	XX	LFXXX4F2	440	7.3	21.9				348	8	150	4.3	
8/3/2011	XX	LFUDS4JD	458	7.8	21.2				358	8	150	11.6	
10/8/2011	XX	LFUDS4J1	447	7.7	20.3				250	5	240	5.5	0.0028
10/25/2011	XX	LFXXX4G7	476	7.3	17.8				347	8	150	6.14	
11/30/2011	XX	LFUDS60G	443	7.6	15.7				333	8	118	2.9	
12/29/2011	XX	LFUDS504	477	7.9	15.7				359	8	150	14.95	
1/28/2012	XX	LFXXX56G	473	8.3	11.9				382	5	175	3.16	
2/24/2012	XX	LFXXX597	460	8.1	15.2				357	6	200	6.06	
3/23/2012	XX	LFXXX591	486	7.8	16.6				427	6	95	4.6	
4/16/2012	XX	LFXXX6A9	467	8	22.8				416	6	160	1.16	
4/24/2012	XX	LFXXX637	389	7.4	18.8				355	6	200	0.13	
5/3/2012	XX	LFXXX650	491	8	17.4				317	6	200	0.12	
6/29/2012	XX	LFXXX68B	473	7.2	23.1				354	6	170	30.88	
7/24/2012	XX	LFXXX694	482	7.3	22.4				423	4	160	6.7	
7/31/2012	XX	LFXXX6C2	500	7.5	23.6				390	7	175	0.2	
8/31/2012	XX	LFXXX6F3	514	7.3	21.5				303	8	125	1.48	0.0003
9/27/2012	XX	LFXXX6FE	407	7.9	18								
10/23/2012	XX	LFXXX6C7	498	7.3	14.5								
11/13/2012	XX	LFXXX6G5	378	7.3	16.8								
12/31/2012	XX	LFXXX6GG	368	8.3	10.7								

**LF-UD-6**

2/3/2011	XX	LFXX6X48H	502	7.4	10.4				446	5	163	1	0.0006
2/24/2011	XX	LFUD6X4C5	640	7.2	12				353	6	88	4.2	0.0045
3/25/2011	XX	LFUD6X4CE	567	7.2	11.2				191	6	490	1.2	
4/26/2011	XX	LFUD6X4B6	611	6.9	11.6				348	5	150	3.7	
5/25/2011	XX	LFUD6X4FD	613	7.4	18				383	6	125	3.8	
6/20/2011	XX	LFUD6X4G4	559	7.3	19.4				414	4	200	25.1	0.0022
7/19/2011	XX	LFUD6X4F4	529	7	23.1				385	6	125	23.2	
8/3/2011	XX	LFUD6X4JE	555	7.2	18.2				296	5	280	1.2	0.0022
10/8/2011	XX	LFUD6X4J2	555	7.2	18.9				367	6	145	1	
10/25/2011	XX	LFUD6X4G9	603	7.1	16.4				340	5	225	0.8	
11/30/2011	XX	LFUD6X50H	567	7.2	16.3				379	4	175	5.54	
12/29/2011	XX	LFUD6X505	588	7.3	15.1				375	5	250	27.87	
1/26/2012	XX	LFUD6X58H	580	7.4	14.7				387	5	205	13.84	
2/24/2012	XX	LFUD6X598	559	7.3	15.3				381	7	250	2.47	
3/23/2012	XX	LFUD6X59J	556	7.5	16.4								
4/16/2012	XX	LFUD6X5AA	557	7.2	21.6								

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

(LF-UD-6)		Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO <sub>3</sub> ) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
Date	Type	Sample ID										
4/24/2012	XX	LFUD6X339	7.4	16.8				490	4	105	4.2	
5/3/2012	XX	LFUD6X5B1	7.2	17.2				390	8	260	5.72	
6/29/2012	XX	LFUD6X5BC	7.1	19.7				415	6	250	11.23	
7/24/2012	XX	LFUD6X5B6	7	20.3				409	5	360	4	0.0022
7/31/2012	XX	LFUD6X5C3	7.1	20.05				352	6	275	0.3	
8/31/2012	XX	LFUD6X5F4	7.1	19.3				329	4	175	0.98	
9/27/2012	XX	LFUD6X5FF	7.2	17.2				372	5	165	0.57	
10/23/2012	XX	LFUD6X5C9	7.1	13.7				443	5	240	0.8	0.0022
11/13/2012	XX	LFUD6X5G6	7.2	16.8				377	5	250	1.5	
12/31/2012	XX	LFUD6X5GH	7.2	14.7				362	6	250	0.82	
<b>LF-UD-7</b>												
11/30/2011	XX	LFUD7X510	H2	H2				H2	H2	H2	H2	
12/29/2011	XX	LFUD7X508	H2	H2				H2	H2	H2	H2	
1/26/2012	XX	LFUD7X500	H8	H8				H8	H8	H8	H8	
2/24/2012	XX	LFUD7X598	H8	H8				H8	H8	H8	H8	
3/23/2012	XX	LFUD7X5A2	F6	F6				F6	F6	F6	F6	
4/16/2012	XX	LFUD7X5AD	F6	F6				F6	F6	F6	F6	
4/24/2012	XX	LFUD7X53A	H2	H2				H2	H2	H2	H2	
5/3/2012	XX	LFUD7X5B4	H2	H2				H2	H2	H2	H2	
6/29/2012	XX	LFUD7X5BF	H8	H8				H8	H8	H8	H8	
7/24/2012	XX	LFXXX5B87	F6	F6				F6	F6	F6	F6	
7/31/2012	XX	LFUD7X5C6	H8	H8				H8	H8	H8	H8	
8/31/2012	XX	LFUD7X5F7	H8	H8				H8	H8	H8	H8	
9/27/2012	XX	LFUD7X5F1	H8	H8				H8	H8	H8	H8	
10/23/2012	XX	LFXXX5B8F	F6	F6				F6	F6	F6	F6	
11/13/2012	XX	LFUD7X5G9	H8	H8				H8	H8	H8	H8	
12/31/2012	XX	LFUD7X5GJ	H8	H8				H8	H8	H8	H8	
<b>LP-COMP</b>												
10/27/2004	XX	LPCOMP02	6.8	12.4				336	6	260	0	
10/21/2005	XX	LPXXX1B8	7.5	10.2				222	3	125	1.2	
2/23/2006	XX	LPXXX1CE	7.3	6.5				375	6	125	1.9	
6/13/2006	XX	LPCOMX1B	260	7.3	16.2			371	5	175	1.2	
8/16/2006	XX	LPXXX0212	334	7.3	20.7			289	4	110	0	
12/5/2006	XX	LPXXX021J	405	8.4	6.6			191	4	135	1.2	
1/24/2007	XX	LPXXX024D	415	6.7	10.3			433	5	85	0.6	
2/22/2007	XX	LPXXX025B	419	6.9	7.7			306	5	120	4	
8/1/2011	XX	LPCMPX4JG	315	7.1	21.4			346	6	83	0.1	
10/8/2011	XX	LPCMPX4J5	296	7.2	18.2			377	5	95	1.2	
11/30/2011	XX	LPCMPX60J	296	7.2	10.3			372	5	90	0.4	
12/29/2011	XX	LPCMPX507	315	7.6	8.3			374	10	110	3.1	
1/26/2012	XX	LPCMPX58J	315	7.6	9.1			371	6	110	1.47	
2/24/2012	XX	LPCMPX59A	323	7.8	13			354	8	125	1.74	
3/23/2012	XX	LPCMPX5A1	320	7.6	15.3			360	6	125	0.39	
4/16/2012	XX	LPCMPX5AC	331	7.3	13.2			377	6	150	0.48	
5/3/2012	XX	LPCMPX5B3	324	7.4	14.3			395	10	120	0.42	
7/31/2012	XX	LPCMPX5C5	355	7	22			363	8	125	0.79	
<b>LP-LD-1</b>												
7/28/2004	XX	LPLD1X051	835	7.5	12.4			277	6	300	1.9	

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance	pH	Temperature	Water Level	Water Level	Water Level	Well Depth	Corrected Eh	Dissolved Oxygen	Alkalinity (CaCO <sub>3</sub> )	Turbidity (field)	Flow Rate
			µmhos/cm @25°C	Standard Units	Degrees Celsius	Depth Feet	Elevation Feet	Feet	mV	mg/L	mg/L	(field) NTU	cfs	
8/30/2004	XX	LPLD1X082	316	6.9	17.2					301	6	165	12.5	
9/27/2004	XX	LPLD1X088	630	7.4	19.7					277	5	325	1.1	
10/27/2004	XX	LPLD1X07A	467	7.9	12.4					326	5	200	3.4	
11/23/2004	XX	LPLD1X103	487	7.9	9.7					269	6	175	4.9	
12/22/2004	XX	LPLD1X109	497	7	7.5					195	8	250	15.4	
1/26/2005	XX	LPLD1X11B	D	D	D					D	D	D	D	
2/24/2005	XX	LPLD1X111	168	7.5	4.3					265	5	85	0	
3/29/2005	XX	LPLD1X14J	56	6.4	3.2					360	5	35	0	
4/28/2005	XX	LPLD1X154	610	7.3	5.9					398	6	25	25	
5/11/2005	XX	LPLD1X13B	71	7.2	10.9					320	6	60	14	
6/22/2005	XX	LPLD1X17C	120	7.7	12.8					406	6	60	14.5	
7/27/2005	XX	LPLD1X16J	304	7	20.2					343	6	70	0.8	
8/29/2005	XX	LPLD1X1B2	539	6.7	15.9					281	4	160	6.7	
9/21/2005	XX	LPLD1X18H	944	7	16.4					305	6	425	4.5	
10/21/2005	XX	LPLD1X1B7	105	8.3	9.3					227	4	45	2.3	
11/21/2005	XX	LPLD1X18E	124	7.6	11.6					238	5	60	1.8	
12/27/2005	XX	LPLD1X1C0	639	7.3	4.1					302	6	150	2.6	
1/23/2006	XX	LPLD1X1C5	670	7.5	5.5					398	6	225	1.1	
2/23/2006	XX	LPLD1X1CA	727	7.1	6.5					330	6	290	2.3	
3/15/2006	XX	LPLD1X1CH	402	6.8	3.8					431	6	90	1.7	
4/27/2006	XX	LPLD1X1F1	691	7.2	7.3					353	6	200	3.6	
5/24/2006	XX	LPLD1X1EC	207	7.5	11.6					367	6	75	1.2	
6/13/2006	XX	LPLD1X1I7	103	7	13					460	5	50	3.1	
7/25/2006	XX	LPLD1X1H9	555	6.5	19.6					397	5	280	1.2	
8/16/2006	XX	LPLD1X20J	693	7.5	19					349	4	195	0	
9/11/2006	XX	LPLD1X202	805	7.1	14.9					286	6	135	1.3	
10/19/2006	XX	LPLD1X215	301	7.2	13.2					236	6	130	1.8	
11/21/2006	XX	LPLD1X21B	240	7.6	10					168	6	90	1.2	
12/5/2006	XX	LPLD1X21G	399	7.8	4					330	5	50	5.5	
1/24/2007	XX	LPLD1X249	357	6.5	9.2					419	4	50	3.5	
2/22/2007	XX	LPLD1X257	517	7	3.7					227	6	130	0	
3/21/2007	XX	LPLD1X25E	L	L	L					L	L	L	L	
4/26/2007	XX	LPLD1X281	212	7.2	7.2					342	5	80	5.1	
5/16/2007	XX	LPLD1X239	500	6.6	10.1					270	5	200	2.5	
6/21/2007	XX	LPLD1X28B	453	6.4	10.8					314	6	210	2.2	
7/25/2007	XX	LPLD1X27D	788	7.2	18.6					232	3	325	2.9	
8/16/2007	XX	LPLD1X281	781	7.2	14.9					244	6	355	2.8	
9/12/2007	XX	LPLD1X2A3	695	7.7	15.9					115	4	370	2.6	
10/24/2007	XX	LPLD1X2B7	774	8.1	12.8					176	6	60	1.2	
11/27/2007	XX	LPLD1X2BD	187	7.7	7.3					252	6	55	2.2	
12/18/2007	XX	LPLD1X2BJ	545	5.8	3.1					322	6	50	1.1	
1/9/2008	XX	LPLD1X2C5	329	6.9	7.4					258	6	250	0.8	
2/25/2008	XX	LPLD1X2EH	303	7.8	5.2					336	6	110	0.6	
3/13/2008	XX	LPLD1X2F3	192	8.3	1.2					321	5	60	1.7	
4/17/2008	XX	LPLD1X2F9	121	7.9	7.2					293	6	60	2.7	
5/20/2008	XX	LPLD1X2DH	129	8.1	8.8					379	6	70	2.2	
6/9/2008	XX	LPLD1X2HJ	140	7.9	12.3					307	6	45	1.6	
7/28/2008	XX	LPLD1X2H1	252	6.9	22.6					391	4	115	0	
8/28/2008	XX	LPLD1X309	430	7.8	15.8					293	3	125	1.8	
9/25/2008	XX	LPLD1X30F	254	7.1	14.9					226	3	115	0.7	

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Specific Conductance	pH	Temperature	Water Level	Water Level	Well Depth	Corrected Eh	Dissolved Oxygen	Alkalinity (CaCO3)	Turbidity (field)	Flow Rate
			µmhos/cm @25°C	Standard Units	Degrees Celsius	Depth	Elevation	Feet	mV	mg/L	mg/L	NTU	cfm
10/29/2008	XX	LPLD1X2JB	290	7.6	9.4				383	5	115	1.2	
11/17/2008	XX	LPLD1X311	331	7.7	10.3				354	6	160	1.2	
12/23/2008	XX	LPLD1X317	321	7.7	6.9				210	5	95	1.1	
1/14/2009	XX	LPLD1X331	292	8.6	4.1				169	5	55	0.7	
2/2/2009	XX	LPLD1X345	315	7.6	5.7				371	5	95	1.7	
3/11/2009	XX	LPLD1X34D	A	A	A				A	A	A	A	
4/15/2009	XX	LPLD1X32J	627	6.6	7.4				503	5	130	0.5	
5/28/2009	XX	LPLD1X351	366	7	14.6				283	6	120	2.3	
6/23/2009	XX	LPLD1X359	180	8	11.1				327	4	40	8.7	
7/8/2009	XX	LPLD1X373	145	7.6	17.1				246	4	35	0.3	
8/4/2009	XX	LPLD1X383	154	6.7	23.5				260	5	55	0.9	
9/1/2009	XX	LPLD1X38C	162	7.4	17.6				317	5	70	1.7	
10/27/2009	XX	LPLD1X3E1	227	7.8	11.2				409	5	30	3.6	
11/11/2009	XX	LPLD1X3FJ	328	7.1	12.2				408	5	65	1.6	
12/8/2009	XX	LPLD1X3G9	310	7.8	7.1				286	4	90	0	
1/21/2010	XX	LPLD1X3H1	337	7.5	6.2				309	3	95	0	
2/23/2010	XX	LPLD1X3HD	241	7.4	6.3				220	6	105	0.1	
3/17/2010	XX	LPLD1X3I2	202	7.4	8.2				313	6	140	2.3	
4/27/2010	XX	LPLD1X3JH	343	6.4	7.8				295	5	100	0.5	
7/20/2010	XX	LPLD1X431	406	6.6	14.2				408	5	210	2.4	
10/19/2010	XX	LPLD1X465	536	6.9	9.2				324	4	110	0.3	
4/26/2011	XX	LPLD1X4A6	173	7.7	8				210	6	150	2.5	
7/19/2011	XX	LPLD1X4E4	212	7.7	16.4				263	3	75	0	
10/25/2011	XX	LPLD1X4HJ	336	7.4	13.3				186	5	130	0	
4/24/2012	XX	LPLD1X529	184	8	7				383	6	65	2	
7/24/2012	XX	LPLD1X578	206	7.5	15.4				381	5	110	2.1	
10/23/2012	XX	LPLD1X5DU	123	7.1	13.2				411	5	100	1.5	
<b>LP-UD-1</b>													
7/28/2004	XX	LPUJ1X05G	D	D	D				D	D	D	D	
8/30/2004	XX	LPUJ1X083	D	D	D				D	D	D	D	
9/27/2004	XX	LPUJ1X089	D	D	D				D	D	D	D	
10/27/2004	XX	LPUJ1X078	H2	H2	H2				H2	H2	H2	H2	
11/23/2004	XX	LPUJ1X104	D	D	D				D	D	D	D	
12/22/2004	XX	LPUJ1X10A	D	D	D				D	D	D	D	
1/26/2005	XX	LPUJ1X11C	D	D	D				D	D	D	D	
2/24/2005	XX	LPUJ1X11J	D	D	D				D	D	D	D	
3/29/2005	XX	LPUJ1X150	517	6.8	8.3				368	5	125	0	
4/28/2005	XX	LPUJ1X155	D	D	D				D	D	D	D	
5/11/2005	XX	LPUJ1X139	D	D	D				D	D	D	D	
6/22/2005	XX	LPUJ1X17D	D	D	D				D	D	D	D	
7/27/2005	XX	LPUJ1X16H	D	D	D				D	D	D	D	
8/29/2005	XX	LPUJ1X1B3	D	D	D				D	D	D	D	
9/21/2005	XX	LPUJ1X19F	D	D	D				D	D	D	D	
11/21/2005	XX	LPUJ1X1BF	D	D	D				D	D	D	D	
12/27/2005	XX	LPUJ1X1C1	D	D	D				D	D	D	D	
1/23/2006	XX	LPUJ1X1C6	F6	F6	F6				F6	F6	F6	F6	
3/15/2006	XX	LPUJ1X1CI	D	D	D				D	D	D	D	
4/27/2006	XX	LPUJ1X1FJ	D	D	D				D	D	D	D	
5/24/2006	XX	LPUJ1X1EA	D	D	D				D	D	D	D	

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
6/13/2006	XX	LPUD1X11B	H5	H5	H5				H5	H5	H5	H5	
7/26/2006	XX	LPUD1X1H7	F6	F6	F6				F6	F6	F6	F6	
8/16/2006	XX	LPUD1X210	H5	H5	H5				H5	H5	H5	H5	
9/11/2006	XX	LPUD1X200	F6	F6	F6				F6	F6	F6	F6	
10/19/2006	XX	LPUD1X216	F6	F6	F6				F6	F6	F6	F6	
11/21/2006	XX	LPUD1X21C	D	D	D				D	D	D	D	
12/5/2006	XX	LPUD1X21H	H5	H5	H5				H5	H5	H5	H5	
1/24/2007	XX	LPUD1X24A	H5	H5	H5				H5	H5	H5	H5	
2/22/2007	XX	LPUD1X258	H5	H5	H5				H5	H5	H5	H5	
3/21/2007	XX	LPUD1X25F	F6	F6	F6				F6	F6	F6	F6	
4/26/2007	XX	LPUD1X262	F6	F6	F6				F6	F6	F6	F6	
5/16/2007	XX	LPUD1X237	F6	F6	F6				F6	F6	F6	F6	
6/21/2007	XX	LPUD1X28C	F6	F6	F6				F6	F6	F6	F6	
7/25/2007	XX	LPUD1X27B	F6	F6	F6				F6	F6	F6	F6	
8/16/2007	XX	LPUD1X2B2	F6	F6	F6				F6	F6	F6	F6	
9/12/2007	XX	LPUD1X2A1	F6	F6	F6				F6	F6	F6	F6	
10/24/2007	XX	LPUD1X2B8	F6	F6	F6				F6	F6	F6	F6	
11/27/2007	XX	LPUD1X2BE	F6	F6	F6				F6	F6	F6	F6	
12/18/2007	XX	LPUD1X2C0	F6	F6	F6				F6	F6	F6	F6	
1/9/2008	XX	LPUD1X2C6	F6	F6	F6				F6	F6	F6	F6	
2/25/2008	XX	LPUD1X2EI	F6	F6	F6				F6	F6	F6	F6	
3/13/2008	XX	LPUD1X2F4	F6	F6	F6				F6	F6	F6	F6	
4/17/2008	XX	LPUD1X2FA	F6	F6	F6				F6	F6	F6	F6	
5/20/2008	XX	LPUD1X2DF	F6	F6	F6				F6	F6	F6	F6	
6/9/2008	XX	LPUD1X2I0	F6	F6	F6				F6	F6	F6	F6	
7/28/2008	XX	LPUD1X2GJ	D	D	D				D	D	D	D	
8/28/2008	XX	LPUD1X30A	D	D	D				D	D	D	D	
9/25/2008	XX	LPUD1X30G	F6	F6	F6				F6	F6	F6	F6	
10/29/2008	XX	LPUD1X2J9	F6	F6	F6				F6	F6	F6	F6	
11/17/2008	XX	LPUD1X312	F6	F6	F6				F6	F6	F6	F6	
12/23/2008	XX	LPUD1X318	D	D	D				D	D	D	D	
1/14/2009	XX	LPUD1X33J	F6	F6	F6				F6	F6	F6	F6	
2/2/2009	XX	LPUD1X346	F6	F6	F6				F6	F6	F6	F6	
3/11/2009	XX	LPUD1X34E	F6	F6	F6				F6	F6	F6	F6	
4/15/2009	XX	LPUD1X32H	F6	F6	F6				F6	F6	F6	F6	
5/28/2009	XX	LPUD1X352	F6	F6	F6				F6	F6	F6	F6	
6/23/2009	XX	LPUD1X35A	F6	F6	F6				F6	F6	F6	F6	
7/8/2009	XX	LPUD1X371	F6	F6	F6				F6	F6	F6	F6	
8/4/2009	XX	LPUD1X384	F6	F6	F6				F6	F6	F6	F6	
9/1/2009	XX	LPUD1X38D	F6	F6	F6				F6	F6	F6	F6	
10/27/2009	XX	LPUD1X3EG	F6	F6	F6				F6	F6	F6	F6	
11/11/2009	XX	LPUD1X3G0	F6	F6	F6				F6	F6	F6	F6	
12/8/2009	XX	LPUD1X36A	F6	F6	F6				F6	F6	F6	F6	
1/21/2010	XX	LPUD1X3H2	F6	F6	F6				F6	F6	F6	F6	
2/23/2010	XX	LPUD1X3HE	F6	F6	F6				F6	F6	F6	F6	
3/17/2010	XX	LPUD1X3I3	F6	F6	F6				F6	F6	F6	F6	
4/27/2010	XX	LPUD1X3JF	F6	F6	F6				F6	F6	F6	F6	
5/18/2010	XX	LPUD1X40J	F6	F6	F6				F6	F6	F6	F6	
6/22/2010	XX	LPUD1X417	F6	F6	F6				F6	F6	F6	F6	
7/20/2010	XX	LPUD1X42J	F6	F6	F6				F6	F6	F6	F6	

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance	pH	Temperature	Water Level Depth	Water Level Elevation	Well Depth	Corrected Eh	Dissolved Oxygen	Alkalinity (CaCO3) (field)	Turbidity (field)	Flow Rate
			µmhos/cm @25°C	Standard Units	Degrees Celsius	Feet	Feet	mV	mg/L	NTU	cfis		
8/30/2010	XX	LPUD1X44B	F6	F6	F6				F6	F6	F6	F6	
9/28/2010	XX	LPUD1X443	F6	F6	F6				F6	F6	F6	F6	
10/19/2010	XX	LPUD1X463	F6	F6	F6				F6	F6	F6	F6	
11/11/2010	XX	LPUD1X475	F6	F6	F6				F6	F6	F6	F6	
12/16/2010	XX	LPUD1X481	F6	F6	F6				F6	F6	F6	F6	
1/24/2011	XX	LPUD1X47D	F6	F6	F6				F6	F6	F6	F6	
2/24/2011	XX	LPUD1X48I	F6	F6	F6				F6	F6	F6	F6	
3/25/2011	XX	LPUD1X4C8	F6	F6	F6				F6	F6	F6	F6	
4/26/2011	XX	LPUD1X4A4	F6	F6	F6				F6	F6	F6	F6	
5/25/2011	XX	LPUD1X4F7	F6	F6	F6				F6	F6	F6	F6	
6/20/2011	XX	LPUD1X4F1	F6	F6	F6				F6	F6	F6	F6	
7/19/2011	XX	LPUD1X4E2	F6	F6	F6				F6	F6	F6	F6	
8/1/2011	XX	LPUD1X4J8	H9	H9	H9				H9	H9	H9	H9	
10/8/2011	XX	LPUD1X4IG	H9	H9	H9				H9	H9	H9	H9	
10/25/2011	XX	LPUD1X4HH	F6	F6	F6				F6	F6	F6	F6	
11/30/2011	XX	LPUD1X50B	H9	H9	H9				H9	H9	H9	H9	
12/29/2011	XX	LPUD1X4JJ	H9	H9	H9				H9	H9	H9	H9	
1/26/2012	XX	LPUD1X58B	H9	H9	H9				H9	H9	H9	H9	
2/24/2012	XX	LPUD1X593	H9	H9	H9				H9	H9	H9	H9	
3/23/2012	XX	LPUD1X59E	H9	H9	H9				H9	H9	H9	H9	
4/16/2012	XX	LPUD1X5A5	H5	H5	H5				H5	H5	H5	H5	
4/24/2012	XX	LPUD1X527	F6	F6	F6				F6	F6	F6	F6	
5/3/2012	XX	LPUD1X5AG	H9	H9	H9				H9	H9	H9	H9	
6/29/2012	XX	LPUD1X5B7	F6	F6	F6				F6	F6	F6	F6	
7/24/2012	XX	LPUD1X576	F6	F6	F6				F6	F6	F6	F6	
7/31/2012	XX	LPUD1X5B1	H9	H9	H9				H9	H9	H9	H9	
8/31/2012	XX	LPUD1X5EJ	F6	F6	F6				F6	F6	F6	F6	
9/27/2012	XX	LPUD1X5FA	F6	F6	F6				F6	F6	F6	F6	
10/23/2012	XX	LPUD1X5DH	F6	F6	F6				F6	F6	F6	F6	
11/13/2012	XX	LPUD1X5G1	F6	F6	F6				F6	F6	F6	F6	
12/31/2012	XX	LPUD1X5GC	F6	F6	F6				F6	F6	F6	F6	
<b>LP-UD-2</b>													
7/28/2004	XX	LPUD2X05H	480	6.6	12				332	6	180	0	
8/30/2004	XX	LPUD2X084	519	6.1	16				328	6	175	1.6	
9/27/2004	XX	LPUD2X08A	522	6.9	19.9				322	3	265	0	
10/27/2004	XX	LPUD2X079	656	6.8	12.6				311	5	290	0	
11/23/2004	XX	LPUD2X105	574	7.6	9.8				311	5	185	4.1	
12/22/2004	XX	LPUD2X10B	834	7.2	7.6				243	8	250	3.7	
1/26/2005	XX	LPUD2X11D	580	7.2	6.2				262	5	165	0	
2/24/2005	XX	LPUD2X120	498	6.6	6.1				260	6	190	0.4	
3/29/2005	XX	LPUD2X151	517	6.8	8.3				368	5	125	0	
4/28/2005	XX	LPUD2X156	414	6.9	6.4				335	6	205	5.1	
5/11/2005	XX	LPUD2X13A	377	6.7	10.2				339	8	200	0	
6/22/2005	XX	LPUD2X17E	411	7.6	13.3				377	6	155	4.1	
7/27/2005	XX	LPUD2X16I	375	6.9	16.2				302	4	125	0.9	
8/29/2005	XX	LPUD2X1B4	396	6.7	15.6				253	4	125	60	
9/21/2005	XX	LPUD2X19G	374	7.1	15.3				245	6	190	0	
11/21/2005	XX	LPUD2X1BG	353	7.4	11.8				234	5	155	2.1	
12/27/2005	XX	LPUD2X1C2	430	7.1	4.7				273	6	150	2.5	

SUMMARY REPORT  
 Field Data

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO <sub>3</sub> ) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
1/23/2006	XX	LPUD2X1C7	405	7.2	7.2				273	6	180	1.6	
3/15/2006	XX	LPUD2X1CJ	373	6.8	7.9				324	5	100	1.9	
4/27/2006	XX	LPUD2X1G0	332	7.4	7.2				329	6	130	4.6	
5/24/2006	XX	LPUD2X1EB	349	7.5	12.8				249	5	175	1.5	
6/13/2006	XX	LPUD2X1I9	H5	H5	H5				H5	H5	H5	H5	
7/25/2006	XX	LPUD2X1H8	342	6.4	20.8				231	6	165	1	
8/16/2006	XX	LPUD2X211	H5	H5	H5				H5	H5	H5	H5	
9/11/2006	XX	LPUD2X201	372	6.7	14.9				283	6	110	1.3	
10/19/2006	XX	LPUD2X217	352	7.1	13				246	5	130	2.2	
11/21/2006	XX	LPUD2X21D	289	6.9	10.6				224	1	125	0.8	
12/5/2006	XX	LPUD2X211	H5	H5	H5				H5	H5	H5	H5	
1/24/2007	XX	LPUD2X24B	H5	H5	H5				H5	H5	H5	H5	
2/22/2007	XX	LPUD2X259	H5	H5	H5				H5	H5	H5	H5	
3/21/2007	XX	LPUD2X26G	210	6.9	8.3				357	5	90	0	
4/26/2007	XX	LPUD2X263	352	7	11.4				263	5	135	1.2	
5/16/2007	XX	LPUD2X238	350	6.6	8.9				423	5	170	0.3	
6/21/2007	XX	LPUD2X28D	289	5.9	12.6				330	6	165	2.8	0.0006
7/25/2007	XX	LPUD2X27C	250	7.4	16				359	6	165	3.4	0.0006
8/16/2007	XX	LPUD2X2B3	334	6.7	16				321	6	125	1.8	0.0006
9/12/2007	XX	LPUD2X2A2	350	6.8	16.1				414	6	140	0.8	0.0006
10/24/2007	XX	LPUD2X2B9	464	7	12.1				273	6	125	0.8	0.0006
11/27/2007	XX	LPUD2X2BF	335	7.4	9.7				259	6	110	0.8	0.0006
12/18/2007	XX	LPUD2X2C1	322	7.6	6.6				323	6	115	1.3	0.0006
1/9/2008	XX	LPUD2X2C7	226	6.8	8.6				244	6	135	1.2	0.0033
2/25/2008	XX	LPUD2X2EJ	333	6.9	6.7				368	6	115	1.5	H6
3/13/2008	XX	LPUD2X2F5	309	7.5	2.9				356	5	70	0	H6
4/17/2008	XX	LPUD2X2FB	302	7.3	9.4				311	5	125	0	H6
5/20/2008	XX	LPUD2X2DG	324	7.5	10.6				388	6	145	1.8	0.0033
6/9/2008	XX	LPUD2X311	308	7.1	13.6				373	5	100	0	H6
7/28/2008	XX	LPUD2X2H0	306	6.7	23.8				367	4	140	1	H6
8/28/2008	XX	LPUD2X30B	521	7.3	16.5				325	6	120	0.5	0.0006
9/25/2008	XX	LPUD2X30H	273	6.9	15.4				218	5	110	0.3	H6
10/29/2008	XX	LPUD2X2JA	284	7.6	10.1				511	6	115	1.6	0.0089
11/17/2008	XX	LPUD2X313	282	7.6	9.8				342	5	100	1.3	0.0033
12/23/2008	XX	LPUD2X319	283	7.7	6				220	6	80	2	0.0022 A6
1/14/2009	XX	LPUD2X340	277	7.2	3.1				318	6	70	8.3	0.0022 A6
2/2/2009	XX	LPUD2X347	327	7.4	5.4				364	6	115	4.5	0.0011
3/11/2009	XX	LPUD2X34F	257	6.9	4.9				520	5	100	2.6	0.0033
4/15/2009	XX	LPUD2X321	311	7.1	10.7				307	6	85	0.8	0.0045
5/28/2009	XX	LPUD2X353	380	7	11.6				277	5	135	4.8	0.0022
6/23/2009	XX	LPUD2X35B	296	7.2	13.1				158	5	115	0.6	0.0022
7/8/2009	XX	LPUD2X372	313	7.4	14.1				371	6	125	0	0.0045
8/4/2009	XX	LPUD2X385	311	6.6	18.3				319	6	225	0.9	0.0022
9/1/2009	XX	LPUD2X38E	279	6.6	18.8				179	6	135	0.8	0.0056
10/27/2009	XX	LPUD2X3EH	353	7	10				377	5	50	1.5	0.0045
11/11/2009	XX	LPUD2X3G1	439	7.3	13.6				230	4	100	0.5	0.0045
12/8/2009	XX	LPUD2X3GB	363	7.8	7				301	5	115	0.5	0.0045
1/21/2010	XX	LPUD2X3H3	370	7.5	6.6				210	5	120	0	0.0045
2/23/2010	XX	LPUD2X3HF	353	7.5	7.4				291	6	150	0.2	0.0033
3/17/2010	XX	LPUD2X3I4	324	7.3	9.5						110	0.9	0.0056

SUMMARY REPORT  
 Field Data

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
4/27/2010	XX	LPUD2X3JG	324	6.7	8.8				274	6	110	0	0.0045
5/18/2010	XX	LPUD2X410	318	7.3	12				336	5	80	0.2	0.0022
6/22/2010	XX	LPUD2X418	379	7.1	14.9				358	5	110	0	0.0045
7/20/2010	XX	LPUD2X430	315	7.2	19.5				385	6	160	5.9	0.0022
8/30/2010	XX	LPUD2X440	355	7.2	18.5				271	5	165	0.2	0.0006
9/28/2010	XX	LPUD2X444	312	6.9	17.7				295	6	155	0	0.0022
10/19/2010	XX	LPUD2X464	480	7	10.1				407	6	110	0.1	0.0067
11/11/2010	XX	LPUD2X476	317	7.7	8.9				231	4	125	0	0.0045
12/16/2010	XX	LPUD2X482	331	6.9	7.7				307	5	115	0	0.0045
1/24/2011	XX	LPUD2X47E	302	8	10				273	10	350	0	0.0056
2/24/2011	XX	LPUD2X4BJ	341	7.3	8.4				358	6	260	0	0.0056
3/25/2011	XX	LPUD2X4C9	300	7.3	7.5				337	8	115	0.2	0.0056
4/26/2011	XX	LPUD2X4A5	325	6.9	9.6				361	8	250	1.2	
5/25/2011	XX	LPUD2X4F8	333	7	13				382	8	72.5	0.03	
6/20/2011	XX	LPUD2X4FJ	304	7	18.1				294	5	100	0.6	
7/19/2011	XX	LPUD2X4E3	250	6.7	18.3				F12	F12	F12	F12	0.0033
8/11/2011	XX	LPUD2X4J9	F12	F12	F12				F12	F12	F12	F12	F12
10/8/2011	XX	LPUD2X4IH	H5	H5	H5				H5	H5	H5	H5	H5
10/25/2011	XX	LPUD2X4HI	319	7.3	14.9				284	6	140	0	0.0045
11/30/2011	XX	LPUD2X60C	H5	H5	H5				H5	H5	H5	H5	H5
12/29/2011	XX	LPUD2X500	H5	H5	H5				H5	H5	H5	H5	H5
1/26/2012	XX	LPUD2X68C	H5	H5	H5				H5	H5	H5	H5	H5
2/24/2012	XX	LPUD2X594	H5	H5	H5				H5	H5	H5	H5	H5
3/23/2012	XX	LPUD2X69F	H5	H5	H5				H5	H5	H5	H5	H5
4/16/2012	XX	LPUD2X5A6	F6	F6	F6				F6	F6	F6	F6	F6
4/24/2012	XX	LPUD2X628	200	6.9	10.3				409	6	100	2.5	
5/3/2012	XX	LPUD2X5AH	322	7.6	16.6				422	8	130	0.27	
6/29/2012	XX	LPUD2X688	287	7	17.21				468	6	100	1.23	0.0006
7/24/2012	XX	LPUD2X577	110	6.7	18.9				360	6	185	3	0.0033
7/31/2012	XX	LPUD2X6BJ	338	7	20.3				298	7	125	0.14	0.0011
8/31/2012	XX	LPUD2X9F0	342	6.6	19				368	6	115	0.23	0.0003
9/27/2012	XX	LPUD2X6FB	196	6.8	17.6				453	4	105	0.39	0.0003
10/23/2012	XX	LPUD2X5D1	272	6.8	14.1				364	6	125	1.3	0.0033
11/13/2012	XX	LPUD2X6G2	272	7.2	12.5				350	8	110	0.36	0.0003
12/31/2012	XX	LPUD2X5GD	286	7.4	7.6							0.64	0.0006

LT-C4L

4/15/2009	XX	LTC4LX325	29800	7.1	18.6				95	D2	D3	1100 >	
7/7/2009	XX	LTC4LX369	20000 >	7.6	17.8				217	8	D3	400	
10/28/2009	XX	LTC4LX3E4	24300	7.3	17.6				102	D2	D3	230	
4/28/2010	XX	LTC4LX3L3	23200	7.3	17.7				145	2	1813	170	
7/20/2010	XX	LTC4LX427	23400	6.9	21.8				33	D2	D3	D3	
10/19/2010	XX	LTC4LX468	28300	7.1	19.6				113	2	1313	20	
4/27/2011	XX	LTC4LX49C	18420	6.9	17.4				109	2	1563	8.4	
7/19/2011	XX	LTC4LX4DA	30700	7	28.3				115	2	1688	44	
10/26/2011	XX	LTC4LX4H5	15850	7.1	18.3				100	1	750	6.1	
4/24/2012	XX	LTC4LX51F	11470	6.7	15.7				-27	2	688	14.9	
7/24/2012	XX	LTC4LX56E	25300	6.8	24.8				-93	3	D3	D3	
10/23/2012	XX	LTC4LX5D5	19800	6.9	17.3				-33	D2	D3	D3	

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
<b>MW04-102</b>													
1/18/2005	XX	GW102X10C	240	8.1	4	5.45	164.77		241	6	110	1.2	
3/21/2005	XX	GW102X144	202	7.3	7.8	4.9	165.32		292	5	100	1.4	
7/25/2005	XX	GW102X171	248	7.7	16.4	6.7	163.52		307	4	125	1.2	
9/20/2005	XX	GW102X1A9	205	7.1	13.7	5.52	164.7	18.02	273	2	105	0.4	
5/23/2006	XX	GW102X1F4	219	7.8	11.9	4.8	165.42		366	3	170	0	
7/25/2006	XX	GW102X110	215	7.7	20.1	5.13	165.09	18.04	343	3	165	0.8	
9/12/2006	XX	GW102X20D	204	7.9	18.3	5.54	164.68		351	2	75	0	
5/15/2007	XX	GW102X240	236	7.7	9.8	5.67	164.55		341	4	40	1.5	
7/24/2007	XX	GW102X284	217	8.1	19.4	6.3	163.92		371	2	90	0	
9/11/2007	XX	GW102X2AE	215	7.9	12.9	7.42	162.8	18	271	3	90	0.5	
5/20/2008	XX	GW102X2E8	223	7.3	11	6.05	164.17		287	4	130	0.1	
7/29/2008	XX	GW102X2HC	193	7.9	15.7	5.81	164.41		283	3	95	0.6	
10/27/2008	XX	GW102X302	198	7.8	13.7	5.5	164.72	18	151	3	115	0	
4/14/2009	XX	GW102X339	234	7.7	9	5.47	164.75		353	4	75	0	
7/7/2009	XX	GW102X37D	234	8.1	11.8	5	165.22		310	2	75	0	
10/27/2009	XX	GW102X3F8	236	8.2	10.8	5.27	164.95	17.84	354	4	70	0	
4/27/2010	XX	GW102X407	234	7.8	7.3	5.97	164.25		380	3	60	0.8	
7/21/2010	XX	GW102X43B	245	7.6	18.1	7.58	162.64		180	2	135	2	
10/19/2010	XX	GW102X46F	232	7.9	12.8	5.85	164.37	17.97	231	3	75	0	
4/25/2011	XX	GW102X4AG	249	7.9	11.2	5.02	165.2		335	4	80	0.2	
7/19/2011	XX	GW102X4EE	239	8.1	17.4	6.65	163.57		294	2	85	0.8	
10/25/2011	XX	GW102X4I9	209	8.2	13.1	6.5	163.72	17.85	305	5	95	3.8	
4/24/2012	XX	GW102X52J	227	8.1	9.8	6	164.22		-8	3	120	3.2	
7/24/2012	XX	GW102X57I	230	7.9	15.8	8	162.22		38	3	100	1.4	
10/22/2012	XX	GW102X5E9	221	7.7	14.1	5.78	164.44	17.98	178	3	45	1.5	
<b>MW04-105</b>													
1/17/2005	XX	GW105X10F	435	7.6	7.4	7.31	158.28		170	4	125	0	
3/21/2005	XX	GW105X147	703	6.4	6.7	6.85	158.74		404	2	145	0	
7/25/2005	XX	GW105X181	531	7.3	16.1	8.08	157.51		223	2	230	1.3	
9/20/2005	XX	GW105X1AC	531	6.9	14.4	7.69	157.9	22.83	293	1	145	1.7	
5/23/2006	XX	GW105X1F7	361	6.5	13.8	7.08	158.51		299	1	220	0	
7/25/2006	XX	GW105X111	370	6.4	23.8	7.05	158.54		333	2	205	0.9	
9/12/2006	XX	GW105X20E	447	6.1	12.2	6.85	158.74	22.85	344	1	150	1.5	
5/14/2007	XX	GW105X241	343	7	13.3	7.8	157.79		365	3	175	0	
7/24/2007	XX	GW105X285	483	7.2	17.3	8.02	157.57		404	1	135	0	
9/10/2007	XX	GW105X2AF	472	6.8	12.1	8.48	157.11	22.76	213	0.6	240	0	
5/19/2008	XX	GW105X2E9	447	6.8	9.1	8.13	157.46		256	4	210	0.1	
7/29/2008	XX	GW105X2HD	429	6.6	14.6	7.32	158.27		322	1	185	1.2	
10/27/2008	XX	GW105X303	338	7	12.1	7	158.59	22.78	289	0.8	175	0.5	
4/15/2009	XX	GW105X33A	274	6.6	7.7	7.67	157.92		295	2	85	0.9	
7/7/2009	XX	GW105X37E	345	7.3	10.4	5.91	159.68		313	0.8	185	0.2	
10/26/2009	XX	GW105X3F9	528	6.8	10.6	5.8	159.79	22.75	412	3	100	0.6	
4/27/2010	XX	GW105X408	304	6.7	7.7	7.32	158.27		322	0.8	70	0.7	
7/19/2010	XX	GW105X43C	348	6.5	15.6	7.5	158.09		302	0.8	150	0.3	
10/18/2010	XX	GW105X46G	306	7.2	11.5	6.9	158.69	22.75	270	0.6	105	0	
4/26/2011	XX	GW105X4AH	312	7.1	9.6	6.46	159.13		322	1	75	0	
7/18/2011	XX	GW105X4EF	325	6.7	16.7	7.1	158.49		275	0.8	100	0.3	

SUMMARY REPORT  
 Field Data

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
10/25/2011	XX	GW105X41A	217	7.7	11.9	6.9	158.69	22.75	339	0.8	85	1.8	
4/23/2012	XX	GW105X530	240	7.4	8.7	7.6	157.99		325	3	160	1.7	
7/24/2012	XX	GW105X57J	299	7.1	13.6	8.6	156.99		-7	0.4	160	1.1	
10/22/2012	XX	GW105X5EA	252	7.2	11.9	6.6	158.99	22.75	281	0.4	70	1.3	
<b>MW04-109</b>													
1/19/2005	XX	GW109X10I	572	7.8	4.7	10.95	153.64		323	2	260	0	
3/23/2005	XX	GW109X14A	662	7.1	7.8	10.8	153.79		343	2	200	0	
7/26/2005	XX	GW109X184	416	5.5	11.3	11.65	152.94		273	0.8	225	0	
9/20/2005	XX	GW109X1AF	454	7.2	16.2	11.72	152.87	22.9	168	1	165	0	
5/23/2006	XX	GW109X1FA	349	7.1	9.5	10.17	154.42		300	1	138	0	
7/25/2006	XX	GW109X112	370	7.1	13.6	10.15	154.44		300	1	150	0	
9/12/2006	XX	GW109X20F	357	6.2	15.9	10.53	154.06	22.92	200	1	150	0	
5/15/2007	XX	GW109X242	385	7.1	6.9	9.8	154.79		207	1	125	0	
7/24/2007	XX	GW109X286	314	6.9	15	10.45	154.14		375	0.4	125	0	
9/10/2007	XX	GW109X2AG	283	7	12.2	11.47	153.12	22.85	200	0.3	88	0	
5/19/2008	XX	GW109X2EA	645	6.8	7.1	9.52	155.07		7	0.3	190	0	
7/29/2008	XX	GW109X2HE	613	6.8	14.6	9.61	154.98		72	0.3	285	0	
10/28/2008	XX	GW109X304	494	7.2	12.8	9.9	154.69	22.9	229	2	260	0.2	
4/15/2009	XX	GW109X33B	551	7.2	6.8	10	154.59		262	0.6	240	0.7	
7/7/2009	XX	GW109X37F	DE	DE	DE	DE	DE		DE	DE	DE	DE	
<b>MW04-109R</b>													
12/8/2009	XX	GW109X39F	550	7.9	7.9	6.15	153.98	22.98	269	1	210	0	
4/27/2010	XX	GW109X409	402	6.7	9.2	6.35	153.78		286	0.6	125	0	
7/20/2010	XX	GW109X43D	450	6.5	17.2	7.49	152.64		220	0.4	155	0.5	
10/19/2010	XX	GW109X48H	489	7	12.1	6.6	153.53	22.92	209	0.6	155	0	
4/26/2011	XX	GW109X44A	446	6.6	10.9	6.25	153.88		281	0.6	105	0	
7/19/2011	XX	GW109X4EG	423	6.5	21.1	7.25	152.88		259	0.3	130	0.2	
10/25/2011	XX	GW109X41B	416	7	12.2	6.62	153.51	22.95	360	0.3	145	1.4	
4/24/2012	XX	GW109X531	382	6.6	10.4	6.36	153.77		-478	0.4	240	2.9	
7/24/2012	XX	GW109X580	408	6.5	19.1	7.27	152.86		-155	0.3	140	1	
10/23/2012	XX	GW109X5EB	404	6.6	9.3	6.4	153.73	22.92	241	0.8	160	1.1	
<b>MW09-901</b>													
12/8/2009	XX	GW901X3GH	300	8.2	5.3	7.95	157.15	22.8	260	2	90	10.1	
4/27/2010	XX	GW901X3J7	241	7.6	10.6	8.86	156.24		328	3	60	2.1	
7/20/2010	XX	GW901X42B	275	7.4	17.5	10.8	154.3		321	0.8	105	2.7	
10/19/2010	XX	GW901X48F	300	7.5	12.8	9.25	155.85	22.75	235	0.6	80	0.3	
4/26/2011	XX	GW901X48G	254	8	9.7	8.6	156.5		355	2	50	1.6	
7/19/2011	XX	GW901X4DE	219	7.9	19.2	10.5	154.6		329	2	75	0.3	
10/25/2011	XX	GW901X4H9	192	8.2	11.7	9.35	155.75	22.75	206	1	70	3.1	
4/24/2012	XX	GW901X51J	189	8.4	11.9	8.6	156.5		183	3	100	3.3	
7/24/2012	XX	GW901X56I	194	7.9	17.2	10.6	154.5		20	2	120	1	
10/23/2012	XX	GW901X5D9	197	7.6	12.2	8.8	156.3	22.73	215	2	100	1.4	
<b>MW11-207R</b>													
7/20/2011	XX	GW207X4CH	87	7.9	11.8	12	203.13		337	5	35	1.6	
10/24/2011	XX	GW207X46C	83	8	11.7	11.5	203.63	44.2	360	5	30	1.7	
4/23/2012	XX	GW207X512	103	8.1	8.1	11.7			313	6	40	3	
7/23/2012	XX	GW207X561	85	7.7	12.7	12.1	203.03		314	5	40	2.5	

SUMMARY REPORT  
Field Data

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
10/22/2012	XX	GW2075CC	88	7.7	12.2	6.57	208.56	44.2	139	6	25	1.7	
<b>MW-204</b>													
11/13/1990	XX	MW-204XX33190	170	7.8	8	3.93	160.82						
2/19/1991	XX	MW-204XX33288	F	F	F	F							
6/3/1991	XX	MW-204XX33392	160	7.9	12.8	3.25	161.5						
9/16/1991	XX	MW-204XX33497	210	7.2	11.1	7.19	157.56						
12/17/1991	XX	MW-204XX33599	100	9.2	-1	4.23	160.52						
3/2/1992	XX	MW-204XX33665	F	F	F	F							
6/23/1992	XX	MW-204XX33778	130	8.2	8	6.44	158.31						
8/17/1992	XX	MW-204XX33833	140	7.8	7.5	8.27	156.48						
1/26/1993	XX	MW-204XX33995	120	7.1	2	5.84	158.91						
4/27/1993	XX	MW-204XX34086	150	7.6	4.5	4.94	159.81						
7/21/1993	XX	MW-204XX34171	110	7.5	11.7	9.52	155.23						
10/12/1993	XX	MW-204XX34254	180	7.1	8.5	14.22	150.53						
1/11/1994	XX	MW-204XX34345	140	7.6	5.5	6.88	157.87						
5/26/1994	XX	MW-204XX34480	100	6.8	4.5	4.98	159.77						
8/8/1994	XX	MW-204XX34554	110	6.7	11	5.26	159.49						
11/15/1994	XX	MW-204XX34653	180	7.4	9.3	159.72	159.72						
2/7/1995	XX	MW-204XX34737	180	6.5	5	5.38	159.37						
8/15/1995	XX	MW-204XX34842	290	7.4	7.2	4.8	159.95						
11/30/1995	XX	MW-204XX34926	110	7.4	9.4	8.03	156.72						
2/27/1996	XX	MW-204XX35033	180	7.1	6.6	5.17	159.58						
5/21/1996	XX	MW-204XX35122	130	6.3	6.6	5.88	158.87						
11/25/1996	XX	MW-204XX35206	110	7.1	7.2	4.26	160.49						
3/25/1997	XX	MW-204XX35394	150	6.4	7.7	9.27	155.48						
6/3/1997	XX	MW-204809-35584	162	6.59	8.9	8.91	155.84		54.8	2.2	27		
9/9/1997	XX	MW-204810-35682	121	6.08	5.4	9.48	155.27		88.3	2.6	1		
12/3/1997	XX	MW-204811-35767	182	5.77	11.1	8.88	155.87		35.2	3.5	6.8		
3/23/1998	XX	MW-204812-35877	150	6.58	8	8.88	155.87		42.1	5.2	13		
6/8/1998	XX	MW-204813-35954	160	6.59	5.1	8.8	155.95		167.5	3.4	0		
9/9/1998	XX	MW-204814-36047	174	6.31	7.9	9.06	155.69		181.3	2.1	0		
12/14/1998	XX	MW-204815-36143	189	5.91	12.6	11.03	153.72		217.3	3.6	0		
3/29/1999	XX	MW-204816-36248	195	6.6	7.8	8.9	155.85		278	2.8	2		
6/8/1999	XX	MW-204817-36319	170	6.18	12.6	8.67	156.08		267	0.5	0		
9/13/1999	XX	MW-204818-36416	172	6.19	13.8	10.38	154.37		283.2	0.8	12		
12/1/1999	XX	MW-204819-36495	175	6.58	8.5	8.45	156.3		2	1.7	0		
3/27/2000	XX	MW-204820-36612	172	6.47	7.4	8.64	156.11		2	2	0		
6/12/2000	XX	MW-204821-36689	176	6.61	10.7	8.66	156.09		0.6	0.6	0		
9/12/2000	XX	MW-204822-36781	168	6.64	12.6	11.82	152.93		1.3	1.3	0		
12/11/2000	XX	MW-204823-36871	148	6.75	9	9.39	155.36		2.3	2.3	0		
3/12/2001	XX	MW-204824-36962	142	6.37	6.7	9.5	155.25		1.6	1.6	3		
6/18/2001	XX	MW-204825-37060	167	6.39	11.3	9.23	155.52		0.9	0.9	9		
9/10/2001	XX	MW-204826-37144	142	6.21	14.1	10.52	154.23		0.7	0.7	0		
12/11/2001	XX	MW-204827-37238	159	6.56	9.9	9.63	155.12		1.4	1.4	0		
3/13/2002	XX	MW-204828-37328	183	6.55	7.8	8.76	155.99		1.2	1.2	0		
6/17/2002	XX	MW-204829-37424	225	6.49	9.8	8.65	156.1		0.6	0.6	0		
9/18/2002	XX	MW-204830-37517	268	6.39	13.2	11.95	152.8		0.9	0.9	0		
12/9/2002	XX	MW-204831-37599	325	6.25	7.6	9.47	155.28		2.2	2.2	0		

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
3/25/2003	XX	MW-204N37705	264	6.32	6.4					0.7			
6/25/2003	XX	MW-204N37787	245	6.42	10.1					1.2			
9/17/2003	XX	MW-204N37881	238	6.19	14					1.4			
1/29/2004	XX	GW204X03A	252	6.6	4.2	9.45	155.3			1	1.3		
5/4/2004	XX	GW204X008	206	6.2	8.2	8.92	155.83			2	1.6		
7/27/2004	XX	GW204X03G	211	6.4	12.3	9.49	155.26			1	1.4		
10/25/2004	XX	GW204X07D	263	6.3	10.9	9.14	155.61	24.43		1	0.4		
5/9/2005	XX	GW204X13E	160	6.8	9.3	8.35	156.4			2	0		
8/1/2005	XX	GW204X172	211	6.7	14.2	9.23	155.52			1	0		
9/20/2005	XX	GW204X1A0	325	6.9	16.4	9.68	155.07	24.41		3	1.5		
5/23/2006	XX	GW204X1EF	235	7	8	9.05	155.7			1	0.4		
7/24/2006	XX	GW204X1HC	205	6.7	16.7	8.92	155.83			1	0		
9/11/2006	XX	GW204X23C	199	5.7	13.5	9.2	155.55	24.4		1	0		
5/14/2007	XX	GW204X27G	214	7.1	12.4	9.5	155.25			2	0.4		
7/23/2007	XX	GW204X27G	254	6.3	16	9.71	155.04			2	6.7		
9/10/2007	XX	GW204X2A6	301	6.4	14.2	10.65	154.1	24.45		1	0.4		
5/21/2008	XX	GW204X2E0	340	6.5	9.2	9.72	155.03			1	0		
7/30/2008	XX	GW204X2H4	220	6.9	15.2	9.52	155.23			2	0.1		
10/28/2008	XX	GW204X2JE	188	7.4	12.5	9.12	155.63	24.45		1	4.3		
4/13/2009	XX	GW204X332	214	6.3	8.8	9.1	155.65			3	0.9		
7/6/2009	XX	GW204X376	223	7.1	13.6	8.4	156.35			1	1		
10/26/2009	XX	GW204X3F1	309	6.6	10.8	8.7	156.05	24.42		5	0.8		
4/28/2010	XX	GW204X400	216	6.6	7	9.22	155.53			0.6	1.6		
7/19/2010	XX	GW204X434	175	6.6	18	9.82	154.93			2	2		
10/19/2010	XX	GW204X468	200	7.5	12.1	9.32	155.43	24.45		0.6	0		
4/26/2011	XX	GW204X4A9	193	7.3	9.4	8.74	156.01			0.8	0.4		
7/19/2011	XX	GW204X4E7	176	6.9	15.1	9.43	155.32			1	0		
10/26/2011	XX	GW204X4I2	180	7	10.6	9.1	155.65	24.45		0.8	2.6		
4/24/2012	XX	GW204X52C	192	6.5	9.4	9	155.75			1	2.7		
7/23/2012	XX	GW204X57B	189	7.2	16	10.15	154.6			0.6	1.3		
10/24/2012	XX	GW204X5E2	193	7	10.9	9.05	155.7	24.45		0.4	4.6		
<b>MW-207</b>													
11/13/1990	XX	MW-207XX33100	310	8	8	4.07	213.89						
2/19/1991	XX	MW-207XX33288	260	7.3	5.5	5	212.96						
6/4/1991	XX	MW-207XX33383	220	6.8	9.4	3.73	214.23						
9/17/1991	XX	MW-207XX33498	220	6.5	12.2	9.93	208.03						
12/17/1991	XX	MW-207XX33569	140	7.5	1	5.36	212.6						
3/2/1992	XX	MW-207XX33665	F	F	F	F							
6/23/1992	XX	MW-207XX33778	180	8.8	10	7.3	210.66						
8/17/1992	XX	MW-207XX33833	190	8.2	10	11.11	206.85						
1/26/1993	XX	MW-207XX33995	170	7.3	4	9.5	208.46						
4/27/1993	XX	MW-207XX34086	150	7.3	5.5	4.05	213.91						
7/22/1993	XX	MW-207XX34172	120	7	10.6	9.64	208.32						
10/13/1993	XX	MW-207XX34255	150	6.9	8.8	18.46	199.5						
1/11/1994	XX	MW-207XX34345	150	8	4.5	5.3	212.66						
5/26/1994	XX	MW-207XX34480	110	7.2	7.4	4.36	213.6						
8/8/1994	XX	MW-207XX34554	110	6.7	11	6.71	211.25						
11/16/1994	XX	MW-207XX34654	150	7.3	8.3	6.44	211.52						
2/7/1995	XX	MW-207XX34737	160	6.6	5.3	4.71	213.25						

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
5/24/1995	XX	MW-207X34943	160	7.6	7.2	4.3	213.66						
8/16/1995	XX	MW-207X34927	110	7.3	9.8	9.19	208.77						
11/30/1995	XX	MW-207X35033	130	7.7	5.8	4.32	213.64						
2/27/1996	XX	MW-207X35122	120	7.8	6.8	3.83	214.13						
5/21/1996	XX	MW-207X35206	100	7.7	12.1	3.65	214.31						
11/26/1996	XX	MW-207X35395	160	6.3	7.9	5.61	212.35			1.5		17.1	
3/24/1997	XX	MW-207825-35513	147	6.86	5	7.23	210.73					13	
6/2/1997	XX	MW-207826-35583	168	6.95	7.7	4.95	213.01		32.9	4.15		42	
9/8/1997	XX	MW-207827-35681	202	6.77	11.1	6.64	211.32		29.5	1.3		20	
12/3/1997	XX	MW-207828-35767	128	6.78	6	5.92	212.04		12.9			19	
3/23/1998	XX	MW-207829-35877	120	6.78	4.5	4.3	213.66		17.6			0	
6/8/1998	XX	MW-207830-35954	135	6.76	7.9	6.19	211.77		56.9	0.9		0	
9/8/1998	XX	MW-207831-36046	142	6.56	10.1	11.8	206.16		8.4	1.5		0	
12/14/1998	XX	MW-207832-36143	182	6.77	7.9	7.2	210.76		35.9	2		0	
3/29/1999	XX	MW-207833-36248	144	6.74	6.2	3.64	214.32		230.8	2.1		20	
6/8/1999	XX	MW-207834-36319	132	6.91	11.3	5.31	212.65		158.6	0.7		7	
9/13/1999	XX	MW-207835-36416	157	6.77	12.6	16.18	201.78		274.3	1.8		0	
12/1/1999	XX	MW-207836-36495	114	6.73	6.6	4.29	213.67			1		0	
3/27/2000	XX	MW-207837-36612	219	6.47	7.1	3.61	214.35			1.3		0	
6/12/2000	XX	MW-207838-36699	260	6.65	8.8	4.25	213.71			0.7		0	
9/12/2000	XX	MW-207839-36781	253	6.82	10.9	14.44	203.52			0.6		12	
12/11/2000	XX	MW-207840-36871	191	6.75	7.7	10.9	207.06			1		170	
3/13/2001	XX	MW-207841-36963	117	6.79	3.1	9.99	207.97			2.3		13	
6/18/2001	XX	MW-207842-37060	127	6.57	11.4	8.26	209.7			0.5		44	
9/10/2001	XX	MW-207843-37144	90	6.43	11.5	16.3	201.66			0.5		0	
12/11/2001	XX	MW-207844-37236	174	6.88	5.9	18.1	199.86			1.3		26	
3/13/2002	XX	MW-207845-37328	82	6.46	6.1	4.02	213.92			1.1		34	
6/17/2002	XX	MW-207846-37424	91	6.6	8.7	4.62	213.34			0.9		16	
9/18/2002	XX	MW-207847-37517	105	6.74	10.4	16.7	201.26			1.3		2	
12/9/2002	XX	MW-207848-37599	106	6.63	6.1	6.11	211.85			4.2		0	
3/26/2003	XX	MW-207837706	80	6.4	6					2			
6/25/2003	XX	MW-207837797	97	6.47	10					1.7			
9/17/2003	XX	MW-207837881	90	6.55	10.6					1.9			
5/5/2004	XX	GW207X011	125	6.8	16.8	3.69	214.27		297	0.6	60	3.5	
7/28/2004	XX	GW207X048	139	7.2	11	7.48	210.48		319	2	100	0.7	
10/25/2004	XX	GW207X083	173	7.3	10.6	8	209.96	32.58	208	1	90	5.1	
1/25/2005	XX	GW207X115	143	6.3	4.4	4.92	213.04		307	1		9.2	
5/12/2005	XX	GW207X124	149	7.4	7.7	3.7	214.26		191	1	110	0.7	
8/1/2005	XX	GW207X15C	157	7.5	15.2	4.6	213.36		226	1	75	0	
9/19/2005	XX	GW207X18A	164	7.9	18.8	4.35	213.61	32.83	269	5	120	0	
5/22/2006	XX	GW207X1D5	141	7.5	12.8	3.91	214.05		211	3	100	0	
7/25/2006	XX	GW207X1G2	176	7.7	15.1	4	213.96		176	1	65	0.8	
9/11/2006	XX	GW207X1F	160	6.6	16	6.59	211.37	32.82	240	1	95	0.6	
5/14/2007	XX	GW207X222	183	7.1	13	6.15	211.81		386	1	85	0.8	
7/25/2007	XX	GW207X268	238	7.5	16.8	8.85	209.11		237	1	95	0	
9/10/2007	XX	GW207X28G	273	6.7	13.6	13.11	204.85	32.6	178	2	115	178	0
5/19/2008	XX	GW207X2CA	232	7.4	10.7	5.6	212.36		352	1	130	2	
7/29/2008	XX	GW207X2FE	231	6.8	19.4	6.7	211.26		-23	1	140	0.6	
10/28/2008	XX	GW207X2I4	288	6.3	12.4	6.25	211.71	32.55	174	0.8	160	0.4	
4/13/2009	XX	GW207X31C	508	7.1	8.1	5.25	212.71		87	0.4	155	1	

SUMMARY REPORT  
Field Data

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance		pH	Temperature	Water Depth	Water Level Elevation	Well Depth	Corrected Eh	Dissolved Oxygen	Alkalinity (CaCO3)	Turbidity (field)	Flow Rate
			µmhos/cm	@25°C										

7/6/2009	XX	GW207X35G	601		6.7	18.2	4.82	213.14		72	1	310	12	
10/26/2009	XX	GW207X3DB	151		6.3	9.2	8.27	209.69	20.1	304	1	130	1.2	
4/26/2010	XX	GW207X3IA	490		6.3	15.3	5.75	212.21		172	1	205	7.9	
7/19/2010	XX	GW207X41E	522		6.7	16.8	14.1	203.86		-15	0.6	275	2.5	
10/18/2010	XX	GW207X44I	538		6.3	9.3	12.87	205.09	32.8	44	0.3	175	0.3	
4/25/2011	XX	GW207X48J	453		6.6	12.7	5.5	212.46		223	0.6	170	3.6	
<b>MW-206</b>														
4/27/1993	XX	MW-206XX34086	140		8.2	6.5	3.9	200.77						
7/21/1993	XX	MW-206XX34171	110		7.5	10.6	9.48	195.19						
10/13/1993	XX	MW-206XX34255	150		8.1	7.8	16.87	187.8						
1/11/1994	XX	MW-206XX34345	110		8	5	4.98	199.69						
5/26/1994	XX	MW-206XX34480	140		7.6	2.9	4.5	200.17						
8/8/1994	XX	MW-206XX34554	110		6.9	11	10.14	194.53						
11/16/1994	XX	MW-206XX34654	140		7.8	8.6	10.65	194.02						
2/7/1995	XX	MW-206XX34737	150		6.2	4.6	4.65	200.02						
5/24/1995	XX	MW-206XX34843	130		8.1	6.6	4.19	200.48						
8/15/1995	XX	MW-206XX34926	90		8.2	9	10.03	194.64						
11/30/1995	XX	MW-206XX35033	120		8.1	6.6	4.28	200.39						
2/27/1996	XX	MW-206XX35122	F		F	F	F							
5/21/1996	XX	MW-206XX35206	100		8	7.8	3.9	200.77						
11/26/1996	XX	MW-206XX35395	151		6.6	7.7	6.3	198.37			2.5		6.3	
3/25/1997	XX	MW-206824-35514	108		7.83	5.6	6.45	198.22			10.4		17	
6/2/1997	XX	MW-206825-35583	143		8.3	8.7	4.71	199.96		31.1	2.4		40	
9/8/1997	XX	MW-206826-35681	159		8.03	11	8.7	195.97		55.5	8.1		0	
12/3/1997	XX	MW-206827-35767	124		7.63	6	7.09	197.58		55.1			3	
3/23/1998	XX	MW-206828-35877	134		8.49	4.1	4.23	200.44		56.4			0	
6/8/1998	XX	MW-206829-35954	139		8.24	8.1	6.26	198.41		110.5	7.8		0	
9/8/1998	XX	MW-206830-36046	148		7.73	10.6	11.37	193.3		169.2	8.7		0	
12/14/1998	XX	MW-206831-36143	159		8.14	6.6	7.81	196.88		139.2	10.9		0	
3/29/1999	XX	MW-206832-36248	142		8.22	4.7	3.91	200.76		263.6	10.5		0	
6/8/1999	XX	MW-206833-36319	133		8.11	11.3	5.29	199.38		238.2	9.3		0	
9/15/1999	XX	MW-206834-36418	134		8.12	11.6	15.44	189.23		217.4	7.8		0	
3/27/2000	XX	MW-206835-36495	137		7.83	6.6	4.25	200.42		233.9	8.7		0	
6/12/2000	XX	MW-206836-36612	133		7.97	5.5	4.5	200.17			8.3		0	
9/13/2000	XX	MW-206837-36689	132		8.02	8.2	4.68	199.99			7.3		0	
12/1/2000	XX	MW-206838-36782	133		7.97	10.9	13.05	191.62			6.9		0	
3/13/2001	XX	MW-206839-36871	122		8.37	7.3	12.6	192.07			9.4		0	
6/18/2001	XX	MW-206841-37060	124		8.02	9.7	7.77	196.9			7		6	
9/10/2001	XX	MW-206842-37144	109		7.82	12	14.8	189.87			8.1		0	
12/12/2001	XX	MW-206843-37237	117		8.02	6.8	18.57	186.1			8.4		0	
3/13/2002	XX	MW-206844-37328	114		8.15	5.3	4.17	200.5			8.1	1	8.1	
6/17/2002	XX	MW-206845-37424	116		7.97	9	4.65	200.02			7.2	0	0	
9/18/2002	XX	MW-206846-37517	124		7.78	11.1	14.1	190.57			6	0	0	
12/9/2002	XX	MW-206847-37599	137		7.43	5.7	6.22	198.45			6.3	0	0	
3/26/2003	XX	MW-206N37706	115		8.18	5.4								
6/25/2003	XX	MW-206N37797	117		7.74	10.1								
9/17/2003	XX	MW-206N37881	124		7.67	11								
5/6/2004	XX	GW206X010	132		7.8	7.8	3.08	201.59		298	8	70	6.9	

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

**(MW-206)**

Date Type Sample ID

Specific Conductance  
µmhos/cm  
@25°C

pH  
Standard Units

Temperature  
Degrees Celsius

Water Level  
Depth  
Feet

Water Level  
Elevation  
Feet

Well Depth  
Feet

Corrected Eh  
mV

Dissolved Oxygen  
mg/L

Alkalinity (CaCO3)  
mg/L

Turbidity (field)  
NTU

Flow Rate  
cfs

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH Standard Units	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) mg/L	Turbidity (field) NTU	Flow Rate cfs
7/28/2004	XX	GW206X047	139	6.7	10.8	6.48	198.19		312	8	75	0.8	
10/26/2004	XX	GW206X082	160	7.8	9.6	7.09	197.58	23.05	301	8	85	11.2	
5/11/2005	XX	GW206X123	129	7.8	14.7	4.13	200.54		332	6	100	0	
7/28/2005	XX	GW206X15B	89	8.6	13.6	5.06	199.81		290	5	85	0.1	
9/19/2005	XX	GW206X189	120	7.1	14	5.8	198.87	23.02	208	6	70	0	
5/24/2006	XX	GW206X1D4	140	6.4	11.8	4.43	200.24		400	6	60	0	
7/25/2006	XX	GW206X1G1	134	7.2	17.5	4.3	200.37		329	6	100	0.9	
9/12/2006	XX	GW206X1E	146	7.4	14.9	6.92	197.75	23.13	320	6	85	0	
5/14/2007	XX	GW206X221	150	7.5	12.2	5.45	199.22		366	6	90	0	
7/25/2007	XX	GW206X265	156	8	14.7	9.77	194.9		335	6	50	0	
9/11/2007	XX	GW206X28F	137	8.3	11.7	13.5	191.17	23.12	263	6	70	0	
5/20/2008	XX	GW206X2C9	134	8.4	10.7	5.83	198.84		293	5	80	0.5	
7/29/2008	XX	GW206X2FD	129	8.3	15.8	5.84	198.83		212	5	85	0	
10/27/2008	XX	GW206X2I3	129	8	11.6	4.8	199.87	23.08	262	5	85	0	
4/13/2009	XX	GW206X31B	151	8.1	7.3	5.11	199.56		371	6	70	0.4	
7/6/2009	XX	GW206X35F	158	8.4	13.4	5.49	199.18		308	5	60	0.5	
10/28/2009	XX	GW206X3DA	141	8.3	8.5	6.05	198.62	23.08	342	5	30	0.8	
4/26/2010	XX	GW206X3I9	135	7.4	11.2	5.3	199.37		302	5	60	0.3	
7/19/2010	XX	GW206X41D	160	7.4	14	10.4	194.27		227	4	70	1	
10/18/2010	XX	GW206X44H	187	7.7	9.9	6.85	197.82	23.08	20	3	70	1.9	
4/25/2011	XX	GW206X48I	179	7.8	10.7	4.56	200.11		350	3	60	1.4	
7/18/2011	XX	GW206X4CG	169	7.8	16.1	8	196.67		105	2	125	2.9	
10/24/2011	XX	GW206X46B	148	7.4	12.7	4.67	200	23.1	208	4	105	2.7	
4/23/2012	XX	GW206X511	153	7	8.6	4.41	200.26		-334	4	100	2.7	
7/23/2012	XX	GW206X560	155	7.9	15.7	8.35	196.32		329	6	80	1.3	
10/22/2012	XX	GW206X5CB	157	8.4	11.2	4.55	200.12	23.09	312	6	60	1.8	

**MW-212**

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH Standard Units	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) mg/L	Turbidity (field) NTU	Flow Rate cfs
11/13/1990	XX	MW-212XX33160	I	I	I	19.85	200.23						
2/19/1991	XX	MW-212XX33288	190	6.7	5.5	18.88	201.2						
6/3/1991	XX	MW-212XX33392	100	8.1	8.9	18.45	201.63						
9/16/1991	XX	MW-212XX33487	D	D	D	D	D						
12/17/1991	XX	MW-212XX33569	100	7.6	6	18.93	201.15						
3/2/1992	XX	MW-212XX33665	110	5.4	5.6	19.14	200.94						
6/23/1992	XX	MW-212XX33778	D	D	D	D	D						
8/17/1992	XX	MW-212XX33883	D	D	D	D	D						
1/26/1993	XX	MW-212XX33995	D	D	D	D	D						
4/27/1993	XX	MW-212XX34086	250	6.9	5.5	15.14	204.94						
7/21/1993	XX	MW-212XX34171	D	D	D	D	D						
10/12/1993	XX	MW-212XX34254	D	D	D	D	D						
1/1/1994	XX	MW-212XX34345	100	7.3	5	19.43	200.65						
5/26/1994	XX	MW-212XX34480	80	7.2	7.8	16.45	203.63						
11/15/1994	XX	MW-212XX34653	D	D	D	D	D						
2/8/1995	XX	MW-212XX34738	184	6.9	4.8	18.79	201.29						
5/24/1995	XX	MW-212XX34843	70	7.4	8.2	15.8	204.28						
8/15/1995	XX	MW-212XX34826	D	D	D	D	D						
11/30/1995	XX	MW-212XX35033	D	D	D	D	D						
2/27/1996	XX	MW-212XX35122	20	6.9	6.5	16.13	203.95						
5/21/1996	XX	MW-212XX35206	80	6.2	6.4	13.63	206.45						
11/26/1996	XX	MW-212XX35395	D	D	D	D	D					D	

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Specific Conductance		pH	Temperature		Water Level Depth	Water Level Elevation	Well Depth	Corrected Eh	Dissolved Oxygen	Alkalinity (CaCO3)	Turbidity (field)	Flow Rate
			µmhos/cm @25°C	F		F	Degrees Celsius								
3/24/1997	XX	MW-212826-35513	F	F	F	F	F	F	F	F	F	F	F	F	F
6/2/1997	XX	MW-212827-35583	59	6.26	12.8	16.62	203.46				5.9	3.9		0	
3/23/1998	XX	MW-212830-35877	97	6.09	3.6	15.11	204.97				61			0	
6/8/1998	XX	MW-212831-35954	54	6.41	9.9	18.97	201.11				164			0	
3/29/1999	XX	MW-212834-36248	117	6.2	6.6	12.76	207.32				258.3	10.1		3	
6/8/1999	XX	MW-212835-36319	50	6.3	14.5	19.58	200.5				191.8	9.1		0	
12/1/1999	XX	MW-212837-36495	59	6.33	6.2	18.14	201.94				232.8	9.4		0	
3/27/2000	XX	MW-212838-36612	106	6.33	6.7	14.73	205.95				10			0	
6/12/2000	XX	MW-212839-36689	57	6.4	8	17.73	202.35				6.7			6	
3/13/2002	XX	MW-212840-37328	148	5.85	6.2	17.95	202.13				7.2			0	
6/17/2002	XX	MW-212841-37424	51	6.12	8.8	18.7	201.38				8.4			0	
3/26/2003	XX	MW-212843-37706	42	6.07	5.9						9.4				
6/25/2003	XX	MW-212843-37797	44	6.3	11						373			3.7	
5/5/2004	XX	GW212X00B	46	6.6	11	17.01	203.07				D			D	
7/27/2004	XX	GW212X05J	D	D	D	D					D			D	
10/27/2004	XX	GW212X07F	D	D	D	D	20.06				D			D	
5/12/2005	XX	GW212X13G	81	7.4	6.4	12.77	207.31				428	5		2.7	
8/1/2005	XX	GW212X174	81	6.4	14.2	18.25	201.83				253	6		0	
9/20/2005	XX	GW212X1A2	I	I	I	19.78	200.3			20.1	I	I		I	
5/22/2006	XX	GW212X1EH	48	6.5	8.9	16.4	203.68				241	6		2.5	
7/25/2006	XX	GW212X1HE	41	7.7	15.9	17.21	202.87				309	6		2.6	
9/11/2006	XX	GW212X207	I	I	I	I				20.1	I	I		I	
5/14/2007	XX	GW212X23E	61	7.4	10.3	17.2	202.88				467	6		1.5	
7/24/2007	XX	GW212X271	D	D	D	D					D	D		D	
9/10/2007	XX	GW212X2A8	D	D	D	D				20.1	D	D		D	
5/19/2008	XX	GW212X2E2	84	7.4	11.2	17.2	202.88				334	5		1.6	
7/29/2008	XX	GW212X2H6	D	D	D	D					D	D		D	
10/28/2008	XX	GW212X2JG	D	D	D	D					D	D		D	
4/13/2009	XX	GW212X334	205	5.9	6.7	15.5	204.58				560	4		0.7	
7/6/2009	XX	GW212X378	196	6.3	14.2	16.3	203.78				112	5		7.1	
10/26/2009	XX	GW212X3F3	D	D	D	D					D	D		D	
4/26/2010	XX	GW212X402	289	6.3	10.2	17.8	202.28				347	4		1.9	
7/19/2010	XX	GW212X436	D	D	D	D					D	D		D	
10/18/2010	XX	GW212X46A	D	D	D	D					D	D		D	
4/25/2011	XX	GW212X4A8	264	7.3	10.2	15.2	204.88				308	4		1	
7/18/2011	XX	GW212X4E9	D	D	D	D					D	D		D	
10/24/2011	XX	GW212X4H4	D	D	D	D					D	D		D	
4/23/2012	XX	GW212X52E	D	D	D	D					D	D		D	
7/23/2012	XX	GW212X57D	D	D	D	D					D	D		D	
10/22/2012	XX	GW212X5E4	D	D	D	D				20.07	D	D		D	
<b>MW-216B</b>															
11/12/1990	XX	MW-216BXX33189	180	6.6	8	5.07	155.24								
2/19/1991	XX	MW-216BXX33288	110	7.1	5.5	5.73	154.58								
6/4/1991	XX	MW-216BXX33393	100	7.5	7.2	5.71	154.6								
9/16/1991	XX	MW-216BXX33497	150	8	11.7	7.17	153.14								
12/17/1991	XX	MW-216BXX33589	80	8.5	7	5.11	155.2								
3/2/1992	XX	MW-216BXX33665	80	6.1	3.3	5.67	154.64								
6/23/1992	XX	MW-216BXX33778	100	8.4	8.5	6.65	153.66								
8/17/1992	XX	MW-216BXX33833	110	7.8	8.5	8.35	151.96								

SUMMARY REPORT  
 Field Data

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance		pH	Temperature	Water Level Depth	Water Level Elevation	Well Depth	Corrected Eh	Dissolved Oxygen	Alkalinity (CaCO3)	Turbidity (field)	Flow Rate
			µmhos/cm @25°C	mg/L										
1/26/1993	XX	MW-216BX33985	120	7.3	3	6.59	153.72							
4/27/1993	XX	MW-216BX34086	110	7.5	6	5.32	154.99							
7/21/1993	XX	MW-216BX34171	90	7.6	8.3	8.53	151.78							
10/13/1993	XX	GW216D064	91	5.7	9.3	5.9	154.41	21.95	273	2	50	0		
10/13/1993	XX	MW-216BX34255	150	6.4	8	13.1	147.21							
1/12/1994	XX	MW-216BX34346	120	6.9	5	6.65	153.66							
5/26/1994	XX	MW-216BX34480	100	6.5	5.6	5.69	154.62							
8/8/1994	XX	MW-216BX34554	70	7	10	7.38	152.93							
11/15/1994	XX	MW-216BX34653	100	6.7	9.5	6.05	154.26							
2/7/1995	XX	MW-216BX34737	130	6.3	5.3	6	154.31							
5/23/1995	XX	MW-216BX34842	240	7.1	6.6	6	154.31							
8/15/1995	XX	MW-216BX34926	70	6.6	9.4	8.11	152.2							
11/30/1995	XX	MW-216BX35033	90	6.9	7.9	5.69	154.62							
2/27/1996	XX	MW-216BX35122	120	7.1	6.5	6	154.31							
5/21/1996	XX	MW-216BX35206	90	6.1	6.2	5.13	155.18							
11/25/1996	XX	MW-216BX35394	170	7	7.9	6.32	153.99			2.5		1		
3/25/1997	XX	MW-2168810-35514	115	6.59	4.9	6.32	153.79			6.3				
6/2/1997	XX	MW-2168811-35583	141	6.61	6.7	6.23	154.08		35.2	1.6		3		
9/9/1997	XX	MW-2168812-35682	161	6.14	9.9	6.89	153.42		58.2	3.6		25		
12/3/1997	XX	MW-2168813-35767	127	6.4	7.8	6.19	154.12		36.9			43		
3/25/1998	XD	MW-2168815-35955	130	6.22	10	6.96	153.35		153.5	5.3		0		
9/8/1998	XX	MW-2168814-35879	150	7.06	5.7	6.22	154.09		30.1	6.6		59		
12/14/1998	XX	MW-2168816-36046	203	6.8	10.9	9.44	150.87		115.5	5.4		0		
3/30/1999	XX	MW-2168817-36143	195	6.87	6.6	7.18	153.13		252.4	5.8		0		
6/9/1999	XX	MW-2168818-36249	151	6.98	7.5	6.58	153.73		268.4	5.7		2		
9/14/1999	XX	MW-2168819-36320	108	6.14	8.8	7.23	153.08		233.1	3.1		0		
12/2/1999	XX	MW-2168820-36417	132	6.35	12.5	9.69	150.62		219.7	2.8		0		
3/28/2000	XX	MW-2168821-36496	76	5.8	7.4	5.87	154.44		285.5	2		0		
6/13/2000	XX	MW-2168822-36613	127	6.25	6.5	5.86	154.45			3.2		0		
9/13/2000	XX	MW-2168824-36782	125	6.11	8.2	6.04	154.27			2.1		0		
12/12/2000	XX	MW-2168825-36872	131	6.53	11.1	9.71	150.6			2.7		0		
3/14/2001	XX	MW-2168826-36964	132	6.49	8.5	6.4	153.91			4.2		0		
6/19/2001	XX	MW-2168827-37061	126	6.45	6	7.18	153.13			4.3		3		
9/11/2001	XX	MW-2168828-37145	105	6.08	13.4	9.25	151.06			4		0		
12/12/2001	XX	MW-2168829-37237	98	6.42	7.2	8.85	151.46			2.6		0		
3/14/2002	XX	MW-2168830-37329	165	7.03	8.4	6.76	153.55			4.3		0		
6/18/2002	XX	MW-2168831-37425	116	6.06	10.8	6.95	153.36			3.9		0		
9/19/2002	XX	MW-2168832-37518	135	6.27	11.8	9.2	151.11			2.5		0		
12/10/2002	XX	MW-2168833-37600	176	6.46	8.8	6.38	153.93			2.5		0		
3/26/2003	XX	MW-2168N3706	144	6.43	5.9					3.4				
9/18/2003	XX	MW-2168N3798	128	5.89	9					2.4				
5/6/2004	XX	MW-2168N37882	155	6.3	11.2					3.1				
7/26/2004	XX	GW216D049	101	6.2	7.2	5.7	154.61		352	3	55	0.4		
10/26/2004	XX	GW216D064	90	5.8	11.6	6.37	153.94		346	3	55	0.1		
5/10/2005	XX	GW216E125	55	5.7	9.3	5.9	154.41	21.95	273	2	50	0		
7/27/2005	XX	GW216E15D	128	5.8	13.7	5.38	154.93		285	2	40	0.4		
9/22/2005	XX	GW216E18B	85	5.3	15.1	6.96	153.35		277	1	75	0		
5/23/2006	XX	GW216E1D6	265	5.8	10.9	6.93	153.38	21.9	285	0.8	70	0		
						5.68	154.63		247	1	205	0		

SUMMARY REPORT  
 Field Data

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO <sub>3</sub> ) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
7/25/2006	XX	GW216B1G3	158	5.5	15.7	5.6	154.71		187	1	140	0.2	
9/12/2006	XX	GW216B1G6	132	4.7	15.5	6.2	154.11		174	1	55	0	
5/15/2007	XX	GW216B223	147	5.5	7.8	5.38	154.93		299	2	45	0.3	
7/24/2007	XX	GW216B267	143	5.8	13.9	6	154.31		363	3	35	1	
9/10/2007	XX	GW216B28H	131	6.1	11.1	7.15	153.16	21.95	203	0.3	50	0.4	
5/20/2008	XX	GW216B2CB	190	6	10.9	5	155.31		264	1	60	2	
7/28/2008	XX	GW216B2FF	378	6	14.4	5.04	155.27		207	0.4	90	6	
10/28/2008	XX	GW216B2I5	166	5.4	11.2	5.2	155.11	22	197	0.6	65	0.6	
4/14/2009	XX	GW216B31D	146	5.4	8.2	5.2	155.11		387	1	40	1.8	
7/7/2009	XX	GW216B35H	DE	DE	DE	DE			DE	DE	DE	DE	

**MW-216BR**

12/8/2009	XX	GW216B3GG	342	8	5.2	5	154.4	22.5	206	0.6	90	0	
4/27/2010	XX	GW216B3IB	288	6.6	10.3	5.22	154.18		254	0.4	70	0	
7/20/2010	XX	GW216B41F	281	6.5	17.1	6.47	152.93		290	0.4	110	0.2	
10/19/2010	XX	GW216B44J	278	6.9	11.5	5.51	153.89	22.46	178	0.4	70	0	
4/26/2011	XX	GW216B490	365	6.4	11.1	5.13	154.27		237	0.4	115	0.9	
7/19/2011	XX	GW216B4CI	370	6.3	21	6.15	153.25		195	0.3	135	0.1	
10/25/2011	XX	GW216B4GD	400	6.5	12.3	5.48	153.92	22.48	267	0.4	135	1.2	
4/24/2012	XX	GW216B513	391	6.2	12	5.22	154.18		25	0.4	200	2.6	
7/24/2012	XX	GW216B562	415	5.9	18.8	6.21	153.19		-126	0.6	160	1	
10/23/2012	XX	GW216B5CD	334	6.3	10.9	5.2	154.2	22.45	249	0.4	120	0.7	

**MW-223A**

11/12/1990	XX	MW-223AXX33189	140	6.1	7	0.23	176.31						
2/19/1991	XX	MW-223AXX33288	F	F	F	F							
6/3/1991	XX	MW-223AXX33382	160	7.8	10	0.81	175.73						
9/16/1991	XX	MW-223AXX33487	180	7.9	10	2.29	174.25						
12/17/1991	XX	MW-223AXX33589	F	F	F	F							
3/2/1992	XX	MW-223AXX33665	F	F	F	F							
6/23/1992	XX	MW-223AXX33778	140	8.4	8.5	1.67	174.87						
8/17/1992	XX	MW-223AXX33833	130	7.7	8	2.83	173.71						
1/26/1993	XX	MW-223AXX33995	F	F	F	F							
4/27/1993	XX	MW-223AXX34086	200	7.6	5.5	0.66	175.88						
7/21/1993	XX	MW-223AXX34171	140	7.3	9.4	3.41	173.13						
10/12/1993	XX	GW223X085	175	7.8	9.6	1.44	175.1	35.46	263	3	95	0	
10/12/1993	XX	MW-223AXX34254	140	7.6	7.8	6.71	169.83						
1/11/1994	XX	MW-223AXX34345	F	F	F	F							
5/27/1994	XX	MW-223AXX34481	130	7.6	7.1	0.87	175.67						
8/8/1994	XX	MW-223AXX34554	100	6.9	9.5	1.61	174.93						
11/15/1994	XX	MW-223AXX34653	140	7.6	8.5	0.98	175.56						
2/7/1995	XX	MW-223AXX34737	F	F	F	F							
5/23/1995	XX	MW-223AXX34842	280	7.5	8.1	0.64	175.9						
8/15/1995	XX	MW-223AXX34926	150	7.5	9.7	2.4	174.14						
11/30/1995	XX	MW-223AXX35033	130	6.9	6.4	0.97	175.57						
2/27/1996	XX	MW-223AXX35122	130	7.2	7.6	0.86	175.68						
5/21/1996	XX	MW-223AXX35206	120	7.9	7.6	0.62	175.92						
11/25/1996	XX	MW-223AXX35394	170	6.7	6.9	1.32	175.22						
3/24/1997	XX	MW-223A811-35513	F	F	F	F			F	F	F	2	
6/3/1997	XX	MW-223A812-35584	179	7.67	7.6	1.48	175.06		28.7	2.3	3	3	

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance		pH	Temperature	Water Level Depth	Water Level Elevation	Well Depth	Corrected Eh	Dissolved Oxygen	Alkalinity (CaCO3) (field)	Turbidity (field)	Flow Rate
			µmhos/cm	@25°C										
			Standard Units	Degrees Celsius		Feet	Feet	Feet	mV	mg/L	mg/L	NTU	cfs	
9/10/1997	XX	MW-223A813-35683	202	8.1	7.47	1.42	175.12	26.8	26.8	5.2	0	0		
12/4/1997	XX	MW-223A814-35768	157	7.3	7.34	1.17	175.37	22.4	22.4		8			
6/11/1998	XX	MW-223A816-35957	179	10.4	7.63	1.58	174.96	118.7	118.7	5.6	2	0		
9/9/1998	XX	MW-223A817-36047	192	9.9	7.51	2.82	173.72	151.8	151.8	5.7	0	0		
12/15/1998	XX	MW-223A818-36144	192	7.3	7.36	1.36	175.18	268.2	268.2	6.3	0	0		
3/30/1999	XX	MW-223A819-36249	182	7.3	7.55	2.25	174.29	273.5	273.5	6.4	42			
6/9/1999	XX	MW-223A820-36320	180	7.7	7.6	0.84	175.7	213.2	213.2	6	7			
9/14/1999	XX	MW-223A821-36417	174	9	7.37	3.18	173.36	212.9	212.9	8.8	3			
12/2/1999	XX	MW-223A822-36496	180	7.4	7.4	0.88	175.66	243	243	6.2	0			
3/28/2000	XX	MW-223A823-36613	175	7.3	7.66	0.6	175.94			6.4	23			
6/13/2000	XX	MW-223A824-36690	178	8.1	7.61	0.97	175.57			9.2	0			
9/13/2000	XX	MW-223A825-36782	175	9.3	7.46	3.7	172.84			7.1	35			
12/12/2000	XX	MW-223A826-36872	161	7.7	7.66	2.21	174.33			5.9	0			
6/19/2001	XX	MW-223A827-37061	156	11.1	6.95	2.42	174.12			3.4	0			
9/11/2001	XX	MW-223A828-37145	145	10.2	7.34	3.67	172.87			5.1	40			
12/11/2001	XX	MW-223A829-37236	157	8	7.28	3.55	172.99			5	10			
3/14/2002	XX	MW-223A830-37329	159	6.7	7.08	0.88	175.66			5.8	49			
6/18/2002	XX	MW-223A831-37425	152	9.5	6.55	1.13	175.41			5.9	0			
9/19/2002	XX	MW-223A832-37518	162	10.5	7.24	4.04	172.5			6.1	11			
12/10/2002	XX	MW-223A833-37600	186	7.2	7.12	1.57	174.97			5.2	999			
3/25/2003	XX	MW-223AN37705	159	4.7	7.53					7.2				
6/26/2003	XX	MW-223AN37882	168	10.6	7.54					6.2				
9/18/2003	XX	MW-223AN37982	156	11.2	7.29					7.2				
5/5/2004	XX	GW223A014	151	9.6	7.2	0.98	175.56	318	318	3	95	1.4		
7/28/2004	XX	GW223A04A	187	10.7	7.8	1.95	174.59	330	330	4	110	0		
10/25/2004	XX	GW223A065	175	9.6	7.8	1.44	175.1	35.46	35.46	3	95	0		
5/10/2005	XX	GW223A126	132	13.8	7.7	0.6	175.94	254	254	3	90	0		
7/26/2005	XX	GW223A15E	167	11.9	7.7	2.04	174.5	258	258	4	65	0		
9/21/2005	XX	GW223A18C	79	13.2	7.5	1.59	174.95	405	405	2	75	0		
5/24/2006	XX	GW223A1D7	200	9.5	7.4	1.1	175.44	300	300	3	180	0		
7/26/2006	XX	GW223A1G4	174	13.7	7.7	1.25	175.29	367	367	3	150	0		
9/13/2006	XX	GW223A1H	191	12	6.9	1.6	174.94	356	356	3	85	0		
7/24/2007	XX	GW223A2B8	208	16.2	7.1	1.57	174.97	369	369	2	80	0		
5/15/2007	XX	GW223A224	197	10.6	7.1	2.05	174.49	445	445	3	75	0		
9/11/2007	XX	GW223A28I	190	8.5	7.8	3.5	173.04	286	286	2	80	0		
5/20/2008	XX	GW223A2CC	193	8.5	7.7	1.85	174.69	121	121	2	100	0.1		
7/30/2008	XX	GW223A2FG	198	14.9	7.3	1.87	174.67	388	388	3	110	0		
10/28/2008	XX	GW223A2I6	189	13.7	7.5	1.35	175.19	165	165	2	85	0		
4/14/2009	XX	GW223A31E	355	5.6	7	0.9	175.64	298	298	1	130	0.5		
7/17/2009	XX	GW223A38I	260	12	6.7	0.71	175.83	319	319	1	85	0.1		
10/27/2009	XX	GW223A3DD	271	8.6	7.3	1.35	175.19	360	360	1	85	0		
4/27/2010	XX	GW223A3IC	297	7	7.4	1.35	175.19	332	332	1	70	0.9		
7/20/2010	XX	GW223A41G	309	14.8	7.1	3.9	172.64	350	350	1	125	0.2		
10/19/2010	XX	GW223A450	324	9	7.5	2.2	174.34	253	253	2	100	0		
4/26/2011	XX	GW223A481	361	8.8	7.4	0.75	175.79	309	309	2	115	0.4		
7/19/2011	XX	GW223A4CJ	375	14.2	7.5	2.25	174.29	422	422	2	110	0.2		
10/25/2011	XX	GW223A4GE	367	10.8	7.5	0.7	175.94	271	271	1	95	1.7		
4/24/2012	XX	GW223A454	378	8	7.8	0.4	176.14	-345	-345	1	200	2.2		
7/24/2012	XX	GW223A4563	400	13.4	7.3	2.1	174.44	323	323	1	160	0.6		
10/23/2012	XX	GW223A45CE	390	8.5	7.5	0.5	176.04	207	207	1	125	0.8		

SUMMARY REPORT  
 Field Data

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
11/12/1990	XX	MW-223BX33189	130	6.3	7	2.36	173.57						
2/19/1991	XX	MW-223BX33288	F	F	F	F							
6/3/1991	XX	MW-223BX33392	140	7.9	10.6	0.69	175.24						
9/16/1991	XX	MW-223BX33497	140	8.2	13.3	3.34	172.59						
12/17/1991	XX	MW-223BX33589	F	F	F	F							
3/2/1992	XX	MW-223BX33665	F	F	F	F							
6/23/1992	XX	MW-223BX33778	190	8	9	2.27	173.66						
8/17/1992	XX	MW-223BX33833	100	7.4	9.5	3.61	172.32						
1/26/1993	XX	MW-223BX33995	F	F	F	F							
4/27/1993	XX	MW-223BX34086	130	7.4	4	1.42	174.51						
7/21/1993	XX	MW-223BX34171	110	7.4	10.6	4.38	171.55						
10/12/1993	XX	MW-223BX34254	150	7.2	10	6.9	169.03						
1/11/1994	XX	MW-223BX34345	F	F	F	F							
5/26/1994	XX	MW-223BX34480	110	7.2	8.3	1.74	174.19						
8/8/1994	XX	MW-223BX34554	100	6.8	11	2.53	173.4						
11/15/1994	XX	MW-223BX34653	130	7.6	9.4	1.98	173.95						
2/17/1995	XX	MW-223BX34737	F	F	F	F							
5/23/1995	XX	MW-223BX34842	280	7.5	8.2	1.6	174.33						
8/15/1995	XX	MW-223BX34926	110	7.3	9.3	3.4	172.53						
11/30/1995	XX	MW-223BX35033	110	6.9	6.9	1.96	173.98						
2/27/1996	XX	MW-223BX35122	110	7.4	6	1.66	174.27						
5/21/1996	XX	MW-223BX35206	100	7.1	6.8	1.24	174.69						
11/25/1996	XX	MW-223BX35394	120	7.2	6.4	2.82	173.11						
3/24/1997	XX	MW-2238812-35513	F	F	F	F		F	F	4	1.5		
6/3/1997	XX	MW-2238813-35584	152	7.38	8.3	2.51	173.42			9.4	6		
9/10/1997	XX	MW-2238814-35683	177	7.3	11.4	4.05	171.88			11.3	0		
12/4/1997	XX	MW-2238815-35768	139	7.26	6.7	2.76	173.17			40.4	83		
6/8/1998	XX	MW-2238817-35954	155	7.29	8.4	2.63	173.3			141.6	0		
9/9/1998	XX	MW-2238818-36047	172	7.15	12.2	5.06	170.87			186.7	0		
12/15/1998	XX	MW-2238819-36144	178	6.98	7.1	2.42	173.51			248.6	0		
3/30/1999	XX	MW-2238820-36249	164	7.15	5.9	1.71	174.22			282.8	0		
6/9/1999	XX	MW-2238821-36320	159	7.16	8.6	1.94	173.99			221	0		
9/14/1999	XX	MW-2238822-36417	158	6.94	11.6	4.18	171.75			200.2	0		
12/2/1999	XX	MW-2238823-36496	162	7.11	7.6	2.24	173.69			254.9	0		
3/28/2000	XX	MW-2238824-36613	187	7.14	5.9	1.62	174.31			1.3	9		
6/13/2000	XX	MW-2238825-36680	166	6.95	8.1	2.07	173.86			2.1	0		
9/13/2000	XX	MW-2238826-36782	160	6.98	11.7	4.41	171.52			1.5	0		
12/12/2000	XX	MW-2238827-36872	156	7.08	7.1	2.97	172.96			2.1	0		
6/19/2001	XX	MW-2238828-37061	224	6.39	12	3.62	172.31			1.2	0		
9/11/2001	XX	MW-2238829-37145	211	6.83	12.5	4.75	171.18			0.4	0		
12/11/2001	XX	MW-2238830-37236	233	7.1	8.4	4.5	171.43			0.4	5		
3/14/2002	XX	MW-2238831-37329	176	6.94	6.4	2.62	173.31			0.5	6		
6/18/2002	XX	MW-2238832-37425	163	6.9	8.6	2.32	173.61			1	0		
9/19/2002	XX	MW-2238833-37518	179	7.06	9.2	5.25	170.68			0.7	0		
12/10/2002	XX	MW-2238834-37600	193	6.9	6.5	2.72	173.21			2.5	0		
3/25/2003	XX	MW-2238837705	172	7.05	4.9					0.5			
6/26/2003	XX	MW-2238837798	177	7.21	9.1					1.1			
9/18/2003	XX	MW-2238837982	177	7.04	11.1					1.6			

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

<b>(MW-223B)</b>		Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO <sub>3</sub> ) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
Date	Type	Sample ID										
5/5/2004	XX	GW223B00A	170	6.6	1.98	173.95		352	1	95	1.1	
7/27/2004	XX	GW223B03I	211	10.7	3.26	172.67		312	2	125	0.9	
10/25/2004	XX	GW223B07E	191	7.6	2.71	173.22	19.95	260	2	105	0.6	
5/10/2005	XX	GW223B13F	158	13.3	2	173.93		280	2	130	0.8	
7/26/2005	XX	GW223B173	186	7.7	4.03	171.9		265	2	60	0.6	
9/21/2005	XX	GW223B1A1	187	13.7	2.85	173.08	20.1	388	2	105	0	
5/24/2006	XX	GW223B1EG	196	7.4	2.41	173.52		378	2	120	0.2	
7/26/2006	XX	GW223B1HD	189	17.7	2.52	173.41		372	2	140	0	
9/13/2006	XX	GW223B206	196	7.3	2.92	173.01	20.1	373	2	60	0	
5/15/2007	XX	GW223B23D	240	6.8	2.8	173.13		391	1	70	0.4	
7/24/2007	XX	GW223B27H	224	7.3	3.28	172.65		435	1	60	0	
9/11/2007	XX	GW223B2A7	217	7.3	4.46	171.47	19.93	273	1	100	0.4	
5/20/2008	XX	GW223B2E1	245	7.4	3.2	172.73		247	1	115	0	
7/30/2008	XX	GW223B2H5	251	7.2	3.17	172.76		381	0.8	125	1	
10/28/2008	XX	GW223B2JF	242	7.2	2.6	173.33	20.1	235	1	115	0.6	
4/14/2009	XX	GW223B333	234	7	2.5	173.43		271	1	90	0.4	
7/17/2009	XX	GW223B377	281	6.8	2	173.93		353	1	105	1	
10/27/2009	XX	GW223B3F2	331	7.5	2.65	173.28	19.95	387	1	90	0	
4/27/2010	XX	GW223B401	306	7.1	2.67	173.26		393	1	80	1.8	
7/20/2010	XX	GW223B435	343	7	4.92	171.01		-113	1	120	0.8	
10/19/2010	XX	GW223B469	316	7.4	3.45	172.48	20	108	0.8	70	0	
4/26/2011	XX	GW223B4AA	320	7.2	2.2	173.73		328	1	70	0.2	
7/19/2011	XX	GW223B4E8	336	7.4	3.7	172.23		357	0.8	75	0.6	
10/25/2011	XX	GW223B4I3	327	7.5	2.2	173.73	19.93	144	0.4	80	2.5	
4/24/2012	XX	GW223B5D	316	7.1	1.95	173.98		-402	0.8	180	3.6	
7/24/2012	XX	GW223B57C	338	6.9	3.8	172.13		173	1	140	1.2	
10/23/2012	XX	GW223B5E3	333	7.5	2.1	173.83	20.05	238	1	90	0.9	
<b>MW-227</b>												
11/13/1990	XX	MW-227XX3160	170	8.3	3.88	160.35						
2/19/1991	XX	MW-227XX3288	F	F	F							
6/3/1991	XX	MW-227XX3392	180	8.2	3.14	161.09						
9/16/1991	XX	MW-227XX33497	230	8.3	7.69	156.54						
12/17/1991	XX	MW-227XX33589	90	8.4	4.28	159.95						
3/2/1992	XX	MW-227XX33665	F	F	F							
6/23/1992	XX	MW-227XX33778	160	8.6	6.17	158.06						
8/17/1992	XX	MW-227XX33833	180	8.1	9.06	155.17						
1/26/1993	XX	MW-227XX33995	F	F	F							
4/27/1993	XX	MW-227XX34096	240	7.7	4.15	160.08						
7/2/1993	XX	MW-227XX34171	130	7.3	11.1	153.13						
10/12/1993	XX	MW-227XX34254	200	8.1	8.4	149.5						
1/11/1994	XX	MW-227XX34345	F	F	F							
5/26/1994	XX	MW-227XX34480	170	8.1	6.3	159.43						
8/8/1994	XX	MW-227XX34654	130	7.1	4.71	159.52						
11/15/1994	XX	MW-227XX34653	180	8.5	9.2	159.87						
2/7/1995	XX	MW-227XX34737	F	F	F							
5/23/1995	XX	MW-227XX34842	310	8.4	4.25	159.98						
8/15/1995	XX	MW-227XX34926	150	8.3	7.9	156.33						
11/30/1995	XX	MW-227XX35033	170	8	4.65	159.58						
2/27/1996	XX	MW-227XX35122	F	F	F							

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance		pH	Temperature	Water Level Depth	Water Level Elevation	Well Depth	Corrected Eh	Dissolved Oxygen	Alkalinity (CaCO3)	Turbidity (field)	Flow Rate
			µmhos/cm @25°C	mg/L										
			Standard Units	Degrees Celsius		Feet	Feet	mV	mg/L	mg/L	NTU	cfs		
5/21/1996	XX	MW-227XX35206	140	8.7	7.4	4.09	160.14							
11/25/1996	XX	MW-227XX35394	170	7.4	7.2	4.96	159.27			3		35		
3/24/1997	XX	MW-227R13-35513	F	F	F	F				F		F		
6/3/1997	XX	MW-227R14-35584	194	9.7	8.48	5.32	158.91		71.2	2.5		962		
9/9/1997	XX	MW-227R15-35682	217	11	8.27	5.16	159.07		65.1	2.1		0		
12/4/1997	XX	MW-227R16-35788	169	6.9	7.42	4.89	159.34		45.6			5		
3/25/1998	XX	MW-227R17-35879	178	4.4	8.4	4.93	159.3		51.5	2.6		0		
6/8/1998	XX	MW-227R18-35954	187	8.1	8.32	6.04	158.19		105.3	2.4		0		
9/9/1998	XX	MW-227R19-36047	203	11.3	8.01	10.8	153.43		162.6	2.6		0		
12/15/1998	XX	MW-227R20-36144	213	6.7	7.99	4.8	159.43		224.2	5.4		0		
3/29/1999	XX	MW-227R21-36248	194	5.3	8.19	5.08	160.13		284.8	4.3		0		
6/8/1999	XX	MW-227R22-36319	183	13.2	7.07	4.1	159.15		255.8	1.5		0		
9/13/1999	XX	MW-227R23-36416	182	13.4	7.9	8.47	155.76		274.3	1.9		0		
12/1/1999	XX	MW-227R24-36495	188	6.8	8	4.62	159.61		245	5.3		0		
3/27/2000	XX	MW-227R25-36612	183	5.8	8.09	4.32	159.91		2.5	1.6		0		
6/12/2000	XX	MW-227R26-36689	179	8.9	8.04	4.59	159.64							
9/12/2000	XX	MW-227R27-36781	182	12.4	8.24	9.93	154.3		3.8	3.8	10			
12/11/2000	XX	MW-227R28-36871	166	6.9	8.33	5.1	159.13		6.9	0		0		
3/12/2001	XX	MW-227R29-36962	150	4.3	8.34	5.01	159.22		4	2.5		0		
6/18/2001	XX	MW-227R30-37060	158	12.3	8.4	7.04	157.19			3.4		0		
9/10/2001	XX	MW-227R31-37144	143	14.2	8.1	10.52	153.71			4.8		0		
12/12/2001	XX	MW-227R32-37237	163	7.2	8.02	5.25	158.98			5		0		
3/14/2002	XX	MW-227R33-37329	161	5.9	7.99	4.28	159.95			3		0		
6/17/2002	XX	MW-227R34-37424	158	9.7	8.05	4.5	159.73			2.4		2		
9/18/2002	XX	MW-227R35-37517	167	11.7	8.42	13.12	151.11			8.7		0		
12/9/2002	XX	MW-227R36-37599	184	5	7.82	5.35	158.88			2.6				
3/25/2003	XX	MW-227R37-705	160	4.1	8.14					3.6				
9/18/2003	XX	MW-227R37-705	165	7.82	7.82					4.1				
5/5/2004	XX	MW-227X015	151	6.4	7.7	3.96	160.27		349	1	95	2.8		
7/26/2004	XX	MW-227X04B	149	8.2	8.2	5.73	158.5		339	2	120	0.9		
10/26/2004	XX	MW-227X06B	201	6.2	6.2	4.4	159.83	22.21	266	1	105	0		
5/9/2005	XX	MW-227X127	122	8.2	8.2	3.9	160.33		263	1	100	0		
7/27/2005	XX	MW-227X15F	162	7.8	7.8	7.14	157.09		298	1	95	0.3		
9/21/2005	XX	MW-227X18D	160	8.7	8.7	4.34	159.89	22.34	239	1	75	1.9		
5/24/2006	XX	MW-227X1D8	163	8.3	8.3	4.25	159.98		354	0.8	150	0		
7/26/2006	XX	MW-227X1G5	161	8.1	8.1	4.33	159.9		347	1	125	0.3		
9/13/2006	XX	MW-227X1I1	185	7.7	7.7	4.9	159.33	22.35	341	1	75	0		
5/15/2007	XX	MW-227X225	200	7.4	7.4	4.21	160.02		334	1	60	0.2		
7/24/2007	XX	MW-227X269	182	7.7	7.7	4.6	159.63		366	0.8	60	0		
9/11/2007	XX	MW-227X28J	181	8.4	8.4	6.04	158.19	22.33	262	0.8	70	0.2		
5/20/2008	XX	MW-227X2CD	179	7.4	7.4	4.38	159.85		175	2	90	0.3		
7/30/2008	XX	MW-227X2FH	187	8.2	8.2	4.36	159.87		310	1	75	0		
10/27/2008	XX	MW-227X2I7	174	7.5	7.5	4	160.23	22.33	205	2	100	0		
4/14/2009	XX	MW-227X31F	186	6.2	7.9	4.12	160.11		252	2	60	0.6		
7/17/2009	XX	MW-227X35J	185	8.3	8.3	3.85	160.38		329	1	70	0.2		
10/27/2009	XX	MW-227X3DE	182	8.1	8.1	4.1	160.13	22.2	411	2	55	2.3		
4/27/2010	XX	MW-227X3ID	183	7.8	7.8	4.23	160		364	1	50	3.5		
7/20/2010	XX	MW-227X41H	185	7.7	7.7	6.65	157.58		180	0.6	70	2.6		
10/19/2010	XX	MW-227X45I	189	7.9	7.9	4.42	159.81	22.3	191	0.8	50	0.7		

**SUMMARY REPORT**  
Field Data

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Specific Conductance		pH	Temperature	Water Level Depth	Water Level Elevation	Well Depth	Corrected Eh	Dissolved Oxygen	Alkalinity (CaCO3) (field)	Turbidity (field)	Flow Rate
			µmhos/cm @25°C	mg/L										
4/26/2011	XX	GW227X492	194	8.1	9.8	4.1	160.13		339	2	70	1.6		
7/19/2011	XX	GW227X4D0	199	8.5	15.6	5.75	158.48		356	1	60	0.2		
10/25/2011	XX	GW227X49F	188	8.3	11.3	4.05	160.18	22.28	346	0.6	65	3.3		
4/24/2012	XX	GW227X515	186	8.5	6.8	3.64	160.59		-455	2	120	3		
7/24/2012	XX	GW227X584	191	7.8	13.9	6.45	157.78		43	1	80	1.3		
10/23/2012	XX	GW227X5CF	201	7.8	11	4.23	160	22.3	213	0.3	100	1.3		
<b>MW-301</b>														
11/25/1996	XX	MW-301XX35394	170	7.8	3.2	*				4			1.7	
3/24/1997	XX	MW-301815-35513	F	F	F	F			F	F			F	
6/3/1997	XX	MW-301816-35584	166	8.14	7.9	0	166.36		41.5	2			18	
9/9/1997	XX	MW-301817-35682	185	8.12	10.5	0	166.36		25	5.2			1	
12/3/1997	XX	MW-301818-35787	139	7.58	7.3	0	166.36		52.7	4			4	
3/23/1998	XX	MW-301819-35877	153	8.36	6.1	0	166.36		38	0			0	
6/8/1998	XX	MW-301820-35954	164	8.27	8.1	0	166.36		132.9	5.3			0	
9/9/1998	XX	MW-301821-36047	178	8.13	11.9	0.1	166.26		87.3	5.1			0	
12/14/1998	XX	MW-301822-36143	179	8.16	7.3	0	166.36		182	5.5			0	
3/29/1999	XX	MW-301823-36248	166	8.19	5.6	0	166.36		278.1	5.3			1	
6/8/1999	XX	MW-301824-36319	161	8.25	9.8	0	166.36		268.3	4.6			0	
9/13/1999	XX	MW-301825-36416	161	7.9	14.6	0	166.36		203.2	4.6			0	
12/1/1999	XX	MW-301826-36495	161	8.11	8.3	0	166.36		233.6	4.8			0	
3/27/2000	XX	MW-301827-36612	159	8.08	7.2	0	166.36		4.2	4.2			0	
6/12/2000	XX	MW-301828-36689	162	8.1	9.2	0	166.36		4.3	4.3			0	
9/12/2000	XX	MW-301829-36781	161	8.11	12.4	0	166.36		3.4	3.4			0	
6/18/2001	XX	MW-301830-37080	146	7.98	9.9	0	166.36		3.3	3.3			0	
9/10/2001	XX	MW-301831-37144	128	8.01	13.4	0.88	165.48		3.1	3.1			0	
12/11/2001	XX	MW-301832-37236	147	7.82	9.6	0	165.46		3.7	3.7			0	
3/13/2002	XX	MW-301833-37328	147	7.92	7.3	0	166.36		3.2	3.2			0	
6/17/2002	XX	MW-301834-37424	144	8.06	9.1	0	166.36		2.6	2.6			0	
9/18/2002	XX	MW-301835-37517	154	8.14	12.9	1.29	165.07		4.4	4.4			2	
3/25/2003	XX	MW-301N37705	147	8.08	4.2									
6/25/2003	XX	MW-301N37787	153	8.03	11.3									
9/17/2003	XX	MW-301N37881	155	7.95	12.5									
5/5/2004	XX	GW301X016	167	8.1	10.8	1.68	164.68		355	3	70	0.8		
7/26/2004	XX	GW301X04C	162	8	19.1	2.15	164.21		338	4	95	2.1		
10/25/2004	XX	GW301X067	181	8.3	9.6	1.81	164.55	185.13	383	1	100	0.2		
5/9/2005	XX	GW301X128	82	8	9	0.6	165.76		236	1	90	0.2		
8/1/2005	XX	GW301X15G	162	7.7	14.6	2.32	164.04		284	2	90	0		
9/22/2005	XX	GW301X18E	152	7.1	16.2	2.73	163.63	184.4	213	2	45	0		
5/22/2006	XX	GW301X1D9	230	8	9.2	4.25	162.11		207	1	120	1		
7/24/2006	XX	GW301X1G6	165	7.4	17.8	4.03	162.33		282	1	105	0.9		
9/11/2006	XX	GW301X1U	175	7.2	14.3	3.93	162.43	184.05	285	1	70	3.1		
5/14/2007	XX	GW301X26	187	8.1	12.4	4.7	161.66		386	1	70	1.5		
7/23/2007	XX	GW301X26A	151	7.6	16.8	4.3	162.06		166	2	95	17.8		
9/10/2007	XX	GW301X290	186	7.9	13.9	4.76	161.6	183.75	236	5	75	0.8		
5/19/2008	XX	GW301X2CE	188	8.2	7.4	4.53	161.83		105	1	75	2.4		
7/30/2008	XX	GW301X2FI	178	7.9	16.3	4.4	161.96		339	1	55	0.7		
10/28/2008	XX	GW301X2IB	200	7.8	13.4	4.3	162.06	185.05	200	1	60	0.5		
4/15/2009	XX	GW301X31G	248	7.1	7.4	4.84	161.52		317	1	70	1.3		
7/7/2009	XX	GW301X380	203	8.3	11.4	4.1	162.26		337	1	75	1.4		

SUMMARY REPORT  
 Field Data

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO <sub>3</sub> ) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
10/26/2009	XX	GW301X3DF	276	8.2	9.3	4.25	162.11	185.15	471	4	65	2.6	
4/26/2010	XX	GW301X3E	183	7.9	14.5	5.2	161.16		284	4	100	4.2	
7/19/2010	XX	GW301X411	137	7	17.8	5.16	161.2		266	1	105	2.6	
10/19/2010	XX	GW301X452	340	7.3	11.7	4.96	161.4	182.45	427	1	60	0	
4/27/2011	XX	GW301X493	210	8.2	9.3	4.31	162.05		354	1	60	3	
7/20/2011	XX	GW301X4D1	193	8.1	15.7	5.1	161.26		267	1	60	1.1	
10/26/2011	XX	GW301X4GG	204	7.3	9.4	4.11	162.25	185.1	265	0.6	55	5.5	
4/25/2012	XX	GW301X516	194	8.1	9.5	3.93	162.43		290	0.6	100	7.6	
7/25/2012	XX	GW301X565	202	7.4	13.3	5	161.36		307	0.8	120	1.5	
10/24/2012	XX	GW301X5CG	171	7.2	15.5	4.56	161.8	179.61	448	1	55	8.5	

MW-302

6/23/1992	XX	MW-302XX33778	170	7.8	8	6.19	199.03						
8/17/1992	XX	MW-302XX33833	160	7.2	8	9.53	195.69						
1/26/1993	XX	MW-302XX33965	160	7	2	7.44	197.78						
1/26/1993	XX	GW302X03H	335	6.9	10.8	7.23	197.99		333	2	210	1.1	
4/27/1993	XX	MW-302XX34086	180	7.2	5.5	4.05	201.17						
7/21/1993	XX	MW-302XX34171	150	7	11.1	8.51	196.71						
10/12/1993	XX	MW-302XX34254	130	7.3	8.5	15.4	189.82						
1/11/1994	XX	MW-302XX34345	160	7.6	5.5	4.25	200.97						
5/26/1994	XX	MW-302XX34480	140	6.9	6.8	3.09	202.13						
8/8/1994	XX	MW-302XX34554	100	6.9	11	5.4	199.82						
11/16/1994	XX	MW-302XX34654	190	7.3	8.4	4.32	200.9						
2/7/1995	XX	MW-302XX34737	210	6.3	5	3.61	201.61						
5/23/1995	XX	MW-302XX34842	340	7.3	8.6	3.29	201.93						
8/14/1995	XX	MW-302XX34925	170	7.1	9.3	6.69	198.53						
2/27/1996	XX	MW-302XX35122	1	1	1	1	1						
5/21/1996	XX	MW-302XX35206	1	1	1	1	1						
11/26/1996	XX	MW-302XX35395	208	6.8	8	6.59	198.63			2.5		2.1	
3/26/1997	XX	MW-302827-35515	224	6.82	5.4	7.45	197.77			4.9			
6/3/1997	XX	MW-302828-35584	277	7.05	7.8	5.53	199.69		18	2.1		21	
9/10/1997	XX	MW-302828-35683	414	7.04	10.7	6.56	198.66		2.3	7.9		55	
12/4/1997	XX	MW-302830-35768	350	6.86	7	4.88	200.34		13.6	200.34		11	
3/25/1998	XX	MW-302831-35879	336	6.89	5.6	4.65	200.57		17.7	3.7		7	
6/8/1998	XX	MW-302832-35954	282	6.6	8.4	6.31	198.91		148.2	1.8		0	
9/9/1998	XX	MW-302833-36047	408	6.36	11.2	10.4	194.82		83.7	1.2		0	
12/15/1998	XX	MW-302834-36144	366	6.3	8.2	5.39	199.83		191.1	1.3		3	
3/30/1999	XX	MW-302835-36249	287	6.7	6.4	3.41	201.81		288.5	1.7		17	
6/9/1999	XX	MW-302836-36320	273	6.56	9.5	4.86	200.36		238.2	0		0	
9/13/1999	XX	MW-302837-36416	322	6.55	14.3	14.12	191.1		258.3	3.9		0	
12/11/1999	XX	MW-302838-36495	343	6.53	7.5	4.29	200.93		289	1.3		0	
3/27/2000	XX	MW-302839-36612	363	6.7	7.6	4.09	201.13		289	0.9		0	
6/13/2000	XX	MW-302840-36690	258	6.72	8.9	4.99	200.23		1.2	1.2		1	
9/12/2000	XX	MW-302841-36781	314	6.83	12.5	14.19	191.03		2.3	2.3		3	
12/11/2000	XX	MW-302842-36871	345	6.65	8.2	7.65	197.57		1.9	0		0	
3/12/2001	XX	MW-302843-36962	254	6.63	6.1	7.3	197.92		2.5	2.5		0	
6/18/2001	XX	MW-302844-37060	252	6.67	11.7	7.8	197.42		1.8	1.8		0	
9/10/2001	XX	MW-302845-37144	235	6.51	14.3	14.4	190.82		2.3	2.3		0	
12/11/2001	XX	MW-302846-37236	335	6.72	9.9	14.19	191.03		1.3	1.3		0	
3/13/2002	XX	MW-302847-37328	315	6.74	6.5	3.75	201.47		3.1	3.1		23	

SUMMARY REPORT  
Field Data

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
6/17/2002	XX	MW-302948-37424	284	6.72	10	5.01	200.21			1.1		0	
9/18/2002	XX	MW-302848-37517	332	6.73	14.8	14.53	190.69			1.9		0	
12/9/2002	XX	MW-302850-37599	387	6.66	6.7	4.9	200.32			3.8		0	
3/25/2003	XX	MW-302837705	257	6.53	6.3					3.1			
6/25/2003	XX	MW-302837797	300	6.5	9.2					2.4			
9/17/2003	XX	MW-302837881	324	6.5	13					3.4			
5/6/2004	XX	GW302X009	282	6.8	9.9	3.91	201.31		269	3	140	5.4	
7/27/2004	XX	GW302XHD1	335	6.9	10.8	7.23	197.99		333	2	210	1.1	
10/25/2004	XX	GW302X07C	319	6.7	9.7	6.65	198.57	30.42	340	1	180	0.3	
5/10/2005	XX	GW302X13D	149	7.7	14.1	3.78	201.44		232	3	180	0.9	
7/27/2005	XX	GW302X171	324	6.9	17.5	7.76	197.46		196	4	140	2.6	
9/19/2005	XX	GW302X19J	245	6.9	17.7	8.16	197.06	30.35	403	2	140	2.9	
5/23/2006	XX	GW302X1EE	342	7.3	14.5	4.47	200.83		366	3	180	4.5	
7/24/2006	XX	GW302X1HB	336	6.7	16.6	4.89	200.41		220	5	230	1.2	
9/12/2006	XX	GW302X204	351	6.5	11.1	7.27	198.03	30.28	355	2	75	0.4	
5/14/2007	XX	GW302X23B	299	7.1	11.9	5.9	199.4		443	3	100	0.6	
7/25/2007	XX	GW302X27F	505	9.2	14.4	8.41	196.89		344	4	90	0	
9/10/2007	XX	GW302X2A5	DE	DE	DE	DE	DE	DE	DE	DE	DE	DE	DE
<b>MW-302R</b>													
5/20/2008	XX	GW302X2DJ	246	6.9	8.2	7.3	199.56		223	4	140	3.1	
7/29/2008	XX	GW302X2H3	238	6.6	12.3	8.27	198.59		256	3	140	0.9	
10/27/2008	XX	GW302X2JD	261	6.8	10.9	7.72	199.14	32.25	271	2	75	1.9	
4/13/2009	XX	GW302X331	184	6.2	7.5	5.75	201.11		302	4	80	0.4	
7/6/2009	XX	GW302X375	220	6.2	12	5	201.86		315	3	100	0.9	
10/27/2009	XX	GW302X3F0	470	6.1	9.8	8.46	198.4	32.25	360	1	115	0	
4/26/2010	XX	GW302X3JJ	167	6.4	8.8	7.53	199.33		349	4	135	1.2	
7/19/2010	XX	GW302X433	475	6	13.6	15.91	190.95		291	2	165	0.4	
10/18/2010	XX	GW302X467	502	6.5	11.1	8.05	198.81	32.22	347	1	130	0	
4/25/2011	XX	GW302X4A8	301	6.4	7.8	5.3	201.56		291	1	130	0	
7/18/2011	XX	GW302X4E6	382	6.7	13.3	11.2	195.66		304	2	345	0.2	
10/24/2011	XX	GW302X4I1	400	6.9	11.4	6.6	200.26	32.2	362	2	270	1.5	
4/23/2012	XX	GW302X52B	249	6.7	7.2	9.02	197.84		315	3	220	1.9	
7/23/2012	XX	GW302X57A	355	6.6	12.2	11.25	195.61		241	3	60	1.7	
10/22/2012	XX	GW302X5E1	463	6.8	12.3	4.12	202.74	32.2	319	3	70	1.9	
<b>MW-303</b>													
11/26/1996	XX	MW-303XX35395	100	6.9	8.1	26.78	181.09			2.5		24.5	
3/26/1997	XX	MW-303826-35515	45	6.42	7.9	24.88	182.99			9.7		40	
6/2/1997	XX	MW-303829-35583	54	6.63	8.8	21.37	186.5		43.4	2.3		53	
9/8/1997	XX	MW-303830-35681	58	7.03	7.7	27.15	180.72		31.5	9.3		63	
12/3/1997	XX	MW-303831-35767	46	6.98	6.7	28.54	179.33		24.1	24.1		85	
3/25/1998	XX	MW-303832-35879	49	6.47	6.9	23.27	184.6		41.4	10.1		4	
6/9/1998	XX	MW-303833-35965	52	6.6	8	23.03	184.84			10.8		0	
9/8/1998	XX	MW-303834-38046	57	6.33	8.2	26.51	181.36		197.1	11		0	
12/14/1998	XX	MW-303835-36143	61	6.95	7.2	29.45	178.42			10.9		13	
3/29/1999	XX	MW-303836-36248	56	6.78	6.7	21.09	186.78		261.1	10.9		88	
6/8/1999	XX	MW-303837-36319	50	7.07	8.1	23.61	184.26		249.9	10.9		999	
9/13/1999	XX	MW-303838-36416	48	6.72	7.7	29.52	178.35		104.5	11.7		115	
12/1/1999	XX	MW-303839-36465	50	6.92	6.1	25.66	182.21		242.3	10.6		0	

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Specific Conductance		pH	Temperature	Water Level	Water Level	Well Depth	Corrected Eh	Dissolved Oxygen	Alkalinity (CaCO3)	Turbidity (field)	Flow Rate
			µmhos/cm	@25°C										
3/27/2000	XX	MW-303940-36612	50		6.96	7.1	21.02	186.85			11.3		0	
6/12/2000	XX	MW-303841-36689	49		7.16	7.2	21.4	186.47			11.5		0	
9/13/2000	XX	MW-303942-36782	50		7.24	7.9	28.05	179.82			9.9		0	
12/11/2000	XX	MW-303843-36871	49		6.97	6.9	31	176.87			11.2		0	
3/13/2001	XX	MW-303844-36963	44		7	6.4	30.9	176.97			11.6		23	
6/19/2001	XX	MW-303845-37061	48		6.74	10.4	26.57	181.3			10.5		60	
9/11/2001	XX	MW-303846-37145	42		6.89	8	30.48	177.99			11.1		0	
12/12/2001	XX	MW-303847-37237	49		7.5	5.9	23.05	184.82			10.3		5	
3/13/2002	XX	MW-303848-37328	50		7.46	6.8	31.17	176.7			9.5		7	
6/17/2002	XX	MW-303848-37424	47		7.33	7.7	23.8	184.07			10		0	
9/18/2002	XX	MW-303850-37517	49		7.07	7.5	29.2	178.67			11.9		0	
12/9/2002	XX	MW-303851-37599	64		6.51	5.3	30.32	177.55			9.7		0	
3/26/2003	XX	MW-303837706	47		7.16	6.7					12.7			
6/25/2003	XX	MW-303837781	50		6.98	9					11.4			
9/17/2003	XX	MW-303837881	49		7.19	7.9					296		0.3	
5/6/2004	XX	GW303X00C	62		6.4	7.5	23.31	184.56			6		0.4	
7/28/2004	XX	GW303X040	60		6.3	8.7	25.3	182.57			239			
10/26/2004	XX	GW303X07G	63		7.2	8.3	27.93	179.94	46.83		6		0	
5/11/2005	XX	GW303X13H	38		7.2	13	19.75	188.12			290		0	
8/1/2005	XX	GW303X175	33		7.1	17.5	23.2	184.67			5		0	
9/19/2005	XX	GW303X1A3	56		7.2	15.2	25.3	182.57	46.93		6		0	
5/23/2006	XX	GW303X1EI	48		7	9.4	22.5	185.37			5		0	
7/24/2006	XX	GW303X1HF	53		6.6	12.2	22.45	185.42			4		0	
9/12/2006	XX	GW303X208	60		7	16.4	23.36	184.51	46.9		6		0	
5/14/2007	XX	GW303X23F	59		7.1	11.3	21.48	186.39			5		0	
7/25/2007	XX	GW303X27J	67		7	16.6	25.9	181.97			5		0	
9/11/2007	XX	GW303X2A9	63		6.9	10.5	28.7	179.17	46.85		5		0	
5/19/2008	XX	GW303X2E3	91		6.7	9	21.18	186.69			4		0	
7/29/2008	XX	GW303X2H7	97		6.4	13.9	24.82	183.05			4		0.2	
10/27/2008	XX	GW303X2JH	104		6.6	10.5	26.2	181.67	46.9		2		0.3	
4/13/2009	XX	GW303X335	158		6.3	7.5	21	186.87			3		0.2	
7/6/2009	XX	GW303X379	163		6.1	12	21.6	186.27			1		0.3	
10/28/2009	XX	GW303X3F4	161		6.6	7.8	26.45	181.42			2		0	
4/26/2010	XX	GW303X403	196		6.3	13.3	21.6	186.27	46.8		2		0.8	
7/19/2010	XX	GW303X437	201		5.8	14.8	26.8	181.07			0.8		0.5	
10/18/2010	XX	GW303X46B	175		6.7	10.7	30.9	176.97	46.76		2		1.5	
4/25/2011	XX	GW303X4AC	223		6	10.9	21.1	186.77			1		1	
7/18/2011	XX	GW303X4EA	223		6.2	13.3	24.35	183.52			0.4		1	
10/24/2011	XX	GW303X4I5	222		6.6	10.9	26.4	181.47	46.82		1		3.4	
4/23/2012	XX	GW303X52F	243		6.1	7.1	24.95	182.92			0.8		5.6	
7/24/2012	XX	GW303X57E	1		1	1	1	1	1		1		1	
<b>MW12-303R</b>														
10/23/2012	XX	GW303X5EG	189		7	10.6	27.47		43.32		2		9.3	
<b>MW-304A</b>														
7/29/2004	XX	GW304AHD0	207		7.5	8.5	28.55	188.77			2		5.5	
10/27/2004	XX	GW304A07B	195		7.5	7.9	30.2	187.12	42.28		2		0.5	
5/11/2005	XX	GW304A13C	58		7.3	14.2	23	194.32			4		0	
7/28/2005	XX	GW304A170	76		7.2	13.8	26.95	190.37			4		0	

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
9/19/2005	XX	GW3004A19I	80	7	8.7	26.45	190.87	42.45	403	4	45	0	
5/24/2006	XX	GW3004A1ED	100	7.8	8.2	27.1	190.21		427	4	80	0	
7/25/2006	XX	GW3004A1HA	104	6.8	11	26.95	190.36		311	5	70	2	
9/12/2006	XX	GW3004A203	111	6.9	11.9	27.7	189.61	42.4	370	5	60	0	
5/15/2007	XX	GW3004A23A	110	7.1	7.9	25.8	191.51		324	5	20	1.3	
7/24/2007	XX	GW3004A27E	129	6.8	14.9	29.25	188.06		512	5	45	0.6	
9/11/2007	XX	GW3004A29A	118	7	8.5	30.74	186.57	42.4	468	4	55	0.8	
5/20/2008	XX	GW3004A2DI	90	6.9	8	25.3	192.01		286	5	70	0.5	
7/29/2008	XX	GW3004A2H2	116	6.5	10.6	28.76	188.55		259	4	45	0.6	
10/27/2008	XX	GW3004A2JC	131	6.9	9.2	29.2	188.11	42.26	314	4	40	0.4	
4/13/2009	XX	GW3004A330	122	6.9	8.3	25.62	191.69		359	4	50	0.7	
7/6/2009	XX	GW3004A374	107	6.3	9.9	26.42	190.89		301	5	40	1	
10/27/2009	XX	GW3004A3EJ	122	7.7	8.9	30.08	187.23	42.25	331	3	30	0	
4/26/2010	XX	GW3004A3JI	97	6.5	9.9	26.1	191.21		324	4	40	0.4	
7/19/2010	XX	GW3004A432	122	6.4	11.6	29.9	187.41		190	4	50	0.4	
10/18/2010	XX	GW3004A466	116	7.4	9	32.81	184.5	42.23	250	5	50	9.2	
4/25/2011	XX	GW3004A4A7	100	7	9	24.65	192.66		326	4	45	0.5	
7/18/2011	XX	GW3004A4E5	106	7.1	11.1	28	189.31		329	6	75	0.4	
10/24/2011	XX	GW3004A4ID	125	7.4	9.4	29.65	187.66	42.28	365	4	75	1.3	
4/23/2012	XX	GW3004A52A	122	7	7.8	29.3	188.01		331	4	60	1.6	
7/23/2012	XX	GW3004A579	141	7	11.6	28.85	188.46		331	4	60	1	
10/22/2012	XX	GW3004A5E0	114	7.3	9.2	29.75	187.56	42.28	260	5	45	1.2	
<b>MW-401A</b>													
7/29/2004	XX	GW401A059	116	7.9	9.4	5.95	150.88		287	6	75	1.1	
10/27/2004	XX	GW401A071	132	8.2	9.5	5.28	151.55	111.98	258	6	80	0	
5/10/2005	XX	GW401A132	98	8.3	13.3	0.87	155.96		305	5	75	0	
7/28/2005	XX	GW401A16A	108	8.4	11.6	5.85	150.98		375	4	55	0	
9/21/2005	XX	GW401A196	93	8.5	10.3	5.84	150.99	111.92	256	6	85	0	
5/23/2006	XX	GW401A1E3	109	8.5	7.7	1.95	154.88		243	4	70	1.5	
7/25/2006	XX	GW401A1H0	109	8.2	12.7	3.15	153.68		329	3	80	0	
9/12/2006	XX	GW401A1JD	128	8.2	9.1	5.16	151.67	112.05	229	4	45	0	
5/14/2007	XX	GW401A230	118	8.2	7.3	3.57	153.26		341	4	90	0	
7/24/2007	XX	GW401A274	129	7.9	8.9	6.71	150.12		338	5	75	1.2	
9/11/2007	XX	GW401A29E	130	8.1	9.8	8.23	148.6	111.99	245	5	70	0	
5/20/2008	XX	GW401A2D8	123	8.3	7.8	4.15	152.68		243	6	80	0	
7/28/2008	XX	GW401A2GC	112	7.7	11.1	5.7	151.13		321	6	60	0	
10/27/2008	XX	GW401A2J2	112	7.6	9.1	4.75	152.08	112.02	233	5	80	0	
4/13/2009	XX	GW401A32A	73	7.9	7.3	1.3	155.53		470	3	70	0.4	
7/7/2009	XX	GW401A38E	121	7.7	9.3	1.55	155.28		356	6	75	0	
10/28/2009	XX	GW401A3E9	165	8.1	8.1	4.12	152.71	111.98	516	6	100	0	
4/27/2010	XX	GW401A3J8	122	8.3	8.1	4.45	152.38		456	6	45	0	
7/20/2010	XX	GW401A42C	125	7.9	10.3	7.78	149.05		375	4	70	2	
10/20/2010	XX	GW401A45G	191	7.8	8.1	5.52	151.31	112.1	462	5	50	0	
4/25/2011	XX	GW401A49H	132	7.6	8.6	3	155.23		320	3	115	0	
7/18/2011	XX	GW401A4DF	142	7.5	11.5	6.15	150.68		403	5	140	0	
10/24/2011	XX	GW401A4HA	128	8.2	10.2	3.62	153.21	112.02	309	6	50	0	
4/23/2012	XX	GW401A620	123	8.3	8.6	4.42	152.41		422	5	50	2.4	
7/23/2012	XX	GW401A56J	126	7.8	12.7	6.03	150.8		394	6	100	4.9	
10/22/2012	XX	GW401A5DA	119	7.1	9.9	0.93	155.9	112.02	452	5	75	0.7	

SUMMARY REPORT  
 Field Data

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

(MW-401B)	Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO <sub>3</sub> ) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
MW-401B														
	7/29/2004	XX	GW401B05A	486	6.9	9	7.81	149.51		1	0.6	220	2.2	
	10/27/2004	XX	GW401B072	641	6.7	9	7.5	149.82	23.03	122	0.6	335	0.4	
	5/10/2005	XX	GW401B133	470	7.1	11.5	6.94	150.38		72	2	310	2	
	7/27/2005	XX	GW401B168	533	6.9	10.8	8.85	148.47		5	1	320	1	
	9/21/2005	XX	GW401B189	689	6.7	16.1	7.55	149.77	23.1	408	0.8	235	0.9	
	5/23/2006	XX	GW401B1E4	489	6.7	6.2	6.67	150.65		75	1	235	2.2	
	7/25/2006	XX	GW401B1H1	444	6.4	11.8	6.38	150.94		34	2	200	1.8	
	9/12/2006	XX	GW401B1JE	539	6.6	9.7	6.82	150.5	23.12	42	1	85	0	
	5/14/2007	XX	GW401B231	350	6.8	7.8	6.83	150.49		122	1	210	4.5	
	7/24/2007	XX	GW401B275	451	5.9	8.9	7.14	150.18		100	0.3	180	1.7	
	9/11/2007	XX	GW401B29F	485	6.3	10.4	7.73	149.59	23.12	125	1	180	0	
	5/20/2008	XX	GW401B2D9	340	7	7.4	6.8	150.52		-33	1	160	1.4	
	7/28/2008	XX	GW401B2GD	384	6.2	11.2	6.68	150.64		80	0.4	135	2.3	
	10/27/2008	XX	GW401B2J3	366	6.6	10.2	6.5	150.82	23.1	97	1	120	0	
	4/13/2009	XX	GW401B32B	180	6.7	6.7	6.4	150.92		355	1	80	3.5	
	7/7/2009	XX	GW401B36F	290	6.6	8.9	6.35	150.97		130	1	140	0.5	
	10/28/2009	XX	GW401B3EA	520	6.4	9.2	6.6	150.72	23.2	239	1	85	0	
	4/27/2010	XX	GW401B3J9	237	7.3	7.3	6.7	150.62		266	0.8	100	0	
	7/20/2010	XX	GW401B42D	339	6.6	11	7.55	149.77		141	0.6	180	2.2	
	10/20/2010	XX	GW401B45H	514	6	9.4	6.82	150.5	23.1	241	0.3	100	0	
	4/25/2011	XX	GW401B49I	248	6.5	7.8	6.56	150.76		239	1	225	3.4	
	7/18/2011	XX	GW401B4DG	313	6.3	11.1	7.33	149.99		183	1	275	0	
	10/24/2011	XX	GW401B4HB	319	6.6	11.1	6.63	150.69	23.12	152	1	115	0	
	4/23/2012	XX	GW401B521	235	7.5	7.5	6.63	150.69		338	5	60	2.2	
	7/23/2012	XX	GW401B570	276	6.9	11.9	6.4	149.92		181	0.3	140	2.8	
	10/22/2012	XX	GW401B5DB	310	6.7	11.1	6.35	150.97	23.13	227	0.4	110	1.2	
MW-402A														
	7/29/2004	XX	GW402A05B	115	8.7	13	F1			210	6	65	3.7	
	10/27/2004	XX	GW402A073	149	7.4	7	0.05	152.15	108.21	215	4	70	0	
	5/11/2005	XX	GW402A134	113	7.5	10.7	0	152.2		283	4	50	0.2	
	8/1/2005	XX	GW402A16C	104	7.6	12.1	F1			231	5	50	0.1	
	9/21/2005	XX	GW402A19A	110	7.4	11.2	F1		108.19	219	4	40	0	
	5/23/2006	XX	GW402A1E5	106	8.7	9.6	F1			291	4	55	0	
	7/26/2006	XX	GW402A1H2	121	8.3	14.4	F1			451	4	70	0.7	
	9/12/2006	XX	GW402A1JF	130	8.1	12.1	F1		108.35	412	6	75	0	
	5/15/2007	XX	GW402A232	132	9.5	8.8	F1			106	5	35	0	
	7/25/2007	XX	GW402A276	130	8.7	12.3	F1			223	5	55	0	
	9/12/2007	XX	GW402A29G	126	8.4	12.9	F1		108.25	285	6	55	0.6	
	5/20/2008	XX	GW402A2DA	122	8.4	8.8	F1			345	6	75	0	
	7/28/2008	XX	GW402A2GE	124	8.6	14.4	0	152.2		187	3	55	0.1	
	10/27/2008	XX	GW402A2J4	111	8.1	10.6	F1		108.3	199	4	30	0	
	4/14/2009	XX	GW402A32C	129	7.6	5.2	F1			425	5	40	0	
	7/8/2009	XX	GW402A36G	125	8.4	9.9	F1			429	4	60	0	
	10/28/2009	XX	GW402A3EB	183	8.9	7.6	F1		108.45	413	5	35	0	
	4/27/2010	XX	GW402A3JA	120	8.5	9.9	F1			336	6	45	0	
	7/21/2010	XX	GW402A42E	123	7.8	14.7	F1			256	4	70	2.2	
	10/20/2010	XX	GW402A45I	197	7.3	8.8	F1		108.35	390	5	35	0	

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

SUMMARY REPORT  
Field Data

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
4/27/2011	XX	GW402A48J	130	7.8	8	F1			287	3	135	0	
7/20/2011	XX	GW402A4DH	114	7.8	14.7	F1			361	3	50	0.9	
10/26/2011	XX	GW402A4HC	130	7.8	7.6	F1	108.35		215	5	50	0	
4/24/2012	XX	GW402A522	121	7.5	9.3	F1			353	4	60	0.7	
7/25/2012	XX	GW402A571	125	8.4	13.4	F1			392	4	70	1.9	
10/24/2012	XX	GW402A5DC	116	7.4	7.9	F1	108.35		405	4	60	0.8	
<b>MW-402B</b>													
7/29/2004	XX	GW402B06C	143	8.8	13.8	2.99	149.75		229	1	100	1.9	
10/27/2004	XX	GW402B074	172	8.5	8.2	2.65	150.09	25.12	203	1	95	1.4	
5/11/2005	XX	GW402B135	118	8.3	12.3	2.18	150.56		248	2	65	0	
8/1/2005	XX	GW402B16D	151	7	10.8	3.12	149.62		255	2	65	1.4	
9/21/2005	XX	GW402B18B	141	7.3	12.8	3.07	149.67	25.15	200	1	70	0	
5/23/2006	XX	GW402B1E6	145	8.7	8.4	2.88	149.86		46	1	90	0	
7/26/2006	XX	GW402B1H3	145	8.5	9.5	3.24	149.5		293	1	100	0	
9/12/2006	XX	GW402B1JG	165	8.6	11.3	3.8	148.94	25.2	306	0.3	65	0	
5/15/2007	XX	GW402B233	151	9.1	6.9	3.05	149.69		81	1	50	0	
7/25/2007	XX	GW402B277	163	9	9.6	4.22	148.52		106	1	45	0	
9/20/2007	XX	GW402B29H	160	8.6	11.4	5.3	147.44	25.18	198	1	75	0	
5/20/2008	XX	GW402B2DB	157	8.6	8.2	3.3	149.44		11	1	75	0	
7/28/2008	XX	GW402B2GF	148	8.7	12.5	3.6	149.14		143	0.3	70	0	
10/27/2008	XX	GW402B2J5	142	8.1	10.1	3	149.74	25.18	112	1	40	0	
4/14/2009	XX	GW402B32D	96	8.1	5.4	2.9	149.84		317	1	45	0	
7/8/2009	XX	GW402B36H	154	8.4	9.6	2.9	149.84		274	0.4	70	0	
10/28/2009	XX	GW402B3EC	215	8.9	8.7	2.98	149.76	25.2	416	1	35	0	
4/27/2010	XX	GW402B3JB	150	8.7	7.7	3	149.74		154	0.6	75	0	
7/21/2010	XX	GW402B42F	154	8	12.5	5.11	147.63		153	0.3	70	2.8	
10/20/2010	XX	GW402B45J	246	7.2	9.5	3.4	149.34	25.18	323	0.4	60	0	
4/27/2011	XX	GW402B4A0	164	8.1	7.1	2.72	150.02		226	1	135	0	
7/20/2011	XX	GW402B4D1	141	8.1	11.7	4.55	148.19		223	1	63	3.5	
10/26/2011	XX	GW402B4HD	160	7.9	8	2.95	149.79	25.18	107	1	100	0	
4/24/2012	XX	GW402B523	149	8.4	7.1	2.65	150.09		264	0.2	75	0.8	
7/25/2012	XX	GW402B572	157	8.5	10.8	4.62	148.12		279	0.3	90	2.2	
10/24/2012	XX	GW402B5DD	141	7.6	8.9	2.9	149.84	25.2	323	0.4	50	3.2	
<b>P-04-02</b>													
2/5/2004	XX	GWXXXX03E	414	8.5	4.8	23.42	145.32			6		80.6	
2/11/2004	XX	GWXXXX03C	247	7.7	4.6	27.17	141.57			3		5.3	
5/5/2004	XX	GWXXXX00E	305	6.2	9.6	8.23	160.51		350	2	110	1.3	
7/26/2004	XX	GWXXXX042	202	8.3	13.1	8.78	159.96		215	2	100	0	
10/25/2004	XX	GWXXXX071	288	7.9	6.6	8.9	159.84	37.14	230	1	135	0.5	
5/9/2005	XX	GWXXXX13J	243	7.1	9.2	7.02	161.72		273	1	135	0.5	
7/27/2005	XX	GWXXXX177	166	7.4	17.1	9.11	159.63		295	1	105	0.9	
9/22/2005	XX	GWXXXX1A5	250	7	11.8	9.16	159.58	27.9	270	1	110	0	
5/22/2006	XX	GWXXXX1F0	205	7.4	12.2	7.8	160.94		181	2	135	0.5	
7/24/2006	XX	GWXXXX1HH	208	7.3	17.2	8.55	160.19		270	1	125	0	
9/11/2006	XX	GWXXXX20A	237	7.5	15.8	8.38	160.36	37.18	230	3	75	1.4	
5/14/2007	XX	GWXXXX23H	233	7.4	11.9	8	160.74		367	2	95	1	
7/23/2007	XX	GWXXXX281	183	7.6	16.1	9.25	159.49		247	2	105	8	
9/10/2007	XX	GWXXXX2AB	222	7.8	13.8	9.8	158.94	37.2	270	1	95	0.7	

SUMMARY REPORT  
Field Data

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO <sub>3</sub> ) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
5/21/2008	XX	GWXXXX2E5	215	7.7	10.8	7.98	160.76		301	3	110	0.05	
7/30/2008	XX	GWXXXX2H9	213	7.6	15.3	9.63	159.11		166	3	80	0	
10/29/2008	XX	GWXXXX2J	197	8	9.3	8.73	160.01	37.2		1	75	0	
4/13/2009	XX	GWXXXX337	198	8	8.9	8.25	160.49		461	5	105	0	
7/16/2009	XX	GWXXXX37B	215	7.1	16.4	7.95	160.79		279	4	115	0	
10/27/2009	XX	GWXXXX3F6	242	7.9	10.9	7.55	161.19	37.2	393	1	60	0	
4/26/2010	XX	GWXXXX405	222	7.1	12.9	7.81	160.93		303	4	50	0.6	
7/21/2010	XX	GWXXXX439	213	7.4	16.2	8.25	160.49		322	3	115	2.5	
10/20/2010	XX	GWXXXX46D	214	7.9	10.3	8.5	160.24	37.15	282	1	55	0	
4/27/2011	XX	GWXXXX4AE	227	7.8	10.8	7.28	161.46		483	5	175	0.4	
7/20/2011	XX	GWXXXX4EC	201	7.4	18.8	7.81	160.93		381	3	75	0	
10/26/2011	XX	GWXXXX4I7											
4/25/2012	XX	GWXXXX52H	193	6.3	10.7	10.55	158.19		263	1	100	64.4	
7/25/2012	XX	GWXXXX57G	283	7.3	4.9	11.56	157.18		346	1	85	19.1	
10/24/2012	XX	GWXXXX5E7	245	6.8	13.3	6.65	162.09	39.98	340	1	60	16.2	

P-04-04

2/5/2004	XX	GWXXXX03F	405	8	5.2	23.52	145.83			5		162	
2/11/2004	XX	GWXXXX03D	237	8	3.4	29.17	140.18			6		4.2	
5/6/2004	XX	GWXXXX00F	287	6.2	11.3	8.86	160.49		347	3	115	2	
7/26/2004	XX	GWXXXX043	190	7.9	13.2	9.38	159.97		356	2	105	0.3	
10/25/2004	XX	GWXXXX07J	249	7.6	10.5	9.35	160	32.23	280	1	105	0	
5/9/2005	XX	GWXXXX140	179	7.3	9.2	7.5	161.85		283	3	110	0	
7/27/2005	XX	GWXXXX178	174	8.2	17.7	9.71	159.64		291	3	115	1.1	
9/22/2005	XX	GWXXXX1A6	174	7	12.6	9.6	159.75	32.32	290	1	50	0	
5/22/2006	XX	GWXXXX1F1	161	7.4	13.9	8.28	161.07		189	3	120	1.5	
7/24/2006	XX	GWXXXX1HI	191	7.9	15.3	8.88	160.47		202	2	130	0	
9/11/2006	XX	GWXXXX20B	201	7.2	16.5	8.85	160.5	32.35	151	4	60	1.6	
5/14/2007	XX	GWXXXX23I	182	7.9	12.1	8.47	160.88		415	4	65	0.6	
7/23/2007	XX	GWXXXX282	148	7.7	16.4	9.52	159.83		250	5	100	7.6	
9/10/2007	XX	GWXXXX2AC	178	7.8	14.1	10.03	159.32	32.33	275	6	75	0.2	
5/21/2008	XX	GWXXXX2E6	173	7.5	9.8	8.41	160.94		274	4	105	0	
7/30/2008	XX	GWXXXX2HA	162	7.9	15	9.34	160.01		337	4	55	0.2	
10/29/2008	XX	GWXXXX300	159	8	9.7	9.1	160.25	32.3	171	2	50	0.2	
4/13/2009	XX	GWXXXX338	178	7.9	9	8.8	160.55		484	5	40	0.2	
7/16/2009	XX	GWXXXX37C	175	7.6	19.5	8.4	160.95		239	6	80	0.6	
10/27/2009	XX	GWXXXX3F7	175	8	10.4	7.96	161.39	32.21	376	2	45	0	
4/26/2010	XX	GWXXXX406	177	7.5	12.3	8.45	160.9		325	4	60	0.6	
7/21/2010	XX	GWXXXX43A	177	7.5	16.3	8.9	160.45		288	4	95	2	
10/20/2010	XX	GWXXXX46E	177	7.9	10.5	9	160.35	32.25	238	2	50	0	
4/27/2011	XX	GWXXXX4AF	188	7.8	9.8	7.82	161.53		520	6	150	0	
7/20/2011	XX	GWXXXX4ED	166	7.6	18.7	8.44	160.91		362	3	75	0	
10/26/2011	XX	GWXXXX4I8	181	8.4	11.2	9.3	160.05	32.3	185	1	60	1.6	
4/25/2012	XX	GWXXXX52I	185	7.1	11.9	9.62	159.73		290	3	100	2.9	
7/25/2012	XX	GWXXXX57H	177	7.7	18.7	10.05	159.3		396	4	100	2.7	
10/24/2012	XX	GWXXXX5E8	158	7.4	16.1	8.9	160.45	32.33	388	3	50	3	

PWS10-1

4/26/2010	XX	GWPWS13U	223	6.1	11.7				23	1	70	8.8	
7/19/2010	XX	GWPWS1423	314	6.1	19.9				192	3	25	7.6	

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

<b>(PWS10-1)</b>		Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
Date	Type	Sample ID										
10/18/2010	XX	GW PWS1457	6.5	8.8				232	5	10	2.7	
4/25/2011	XX	GW PWS1488	6.4	8.3				134	1	170	3	
7/18/2011	XX	GW PWS14D6	5.9	19.7				142	1	200	20	
10/24/2011	XX	GW PWS14H1	5.8	11.4				106	1	70	2.5	
4/23/2012	XX	GW PWS151B	6	9.9				127	1	55	2.1	
7/23/2012	XX	GW PWS156A	6	23.5				213	2	50	14	
10/22/2012	XX	GW PWS15D1	5.8	11.6				228	0.3	35	3.7	
<b>PWS10-2</b>												
4/26/2010	XX	GW PWS23J0	6	9.3				102	4	20	2.3	
7/19/2010	XX	GW PWS2424	5.6	21.1				-5	1	45	3.4	
10/18/2010	XX	GW PWS2458	6.6	8.7				302	1	20	5.5	
4/25/2011	XX	GW PWS2499	5.6	9.4				67	5	40	2.1	
7/18/2011	XX	GW PWS24D7	5.8	24.6				248	1	135	4.4	
10/24/2011	XX	GW PWS24H2	5.6	10.6				145	4	30	2.5	
4/23/2012	XX	GW PWS251C	5.7	6.4				104	1	35	3.2	
7/23/2012	XX	GW PWS256B	6.3	26.7				293	8	50	6.5	
10/22/2012	XX	GW PWS25D2	6	12.3				278	5	15	1.6	
<b>PWS10-3</b>												
4/26/2010	XX	GW PWS33J1	7	11.8				39	2	80	6.3	
7/19/2010	XX	GW PWS3425	5.5	17.9				79	2	105	7.1	
10/18/2010	XX	GW PWS3459	6.2	7.8				400	4	20	4.1	
4/25/2011	XX	GW PWS349A	5.9	9				118	1	145	3.5	
7/18/2011	XX	GW PWS34D8	5.8	23.1				203	3	125	18.3	
10/24/2011	XX	GW PWS34H3	5.3	11.1				164	1	35	4.5	
4/23/2012	XX	GW PWS351D	6.5	20.7				307	3	50	4.2	
7/23/2012	XX	GW PWS356C	7.3	26.8				155	4	25	6.6	
10/22/2012	XX	GW PWS35D3	5.4	11.9				284	0.8	15	4.3	
<b>SW-1</b>												
11/13/1990	XX	SW-1XX33180	6.4	3								
2/19/1991	XX	SW-1XX33288	F	F					F			
6/4/1991	XX	SW-1XX33393	7.0	16.1					7.4			
9/16/1991	XX	SW-1XX33497	9.0	10.6					4.2			
12/18/1991	XX	SW-1XX33590	5.0	7.5					5.4			
3/2/1992	XX	SW-1XX33665	F	F					F			
6/23/1992	XX	SW-1XX33778	9.0	7.9					3.1			
8/17/1992	XX	SW-1XX33833	12.0	8.1					2.1			
1/26/1993	XX	SW-1XX33995	10.0	7.4					12.8			
4/27/1993	XX	SW-1XX34086	5.0	6					10			
7/2/1993	XX	SW-1XX34171	10	7.4					2			
10/12/1993	XX	SW-1XX34254	5.0	7.9					10.2			
1/11/1994	XX	SW-1XX34345	8.0	7.7					13.2			
5/26/1994	XX	SW-1XX34480	5.0	7.5					5.5			
8/8/1994	XX	SW-1XX34554	6.0	6.3					3.7			
11/15/1994	XX	SW-1XX34653	5.0	6.8					6			
2/7/1995	XX	SW-1XX34737	F	F					F			
5/23/1995	XX	SW-1XX34842	24.0	7.8					1.4			
8/15/1995	XX	SW-1XX34926	9.0	6.5					2			
11/30/1995	XX	SW-1XX35033	3.0	7.5					3			

SUMMARY REPORT  
 Field Data

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance	pH	Temperature	Water Level	Water Level	Well Depth	Corrected Eh	Dissolved Oxygen	Alkalinity (CaCO3)	Turbidity (field)	Flow Rate
			µmhos/cm @25°C	Standard Units	Degrees Celsius	Depth Feet	Elevation Feet	Feet	mV	mg/L	mg/L	NTU	cfs
2/27/1996	XX	SW-1XX35122	20	7.2	0.1					1			
5/21/1996	XX	SW-1XX35206	20	5.9	13.7					4			
11/25/1996	XX	SW-1XX35394	40	6.7	1.3					3.5		1.8	
3/26/1997	XX	SW-1818-35515	F	F	F					F		F	
6/4/1997	XX	SW-1817-35585	92	6.19	11.5					58.2		20	
9/11/1997	XX	SW-1818-35684	91	6.57	14.2					52.7		0	
12/8/1997	XX	SW-1819-35772	68	6.16	0.2					62.8		1	
3/25/1998	XX	SW-1820-35879	63	6.62	0.9					55		0	
6/9/1998	XX	SW-1821-35955	94	6.7	14.4					131.8		0	
9/10/1998	XX	SW-1822-36048	118	6.82	13.2					230.9		0	
12/15/1998	XX	SW-1823-36144	100	7.33	0.5					212.7		0	
3/20/1999	XX	SW-1824-36249	53	6.85	6.1					262.3		0	
6/9/1999	XX	SW-1825-36320	72	6.5	16.4					210.7		0	
9/15/1999	XX	SW-1826-36418	90	6.53	17.4					180.4		0	
12/2/1999	XX	SW-1827-36496	110	6.96	2					267.5		0	
3/28/2000	XX	SW-1828-36613	49	7.19	2.7					8.2		3	
6/13/2000	XX	SW-1829-36690	91	6.74	13					1		15	
9/13/2000	XX	SW-1830-36782	100	6.92	18.7					3		175	
6/19/2001	XX	SW-1831-37061	106	6.67	20.2					2.6		0	
9/11/2001	XX	SW-1832-37145	110	6.7	17.7					2.1		0	
12/12/2001	XX	SW-1833-37237	100	6.77	0.1					8.6		0	
3/14/2002	XX	SW-1834-37329	64	7.49	1.5					7		0	
6/18/2002	XX	SW-1835-37425	80	7.29	14.4					2.6		0	
9/19/2002	XX	SW-1836-37518	98	7.28	12.1					2.7		0	
6/26/2003	XX	SW-1837-37598	149	6.69	25					0.6			
9/18/2003	XX	SW-1837-37682	136	6.9	14					0.8			
5/3/2004	XX	SWXX1X018	91	6.3	18					364		0.7	
7/27/2004	XX	SWXX1X04E	80	5.8	16.4					261		3.4	
10/26/2004	XX	SWXX1X069	72	6	8					278		0.9	
5/10/2005	XX	SWXX1X12A	57	6.7	25					442		1.4	
7/28/2005	XX	SWXX1X15I	62	6.1	22.9					267		20.1	
9/20/2005	XX	SWXX1X18G	106	8	16.9					6		9.2	
5/24/2006	XX	SWXX1X1DB	181	6.5	14.6					430		3.8	
7/26/2006	XX	SWXX1X1G8	120	6	26.3					228		1.8	
9/13/2006	XX	SWXX1X1J1	345	6.6	17.6					244		2.4	
5/15/2007	XX	SWXX1X228	84	5.9	10.9					273		1.6	
7/24/2007	XX	SWXX1X28C	101	6.7	25.1					366		3.1	
9/11/2007	XX	SWXX1X292	101	6.7	15.9					275		2.9	
5/21/2008	XX	SWXX1X2C6	96	6.9	13.7					279		1.3	
7/29/2008	XX	SWXX1X2G0	1	1	1					1		1	
10/28/2008	XX	SWXX1X2IA	68	7.7	11.2					207		4.7	
4/14/2009	XX	SWXX1X311	109	7	7.7					475		3.6	
7/7/2009	XX	SWXX1X382	59	6.7	16.9					383		0.8	
10/27/2009	XX	SWXX1X3DH	86	6.5	5.6					5		30	
4/28/2010	XX	SWXX1X3IG	186	6.2	7.9					336		1	
7/20/2010	XX	SWXX1X420	293	6.3	21.3					404		1.7	
10/19/2010	XX	SWXX1X454	142	7.3	6.2					100		15.5	
4/26/2011	XX	SWXX1X485	76	5.9	10.9					450		3.2	
7/19/2011	XX	SWXX1X4D3	235	6.4	21.9					404		1.4	
10/25/2011	XX	SWXX1X4G1	78	7.5	11.6					273		0.4	
										234		0.6	

SUMMARY REPORT  
Field Data

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
4/24/2012	XX	SWXX1X518	78	6.7	11.6				549	6	35	2	
7/24/2012	XX	SWXX1X567	108	6.9	22.1				299	5	60	9.6	
10/23/2012	XX	SWXX1X5C1	98	7.2	10.1				475	5	50	1.6	
<b>SW-2</b>													
11/13/1990	XX	SW-2XX33190	30	8.4	3								
2/20/1991	XX	SW-2XX33289	90	6.5	3					0.4			
6/4/1991	XX	SW-2XX33393	60	7						8			
9/17/1991	XX	SW-2XX33498	150	7.5	17.8					4.7			
12/18/1991	XX	SW-2XX33590	40	7.7	1					2.8			
3/2/1992	XX	SW-2XX33665	100	6.8	1					1			
6/23/1992	XX	SW-2XX33778	100	8.1	24					3.6			
8/17/1992	XX	SW-2XX33833	100	8	21					2.2			
1/26/1993	XX	SW-2XX33965	90	7.6	1					13.7			
4/27/1993	XX	SW-2XX34086	60	7.4	9.5					5			
7/21/1993	XX	SW-2XX34171	80	7	25.6					6			
10/13/1993	XX	SW-2XX34255	50	7.7	10.1					10.4			
1/11/1994	XX	SW-2XX34345	90	6.7	0					12.4			
5/26/1994	XX	SW-2XX34480	70	6.9	12.5					2			
8/8/1994	XX	SW-2XX34554	70	6.4	24					2.8			
11/16/1994	XX	SW-2XX34654	50	6.3	4.5					2			
2/7/1995	XX	SW-2XX34737	20	5.7	0					2.8			
5/24/1995	XX	SW-2XX34843	60	6.1	12.4					3.2			
8/16/1995	XX	SW-2XX34927	60	6.4	19					7			
11/30/1995	XX	SW-2XX35033	20	7.3	4.4					5			
2/27/1996	XX	SW-2XX35122	20	6.1	0.7					1.5			
5/21/1996	XX	SW-2XX35206	10	5.7	15.4					4			
11/25/1996	XX	SW-2XX35394	40	6.5	1.6					1.5		0.9	
3/26/1997	XX	SW-2816-35515	85	5.57	0.2				69.2	1.5		0	
6/4/1997	XX	SW-2816-35585	87	6.11	15				96	2.3		0	
9/11/1997	XX	SW-2820-35684	78	6.12	15.7				88.8			2	
12/8/1997	XX	SW-2821-35772	70	5.42	0.2				90	3.2		2	
3/25/1998	XX	SW-2822-35879	61	6.18	0.8				122.8	2.7		0	
6/9/1998	XX	SW-2823-35955	84	6.22	18.2				297.5	2.7		0	
9/10/1998	XX	SW-2824-36048	124	6.08	14.5				109.8	2.6		0	
12/15/1998	XX	SW-2825-36144	81	6.4	3.8				274.1	4.7		0	
3/30/1999	XX	SW-2826-36249	43	6.12	2.4				198.9	2		0	
6/9/1999	XX	SW-2827-36320	73	6.01	16				138.5	1.5		10	
9/15/1999	XX	SW-2828-36418	86	6.28	18.5				258	2.9		0	
12/2/1999	XX	SW-2829-36496	69	6.57	3.5					3.6		2	
3/28/2000	XX	SW-2830-36613	37	6.08	2.4					2		0	
6/13/2000	XX	SW-2831-36690	75	6.41	15.3					3.5		0	
9/13/2000	XX	SW-2832-36782	92	6.37	20.2					10.1		0	
12/12/2000	XX	SW-2833-36872	30	6.32	1.9					1.3		0	
6/19/2001	XX	SW-2834-37061	79	6.6	21.9					2.1		0	
9/11/2001	XX	SW-2835-37145	72	6.15	23.5					4.6		0	
12/12/2001	XX	SW-2836-37237	61	6.66	1.2					2.8		7	
3/14/2002	XX	SW-2837-37329	53	7.6	2.3					3.3		0	
6/18/2002	XX	SW-2838-37425	67	6.51	15.2					1.4		0	
9/19/2002	XX	SW-2839-37518	109	6.2	15.3							0	

**SUMMARY REPORT**  
Field Data

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
12/10/2002	XX	SW-2840-37600	101	6.03	2.6					2.3		0	
3/26/2003	XX	SW-2N37706	88	6.07	0.4					1.5			
6/26/2003	XX	SW-2N37798	98	6.15	21.5					0.7			
9/18/2003	XX	SW-2N37882	133	6.44	18.8					3.4			
5/3/2004	XX	SWX2X019	85	6.1	16.4				366	6	25	1.8	
7/27/2004	XX	SWX2X04F	87	5.7	20.5				311	5	25	0.8	
10/26/2004	XX	SWX2X06A	83	5.9	7.6				355	5	25	0.4	
5/10/2005	XX	SWX2X12B	66	6.4	15.7				364	6	30	0.9	
7/28/2005	XX	SWX2X15J	49	6.3	22.1				210	6	25	1.5	2.82
9/20/2005	XX	SWX2X18H	64	7	16.6				267	5	30	2.4	3.4
5/24/2006	XX	SWX2X1DC	65	6.4	13				284	6	25	2.8	2
7/26/2006	XX	SWX2X1G9	66	6	25.3				240	3	30	0.6	1.3
9/13/2006	XX	SWX2X1L2	80	6.4	16.3				304	4	25	1.8	1
5/15/2007	XX	SWX2X229	74	6.1	11.7				310	4	30	1.1	0.5
7/24/2007	XX	SWX2X28D	101	6.3	26.3				260	6	45	3.5	2.5
9/11/2007	XX	SWX2X283	99	6.6	16.8				203	5	40	2.4	0.6
5/21/2008	XX	SWX2X2CH	83	6.7	13.3				282	6	45	2.7	3
7/29/2008	XX	SWX2X2G1	81	6.8	27.7				340	4	20	0.7	1
10/28/2008	XX	SWX2X2IB	54	7.4	14.4				432	6	50	2.6	3.5
4/14/2009	XX	SWX2X3J	62	6.7	6.8				516	3	35	3.2	1.9
7/7/2009	XX	SWX2X363	62	7.1	16.2				453	5	25	2.6	6.5
10/27/2009	XX	SWX2X3DI	122	5.8	6.9				445	5	15	3.6	3
4/28/2010	XX	SWX2X3IH	78	6.2	7.6				422	2	20	1.1	1.8
7/20/2010	XX	SWX2X421	83	7.1	28.2				288	8	25	3.7	0.5
10/19/2010	XX	SWX2X465	130	7.2	9.5				444	6	20	3.2	2
4/26/2011	XX	SWX2X486	71	5.9	12.3				367	5	30	1.2	2.5
7/19/2011	XX	SWX2X4D4	46	7.1	29.6				332	6	38	0	0.1
10/25/2011	XX	SWX2X4GJ	72	7.6	11.7				337	5	25	1.2	1.5
4/24/2012	XX	SWX2X519	87	6.9	10.6				454	5	30	2.4	14
7/24/2012	XX	SWX2X568	65	6.9	25.9				449	6	25	3.1	1.75
10/23/2012	XX	SWX2X5CJ	54	7.2	12.2				472	5	15	1.7	2.75
<b>SW-3</b>													
5/26/1994	XX	SW-3XX34480	80	7.1	12.7					5.5			
8/8/1994	XX	SW-3XX34654	70	5.7	21					8.5			
11/15/1994	XX	SW-3XX34653	40	6.2	6.2					7			
2/7/1995	XX	SW-3XX34737	60	6.9	0					4.1			
5/24/1995	XX	SW-3XX34843	62	5.7	12.8					4.5			
8/16/1995	XX	SW-3XX34927	60	6.6	19.2					2			
11/30/1995	XX	SW-3XX35033	30	6.9	0.3					1			
2/27/1996	XX	SW-3XX35122	130	5.8	0.1					3			
5/21/1996	XX	SW-3XX35206	20	6.2	14.3					4.5			
11/25/1996	XX	SW-3XX35394	40	5.4	1.1					2.5		3.7	
3/26/1997	XX	SW-381P-35515	F	F	F					F		F	
6/4/1997	XX	SW-3820-35585	69	6.45	13.6					2.5		0	
9/11/1997	XX	SW-3821-35684	72	6.6	15.7					23.8		0	
12/8/1997	XX	SW-3822-35772	60	5.73	0.1					106.4		4	
3/26/1998	XX	SW-3823-35880	59	6.29	0.8					108.5		0	
6/9/1998	XX	SW-3824-35955	76	6.79	16.7					8		0	
9/10/1998	XX	SW-3825-36048	101	6.83	13.7					317.3		0	

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

SUMMARY REPORT  
Field Data

REPORT PREPARED: 1/17/2013 13:56  
FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Specific Conductance	pH	Temperature	Water Level Depth	Water Level Elevation	Well Depth	Corrected Eh	Dissolved Oxygen	Alkalinity (CaCO3) (field)	Turbidity (field)	Flow Rate
			µmhos/cm @25°C	Standard Units	Degrees Celsius	Feet	Feet	mV	mg/L	NTU	cf5		
12/15/1998	XX	SW-3826-36144	89	6.09	1.6				196.6	12.1		0	
3/30/1999	XX	SW-3827-36249	40	6.29	4.4				257.7	12		0	
6/9/1999	XX	SW-3828-36320	60	6.42	19.8				192.3	6.4		0	
9/15/1999	XX	SW-3829-36418	73	6.92	17.1				92.7	6.2		0	
12/2/1999	XX	SW-3830-36496	62	6.99	2.3				249	8.1		0	
3/28/2000	XX	SW-3831-36613	151	5.99	2.2					11		16	
6/13/2000	XX	SW-3832-36690	59	6.65	15.6					7.7		0	
9/13/2000	XX	SW-3833-36782	87	6.69	17.9					4.8		0	
6/19/2001	XX	SW-3834-37061	103	6.98	18.3					5		0	
9/11/2001	XX	SW-3835-37145	87	6.58	21.8					2.1		0	
12/12/2001	XX	SW-3836-37237	94	8.2	1.2					9.7		0	
3/14/2002	XX	SW-3837-37329	55	5.96	2.7					11			
6/18/2002	XX	SW-3838-37425	70	6.35	14.8					5.4		0	
9/19/2002	XX	SW-3839-37518	104	6.82	12.3					4.8		0	
12/10/2002	XX	SW-3840-37600	141	6.33	1					5.9		0	
6/26/2003	XX	SW-3N37798	91	6.55	23.8					4			
9/18/2003	XX	SW-3N37882	102	6.88	13.4					4.2			
5/3/2004	XX	SWXX3X01A	68	5.5	16.8				360	6	25	3.8	
7/27/2004	XX	SWXX3X04G	104	6.3	18.1				364	3	45	5.3	
10/26/2004	XX	SWXX3X06B	73	6.5	7.9				290	4	35	2.1	
5/10/2005	XX	SWXX3X12C	149	6.5	14.7				363	4	15	1	5.42
7/28/2005	XX	SWXX3X160	66	6.3	21.2				318	4	15	2.1	2.35
9/20/2005	XX	SWXX3X181	74	6.9	17.3				316	5	35	4	5.4
5/24/2006	XX	SWXX3X1DD	73	6.4	14.4				271	6	25	2	6
7/26/2006	XX	SWXX3X1GA	65	6.4	23.9				237	6	40	0.4	6.1
9/13/2006	XX	SWXX3X1J3	88	6.8	13.9				354	6	25	1.4	
5/15/2007	XX	SWXX3X22A	68	6.4	12.2				300	4	25	1.8	5.76
7/24/2007	XX	SWXX3X28E	84	6.7	21.4				259	5	40	2.1	5.08
9/11/2007	XX	SWXX3X284	98	6.9	16				258	5	45	1.8	4.67
5/21/2008	XX	SWXX3X2C1	84	6.9	12.3				346	6	30	2.3	5
7/29/2008	XX	SWXX3X262	103	7	27.4				260	4	45	3.1	5
10/28/2008	XX	SWXX3X2IC	63	7.3	12.9				452	4	20	2.6	7
4/14/2009	XX	SWXX3X320	71	6.5	3.8				495	6	20	1.6	12
7/17/2009	XX	SWXX3X364	58	6.6	16				421	4	30	2.6	8
10/27/2009	XX	SWXX3X3DJ	82	6.1	4.7				461	5	20	1.7	10
4/28/2010	XX	SWXX3X3II	81	6.8	8.9				368	2	20	1.7	9
7/20/2010	XX	SWXX3X422	110	7	22.3				287	4	60	9.6	3.5
10/19/2010	XX	SWXX3X456	137	7.5	6.2				437	6	15	0.6	8
4/26/2011	XX	SWXX3X497	73	6.3	11.2				438	6	35	1.6	8
7/19/2011	XX	SWXX3X4D5	93	6.8	23.3				338	5	38	0	2.5
10/25/2011	XX	SWXX3X4H0	78	6.6	10.5				257	5	25	1.2	7.5
4/24/2012	XX	SWXX3X51A	54	7.4	9.8				449	6	25	2.4	19
7/24/2012	XX	SWXX3X568	103	7.5	22.9				326	4	100	2.5	3.75
10/23/2012	XX	SWXX3X5D0	46	7.4	11.5				422	6	50	2.1	5

SW-DPI

5/3/2004	XX	SWDP1X01H	358	7.6	18.1				343	8	125	2.1	8
7/27/2004	XX	SWDP1X053	400	8.2	20.5				275	8	175	14	
10/26/2004	XX	SWDP1X08H	232	8.2	10.4				276	0.8	150	0.8	
5/10/2005	XX	SWDP1X121	118	6.9	19				350	5	65	15	

**SUMMARY REPORT**  
**Field Data**

REPORT PREPARED: 1/17/2013 13:56  
 FOR: Juniper Ridge Landfill

(SW-DPI)		Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Water Level Depth Feet	Water Level Elevation Feet	Well Depth Feet	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO <sub>3</sub> ) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
Date	Type	Sample ID										
7/28/2005	XX	SWDP1X166	6.4	26.9				282	6	80	28.1	
9/20/2005	XX	SWDP1X194	7.1	16				296	5	30	15.2	
5/24/2006	XX	SWDP1X1DJ	7	14.9				402	6	50	3.2	
7/26/2006	XX	SWDP1X1GG	8.5	31.1				308	5	40	0.6	
9/13/2006	XX	SWDP1X1J9	7	18.7				258	6	70	2.4	
5/15/2007	XX	SWDP1X22G	7.3	14.8				264	6	85	3.1	
7/24/2007	XX	SWDP1X270	142	8.9				281	6	40	1.6	
9/11/2007	XX	SWDP1X29A	9.1	18.4				211	6	40	0.2	
5/21/2008	XX	SWDP1X2D4	8.2	15.4				277	6	75	1.6	
7/29/2008	XX	SWDP1X2G8	9.4	26.5				261	5	30	2.5	
10/28/2008	XX	SWDP1X2II	152	7.4				285	6	50	3.6	
4/14/2009	XX	SWDP1X326	8.6	13.7				442	6	70	16.5	
7/7/2009	XX	SWDP1X36A	111	6.7				368	6	50	1.7	
10/27/2009	XX	SWDP1X3E5	6.3	7.8				319	5	25	0.8	
4/28/2010	XX	SWDP1X3J4	201	6.6				335	5	55	3.1	
7/20/2010	XX	SWDP1X428	8.2	26.5				200	5	25	3.9	
10/19/2010	XX	SWDP1X45C	197	7.3				419	6	35	0.5	
4/26/2011	XX	SWDP1X49D	139	6.6				374	6	80	3.6	
7/19/2011	XX	SWDP1X4DB	154	7.6				328	5	63	0	
10/25/2011	XX	SWDP1X4H6	117	7.7				324	6	35	0	
4/24/2012	XX	SWDP1X51G	107	6.9				466	6	75	6.8	
7/24/2012	XX	SWDP1X56F	167	7.4				395	6	80	7.5	
10/23/2012	XX	SWDP1X5D6	66	7.2				477	6	25	2.1	
<b>SW-DP6</b>												
10/27/2009	XX	SWDP6X3G6	148	6.3				385	5	15	3.7	
4/28/2010	XX	SWDP6X3J5	271	6.5				369	6	50	4.2	
7/20/2010	XX	SWDP6X429	260	7				280	5	90	7.9	
10/19/2010	XX	SWDP6X45D	297	7.4				396	6	35	2.6	
4/26/2011	XX	SWDP6X49E	192	6.3				365	6	75	6.8	
7/19/2011	XX	SWDP6X4DC	427	7.5				346	6	75	0	
10/25/2011	XX	SWDP6X4H7	307	7.5				212	6	80	0.5	0.0022
4/24/2012	XX	SWDP6X51H	172	6.7				547	6	100	2.5	
7/24/2012	XX	SWDP6X56G	97	7.2				396	5	40	12	0.0045
10/23/2012	XX	SWDP6X5D7	65	7.5				439	5	15	5.1	

REPORT PREPARED: 1/17/2013 13:56 FOR: Juniper Ridge Landfill		SUMMARY REPORT Field Data					Page 45 of 45 SEVEE & MAHER ENGINEERS, INC. 4 BLANCHARD ROAD CUMBERLAND CENTER, ME 04021						
Date	Type	Sample ID	Specific Conductance	pH	Temperature	Water Level Depth	Water Level Elevation	Well Depth	Corrected Eh	Dissolved Oxygen	Alkalinity (CaCO3) (field)	Turbidity (field)	Flow Rate
			µmhos/cm @25°C	Standard Units	Degrees Celcius	Feet	Feet	mV	mg/L	mg/L	NTU	cfs	

**Notes:** TYPE - Sample Type Qualifier where D = Duplicate Sample.  
 Blank Cells appear when a parameter was not analyzed.

**Concentration Qualifier Notes:**

- ! - The sampling location was damaged or destroyed.
- \* - Duplicate analysis not within control limits
- A - The sampling location was Inaccessible
- A6 - Approximate value.
- D - The sampling location was dry.
- D2 - Sample too dark to read D.O. reading.
- D3 - Sample too dark to take reading.
- DE - Decommissioned Location
- F - The sampling location was frozen.
- F1 - Well was flowing
- F12 - Pipe under water, no sample taken.
- F6 - No flow. Sample not taken.
- G7 - Field measurements elevated due to recent cleaning of underdrain pipe.
- H2 - Waterlevel higher than pipes. See LF-COMP for readings
- H5 - Waterlevel higher than pipes. See LP-COMP for readings
- H6 - Pipe under water, could not measure flow.
- H8 - No flow from pipe. See LF-COMP for readings
- H9 - No flow from pipe. See LP-COMP for readings
- I - The sampling location yielded insufficient quantity to collect a sample.
- L - Could not locate sampling location.

SUMMARY REPORT  
 Inorganics (part 1 of 2)

Date	Type	Sample ID	Ammonia (N)	Bicarbonate	Biochemical	Chloride	Chemical	Nitrate (N)	Phosphate	Sulfate	Ca-mg	Bromide
			mg/L	(CaCO3) mg/L	Oxygen Demand mg/L	mg/L	Oxygen Demand mg/L	mg/L	mg/L	Phosphorus mg/L	mg/L	Hardness (CaCO3) mg/L
<b>DP-4</b>												
1/30/2004	XX	GWDP4X039	0.1 U	301		72.9	18	0.2 U		113		
5/6/2004	XX	GWXXXX00D	0.1 U	269		20.4	16	0.1 U		60.8		
7/26/2004	XX	GWXXXX041	0.1 U	190		7.5	3 U	0.1 U		24		
10/26/2004	XX	GWXXXX07H	0.1 U	182		5.5	5 J	0.1 U		14.6		
5/9/2005	XX	GWXXXX13I	0.1 U	203		5.5	5 J	0.1 U		9.7		
8/1/2005	XX	GWXXXX176	0.1 U	191		6.6	6 J	0.1 U		5.7		
9/20/2005	XX	GWXXXX1A4	0.1 U	175		5.9	10	0.1 U		7.8		
5/22/2006	XX	GWXXXX1EJ	0.1 U	150		7.9	6 J	0.2 J		7.3		
7/24/2006	XX	GWXXXX1HG	0.1 U	145		9.6	9 J	0.2 J		6.5		
9/11/2006	XX	GWXXXX209	0.1 U	140		14.2	4 J	0.1 U		7		
5/14/2007	XX	GWXXXX23G	0.1 U	138		14.1	8 J	0.1 J		7		
7/23/2007	XX	GWXXXX280	0.1 U	138		19.3	17	0.1 U		11.5		
9/10/2007	XX	GWXXXX2AA	0.1 U	132		21.2	5 J	0.1 U		13.1		
5/19/2008	XX	GWXXXX2E4	0.1 U	141		20.6	3 J	0.1 U		12.7		
7/29/2008	XX	GWXXXX2H8	0.1 U	126		32.2	7 J	0.2 J		13.2		
10/27/2008	XX	GWXXXX2JI	0.1 U	94		57	3 U	0.1 U		11.8		
4/13/2009	XX	GWXXXX336	0.1 U	109		49.8	3 U	0.2 J		12.5		
7/6/2009	XX	GWXXXX37A	0.1 J	104		50.7	3 U	0.1 U		15.9		
10/26/2009	XX	GWXXXX3F5	0.1 U	118		21	16	0.1 U		12.3		
4/26/2010	XX	GWXXXX404	0.1 U	104		14.9	3 U	0.1 U		11.6		
7/19/2010	XX	GWXXXX438	0.1 U	109		14.7	3 U	0.1 U		12.1		
10/18/2010	XX	GWXXXX46C	0.1 U	105		7.2	6 J	0.1 U		10.7		
4/25/2011	XX	GWXXXX4AD	0.1 U	102		7.6	3 U	0.1 U		8.5		
7/18/2011	XX	GWXXXX4EB	0.1 U	106		8.3	3 U	0.1 U		10.1		
10/24/2011	XX	GWXXXX4I6	0.1 U	104		9.9	3 U	0.1 U		9.7		
4/25/2012	XX	GWXXXX52G	0.5 U	93		25.4	10 U	0.3 U		13		
7/25/2012	XX	GWXXXX57F	0.5 U	77		26.9	10 U	0.3 U		14.4		
10/24/2012	XX	GWXXXX5E6	0.5 U	78		31.6	10 U	0.3 U		15.3		
<b>LF-COMP</b>												
7/19/2011	XX	LFXXXX4F1	0.1 U	175		5.4	3 U	0.1 J		0.02 J		
4/24/2012	XX	LFXXXX53B	0.5 U	143		7	10 U	0.3 U		0.04 U		
<b>LF-UD-1</b>												
7/28/2004	XX	LFUD1X05E	0.1 U	118		2.7	3 U	0.3		0.02 J		
10/27/2004	XX	LFUD1X076	0.1 U	115		2.5	3 U	0.3		0.02 J		
5/11/2005	XX	LFUD1X137	0.1 U	115		3.9	3 U	0.3		0.01 J		
7/27/2005	XX	LFUD1X16F	0.1 U	113		2.6	3 U	0.2 J		0.01 U		
9/21/2005	XX	LFUD1X19D	0.1 U	110		3.3	3 U	0.4		0.01 J		
5/24/2006	XX	LFUD1X1E8	0.1 U	118		5.3	4 J	0.6		0.01 J		
7/25/2006	XX	LFUD1X1H5	0.1 U	117		3.6	4 J	0.4		0.01 J		
9/11/2006	XX	LFUD1X1JI	0.1 U	130		3.3	3 J	0.4		0.03 J		
5/16/2007	XX	LFUD1X235	0.1 U	148		3.8	3 U	0.1 J		0.01 J		
7/25/2007	XX	LFUD1X279	0.1 U	157		3.3	4 J	0.2 J		0.02 J		
9/12/2007	XX	LFUD1X29J	I	I		I	I	I		I		
5/20/2008	XX	LFUD1X2DD	0.1 U	143		3.7	3 U	0.3		0.01 J		
7/28/2008	XX	LFUD1X2GH	0.1 U	164		2.3	14	0.3		0.01 J		
10/28/2008	XX	LFUD1X2J7	0.1 U	155		1.9	3 U	0.3		0.01 J		
4/15/2009	XX	LFUD1X32F	0.1 U	175		4	9 J	0.3		0.01 U		

**SUMMARY REPORT**  
**Inorganics (part 1 of 2)**

<b>(LF-UD-1)</b>		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
7/8/2009	XX	H2	H2		H2	H2	H2	H2	H2		
10/27/2009	XX	H2	H2		H2	H2	H2	H2	H2		
4/27/2010	XX	0.1 U	174		3.5	3 J	0.3	0.02 J	6.6		
7/20/2010	XX	F6	F6		F6	F6	F6	F6	F6		
10/19/2010	XX	F6	F6		F6	F6	F6	F6	F6		
4/26/2011	XX	0.1 U	149		7.7	3 U	0.2 J	0.02 J	6.9		
7/19/2011	XX	0.1 J	171		5.1	7 J	0.1 J	0.02 J	10		
10/25/2011	XX	0.1 U	173		3.3	3 U	0.5	0.03 J	8.2		
4/24/2012	XX	H2	H2		H2	H2	H2	H2	H2		
7/24/2012	XX	0.5 U	168		3	10 U	0.3	0.05	4.1		
10/23/2012	XX	F6	F6		F6	F6	F6	F6	F6		

**LF-UD-2**

7/28/2004	XX	0.1 U	113		2.7	3 U	0.4	0.02 J	3.5		
10/27/2004	XX	0.1 U	113		2.7	3 U	0.4	0.02 J	3.1		
5/11/2005	XX	0.1 U	92		2.4	3 U	0.3	0.02 J	2.3		
7/27/2005	XX	0.1 U	116		2.4	3 U	0.3	0.01 J	2.8		
9/21/2005	XX	0.1 U	112		2.7	3 U	0.3	0.02 J	4.1		
5/24/2006	XX	0.1 U	105		2.9	3 J	0.4	0.02 J	3.8		
7/25/2006	XX	0.1 U	107		2.1	3 U	0.3	0.02 J	2.7		
9/11/2006	XX	0.1 U	155		7	3 U	0.3	0.02 J	15.2		
5/16/2007	XX	0.1 U	123		2.1	3 U	0.1 U	0.01 J	2.2		
7/25/2007	XX	0.1 U	125		3.2	6 J	0.2 J	0.02 J	3		
9/12/2007	XX	0.1 U	120		3.1	3 U	0.2 J	0.01 J	3.3		
5/20/2008	XX	0.1 U	125		2.5	3 U	0.3	0.02 J	3.7		
7/28/2008	XX	0.1 U	134		2.3	7 J	0.2 J	0.01 J	3.8		
10/29/2008	XX	0.1 U	123		1.7	3 J	0.3	0.01 J	3.5		
4/15/2009	XX	0.1 U	123		6	6 J	0.2 J	0.01 U	5.4		
7/8/2009	XX	H2	H2		H2	H2	H2	H2	H2		
10/27/2009	XX	H2	H2		H2	H2	H2	H2	H2		
4/27/2010	XX	0.1 U	134		3.8	4 J	0.2 J	0.02 J	3.8		
7/20/2010	XX	0.1 U	185		2.4	4 J	0.3	0.66	3.2		
10/19/2010	XX	0.1 U	213		3.2	3 U	0.1 J	0.05	17.5		
4/26/2011	XX	0.1 U	117		6.6	3 U	0.1 J	0.02 J	3.1		
7/19/2011	XX	0.1 U	135		5.7	3 J	0.1 J	0.02 J	4.4		
10/25/2011	XX	0.1 U	133		7.1	3 U	0.2 J	0.02 J	3.3		
4/24/2012	XX	H2	H2		H2	H2	H2	H2	H2		
7/24/2012	XX	0.5 U	135		9.5	10 U	0.3 U	0.04 U	2 U		
10/23/2012	XX	0.5 U	133		12.6	10 U	0.3 U	0.04 U	5.4		

**LF-UD-3A,B**

5/16/2007	XX	0.1 U	201		2.4	3 U	0.1 J	0.01 J	8.3		
7/25/2007	XX	F6	F6		F6	F6	F6	F6	F6		
9/12/2007	XX	F6	F6		F6	F6	F6	F6	F6		
5/20/2008	XX	0.1 U	130		6.5	9 J	1.3	0.01 J	16.3		
7/28/2008	XX	D	D		D	D	D	D	D		
10/29/2008	XX	F6	F6		F6	F6	F6	F6	F6		
4/15/2009	XX	0.1 U	123		10	10	0.7	0.01 U	13.3		
7/8/2009	XX	H2	H2		H2	H2	H2	H2	H2		
10/27/2009	XX	H2	H2		H2	H2	H2	H2	H2		

SUMMARY REPORT  
 Inorganics (part 1 of 2)

<b>(LF-UD-3A,B)</b>		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
<b>Sample ID</b>											
4/27/2010	XX	0.1 U	181		12.6	3 U	0.3	0.01 J	13.6		
7/20/2010	XX	F6	F6		F6	F6	F6	F6	F6		
10/19/2010	XX	F6	F6		F6	F6	F6	F6	F6		
4/26/2011	XX	0.1 U	148		7.4	3 U	0.6	0.01 J	13.4		
7/19/2011	XX	H2			H2	H2	H2	H2	H2		
10/25/2011	XX	F6	F6		F6	F6	F6	F6	F6		
4/24/2012	XX	H2			H2	H2	H2	H2	H2		
7/24/2012	XX	F6	F6		F6	F6	F6	F6	F6		
10/23/2012	XX	F6	F6		F6	F6	F6	F6	F6		

**LF-UD-4**

4/15/2009	XX	0.1 U	136		9	6 J	0.6	0.01 U	14.8		
7/8/2009	XX	H2			H2	H2	H2	H2	H2		
10/27/2009	XX	H2			H2	H2	H2	H2	H2		
4/27/2010	XX	F6	F6		F6	F6	F6	F6	F6		
7/20/2010	XX	F6	F6		F6	F6	F6	F6	F6		
10/19/2010	XX	F6	F6		F6	F6	F6	F6	F6		
4/26/2011	XX	F12			F12	F12	F12	F12	F12		
7/19/2011	XX	H2			H2	H2	H2	H2	H2		
10/25/2011	XX	F6	F6		F6	F6	F6	F6	F6		
4/24/2012	XX	H2			H2	H2	H2	H2	H2		
7/24/2012	XX	0.5 U	207		3.1	10 U	0.3 U	0.04 U	2 U		
10/23/2012	XX	0.5 U	180		8.1	10 U	0.3 U	0.04 U	7.9		

**LF-UD-5**

4/27/2010	XX	0.1 U	153		3.3	3 J	0.7	0.01 J	16.1		
-----------	----	-------	-----	--	-----	-----	-----	--------	------	--	--

**LF-UD-5and6**

7/20/2010	XX	0.1 U	180		6.2	5 J	1.1	0.03 J	22		
10/19/2010	XX	0.1 U	184		3.6	3 J	0.2 J	0.06	19.6		
4/26/2011	XX	0.1 U	224		2.7	3 U	0.2 J	0.01 J	15.9		
7/19/2011	XX	0.1 U	238		2.5	4 J	0.1 J	0.02 J	15.3		
10/25/2011	XX	0.1 U	224		3.2	3 U	0.2 J	0.16	16.6		
4/24/2012	XX	0.5 U	232		3.2	10 U	0.3 U	0.05	14.9		
7/24/2012	XX	0.5 U	232		2.5	10 U	0.3 U	0.04 U	11.9		
10/23/2012	XX	0.5 U	201		3.3	10 U	0.3 U	0.07	14.6		

**LF-UD-6**

4/26/2011	XX	0.1 U	263		2.6	7 J	1	0.02 J	30.8		
7/19/2011	XX	0.1 U	272		2.4	3 U	0.8	0.17	24.6		
10/25/2011	XX	0.1 U	307		2.1	8 J	0.4	0.01 J	14.8		
4/24/2012	XX	0.5 U	278		2.7	10 U	0.3	0.04 U	10.6		
7/24/2012	XX	0.5 U	326		3.1	10 U	0.3 U	0.04 U	2 U		
10/23/2012	XX	0.5 U	359		11.6	10	0.5	0.04 U	107		

**LF-UD-7**

4/24/2012	XX	H2			H2	H2	H2	H2	H2		
7/24/2012	XX	F6	F6		F6	F6	F6	F6	F6		
10/23/2012	XX	F6	F6		F6	F6	F6	F6	F6		

**LP-COMP**

10/27/2004	XX	0.1 U	225		31.4	14	2.3	0.02 J	117		
------------	----	-------	-----	--	------	----	-----	--------	-----	--	--

SUMMARY REPORT  
 Inorganics (part 1 of 2)

Date	Type	Sample ID	Ammonia (N) mg/L	Bicarbonate (CaCO <sub>3</sub> ) mg/L	Biochemical Oxygen Demand mg/L	Chloride mg/L	Chemical Oxygen Demand mg/L	Nitrate (N) mg/L	Phosphate Phosphorus mg/L	Sulfate mg/L	Ca-mg Hardness (CaCO <sub>3</sub> ) mg/L	Bromide mg/L
7/28/2004	XX	LPD1X05I	0.1 U	288		39.1	18	7.5	0.02 J	98.6		
10/27/2004	XX	LPD1X07A	0.1 U	182		16.2	20	3.1	0.14	45.8		
5/11/2005	XX	LPD1X13B	0.1 U	32		0.7 J	7 J	0.1 U	0.05	0.6 U		
7/27/2005	XX	LPD1X16J	0.1 U	192		3.7	4 J	0.7	0.01 U	10.9		
9/21/2005	XX	LPD1X19H	0.3 J	316		96.4	29	2.4	0.09	42.2		
5/24/2006	XX	LPD1X1EC	0.1 U	87		12.2	11	2.1	0.02 J	23.2		
7/25/2006	XX	LPD1X1H9	0.1 U	230		15.5	11	4	0.01 J	42.4		
9/11/2006	XX	LPD1X202	0.1 J	303		25.7	13	5	0.01 J	62.8		
5/16/2007	XX	LPD1X239	0.2 J	200		13.7	12	1.7	0.01 U	28.1		
7/25/2007	XX	LPD1X27D	0.1 U	316		24.5	18	1	0.05	52.9		
9/12/2007	XX	LPD1X2A3	0.1 J	373		25.1	29	0.1 U	0.18	34.1		
5/20/2008	XX	LPD1X2DH	0.1 U	54		1.2	9 J	0.8	0.04	2.3		
7/28/2008	XX	LPD1X2H1	0.1 U	90		1.4	13	0.9	0.05	3		
10/29/2008	XX	LPD1X2JB	0.1 U	145		2.4	17	0.9	0.07	5.7		
4/15/2009	XX	LPD1X32J	0.1 U	209		24.2	11	4	0.01 U	35.4		
7/8/2009	XX	LPD1X373	0.1 U	32		13.2	4 J	0.1 J	0.12	6		
10/27/2009	XX	LPD1X3EI	0.1 U	43		10.1	4 J	0.4	0.03 J	4.9		

LP-UD-1

7/28/2004	XX	LPUD1X05G	D	D		D	D	D	D	D		
10/27/2004	XX	LPUD1X078	H2	H2		H2	H2	H2	H2	H2		
5/11/2005	XX	LPUD1X139	D	D		D	D	D	D	D		
7/27/2005	XX	LPUD1X16H	D	D		D	D	D	D	D		
9/21/2005	XX	LPUD1X19F	D	D		D	D	D	D	D		
5/24/2006	XX	LPUD1X1EA	D	D		D	D	D	D	D		
7/26/2006	XX	LPUD1X1H7	F6	F6		F6	F6	F6	F6	F6		
9/11/2006	XX	LPUD1X200	D	D		D	D	D	D	D		
5/16/2007	XX	LPUD1X237	F6	F6		F6	F6	F6	F6	F6		
7/25/2007	XX	LPUD1X27B	F6	F6		F6	F6	F6	F6	F6		
9/12/2007	XX	LPUD1X2A1	F6	F6		F6	F6	F6	F6	F6		
5/20/2008	XX	LPUD1X2DF	F6	F6		F6	F6	F6	F6	F6		
7/28/2008	XX	LPUD1X2GJ	D	D		D	D	D	D	D		
10/29/2008	XX	LPUD1X2J9	F6	F6		F6	F6	F6	F6	F6		
4/15/2009	XX	LPUD1X32H	F6	F6		F6	F6	F6	F6	F6		
7/8/2009	XX	LPUD1X371	F6	F6		F6	F6	F6	F6	F6		
10/27/2009	XX	LPUD1X3EG	F6	F6		F6	F6	F6	F6	F6		
4/27/2010	XX	LPUD1X3JF	F6	F6		F6	F6	F6	F6	F6		
7/20/2010	XX	LPUD1X42J	F6	F6		F6	F6	F6	F6	F6		
10/19/2010	XX	LPUD1X463	F6	F6		F6	F6	F6	F6	F6		
4/26/2011	XX	LPUD1X4A4	F6	F6		F6	F6	F6	F6	F6		
7/19/2011	XX	LPUD1X4E2	F6	F6		F6	F6	F6	F6	F6		
10/25/2011	XX	LPUD1X4HH	F6	F6		F6	F6	F6	F6	F6		
4/24/2012	XX	LPUD1X527	F6	F6		F6	F6	F6	F6	F6		
7/24/2012	XX	LPUD1X576	F6	F6		F6	F6	F6	F6	F6		
10/23/2012	XX	LPUD1X5DH	F6	F6		F6	F6	F6	F6	F6		

LP-UD-2

7/28/2004	XX	LPUD2X05H	0.1 U	178		15.7	8 J	0.7	0.01 J	58.3		
10/27/2004	XX	LPUD2X079	0.1 U	228		31.1	14	2.3	0.02 J	116		

**SUMMARY REPORT**  
**Inorganics (part 1 of 2)**

**(LP-UD-2)**

Date	Type	Sample ID	Ammonia (N) (mg/L)	Bicarbonate (CaCO3) (mg/L)	Biochemical Oxygen Demand (mg/L)	Chloride (mg/L)	Chemical Oxygen Demand (mg/L)	Nitrate (N) (mg/L)	Phosphate Phosphorus (mg/L)	Sulfate (mg/L)	Ca-mg Hardness (CaCO3) (mg/L)	Bromide (mg/L)
5/11/2005	XX	LPUD2X13A	0.1 U	155		9.9	3 J	0.7	0.01 J	34.3		
7/27/2005	XX	LPUD2X16I	0.1 U	168		8.7	3 U	0.4	0.01 U	21.4		
9/21/2005	XX	LPUD2X19G	0.1 U	172		8.3	3 U	0.4	0.01 J	22.4		
5/24/2006	XX	LPUD2X1EB	0.1 U	147		8.6	5 J	0.7	0.01 J	21.4		
7/25/2006	XX	LPUD2X1H8	0.1 U	143		6.9	3 U	0.4	0.01 J	16.5		
9/11/2006	XX	LPUD2X20I	0.1 U	120		2.3	3 U	0.2 J	0.02 J	2.7		
5/16/2007	XX	LPUD2X238	0.1 U	151		8.1	6 J	0.2 J	0.01 J	12.7		
7/25/2007	XX	LPUD2X27C	0.1 U	142		8.2	7 J	0.1 J	0.01 J	14.2		
9/12/2007	XX	LPUD2X2A2	0.1 U	139		8.4	3 J	0.3	0.01 U	14.3		
5/20/2008	XX	LPUD2X2DG	0.1 U	126		16.5	3 U	0.4	0.01 J	14.5		
7/28/2008	XX	LPUD2X2H0	0.1 U	123		14	3 J	0.4	0.01 J	13.6		
10/29/2008	XX	LPUD2X2JA	0.1 U	121		12.1	3 U	0.3	0.01 J	13.4		
4/15/2009	XX	LPUD2X32I	0.1 U	123		9.1	6 J	0.3	0.01 U	9.8		
7/8/2009	XX	LPUD2X372	0.1 U	132		7.6	3 U	0.3	0.01 U	10.4		
10/27/2009	XX	LPUD2X3EH	0.1 U	90		11.1	11	0.2 J	0.07	7.7		
4/27/2010	XX	LPUD2X3JG	0.1 U	129		12.5	3 J	0.2 J	0.01 J	9.7		
7/20/2010	XX	LPUD2X430	0.1 U	137		8.6	3 J	0.2 J	0.01 J	9.2		
10/19/2010	XX	LPUD2X464	0.1 U	125		7.2	3 U	0.1 J	0.01 J	8		
4/26/2011	XX	LPUD2X4A5	0.1 U	133		6.7	3 U	0.2 J	0.01 U	8.5		
7/19/2011	XX	LPUD2X4E3	0.1 U	135		6.3	18	0.1 J	0.06	8.6		
10/25/2011	XX	LPUD2X4HI	0.1 U	135		5.3	4 J	0.2 J	0.11	9.7		
4/24/2012	XX	LPUD2X528	0.5 U	123		5.2	10 U	0.3 U	0.04 U	9.9		
7/24/2012	XX	LPUD2X577	0.5 U	143		5.1	10 U	0.3 U	0.04 U	8.5		
10/23/2012	XX	LPUD2X5D1	0.5 U	128		5.6	10 U	0.3 U	0.04 U	8.6		

**LT-C4L**

4/15/2009	XX	LTCLX325	318	3290	4050	10100	6640	10 U		143 J	6212	92.3
7/7/2009	XX	LTCLX369	708	2830	2360	21500	4684	30 U	1.1	342 J		
10/28/2009	XX	LTCLX3E4	624	2750	677	17400	2822	20 U	0.88	120 U		
4/28/2010	XX	LTCLX3J3	697	3210	1000 U	18000	2429	20 U		120 U	2856	188
7/20/2010	XX	LTCLX427	714	3360	139	19900	2108	20 U	1.2	120 U		
10/19/2010	XX	LTCLX45B	666	2700	152	18700	2340	5.6 J	0.76	63		
4/27/2011	XX	LTCLX49C	74	2280	39	5910	1740	6 U		72 J	1831	23.3
7/19/2011	XX	LTCLX4DA	666	2800	45	10300	959	10 U	0.92	60 U		
10/26/2011	XX	LTCLX4H5	442	1400	47	4300	1420	5 U	0.59	64.6 J		
4/24/2012	XX	LTCLX51F	274	1370	1120 G	2560	2960	15 U		133	1941	32.7
7/24/2012	XX	LTCLX56E	742	3630	3090	6350	6700	6 U	0.77	50.2		
10/23/2012	XX	LTCLX5D5	459	2740	3190	9880	5900	17.9	0.46	213		

**MW04-102**

1/18/2005	XX	GW102X10C	0.1 U	103	6 U	2	3 U	0.1 U		7.6	89.6	0.03 U
3/21/2005	XX	GW102X144	0.1 U	101	6 U	1.7	3 U	0.2 J		7.3	88.8	0.03 U
7/25/2005	XX	GW102X17I	0.1 U	109	6 U	1.9	3 U	0.2 J		7.6	103	0.03 U
9/20/2005	XX	GW102X1A9	0.1 U	108	6 U	2.1	3 U	0.2 J		7.8	95	0.03 U
5/23/2006	XX	GW102X1F4	0.1 U	100		2.9	3 U	0.2 J		11.4		
7/25/2006	XX	GW102X1I0	0.1 U	100		1.5	3 U	0.2 J		8.1		
9/12/2006	XX	GW102X20D	0.1 U	102		1.6	3 U	0.1 U		7.9		
5/15/2007	XX	GW102X240	0.1 U	100		1.7	3 J	0.1 U		10.1		
7/24/2007	XX	GW102X284	0.1 U	95		2.5	9 J	0.1 J		10.6		
9/11/2007	XX	GW102X2AE	0.1 U	96		2.7	3 U	0.1 J		9.5		

SUMMARY REPORT  
 Inorganics (part 1 of 2)

(MW04-102)	Date	Type	Sample ID	Ammonia (N) mg/L	Bicarbonate (CaCO3) mg/L	Biochemical Oxygen Demand mg/L	Chloride mg/L	Chemical Oxygen Demand mg/L	Nitrate (N) mg/L	Phosphate Phosphorus mg/L	Sulfate mg/L	Ca-mg Hardness (CaCO3) mg/L	Bromide mg/L
XX	5/20/2008	XX	GW102X2E8	0.1 U	73		1.9	3 U	0.2 J		12.5		
XX	7/29/2008	XX	GW102X2HC	0.1 U	96		2.7	3 J	0.2 J		14		
XX	10/27/2008	XX	GW102X302	0.1 U	98		1.3	3 U	0.1 J		10.8		
XX	4/14/2009	XX	GW102X339	0.1 U	95		3.5	3 U	0.1 J		9.1		
XX	7/17/2009	XX	GW102X37D	0.1 U	101		1.7	5 J	0.1 J		9.4		
XX	10/27/2009	XX	GW102X3F8	0.1 U	100		2.4	6 J	0.1 U		8.5		
XX	4/27/2010	XX	GW102X407	0.1 U	104		2.7	3 U	0.1 U		10.2		
XX	7/21/2010	XX	GW102X43B	0.1 U	100		1.3	4 J	0.3		8.5		
XX	10/19/2010	XX	GW102X46F	0.1 U	102		1.1	3 U	0.2 J		8.1		
XX	4/25/2011	XX	GW102X4AG	0.1 U	102		1.1	3 U	0.1 U		8.5		
XX	7/19/2011	XX	GW102X4EE	0.1 U	101		1	3 U	0.1 U		9.1		
XX	10/25/2011	XX	GW102X4I9	0.1 U	105		2	3 U	0.1 J		8.8		
XX	4/24/2012	XX	GW102X52J	0.5 U	102		2	10 U	0.3 U		11.4		
XX	7/24/2012	XX	GW102X57I	0.5 U	101		1 U	10 U	0.3 U		11.4		
XX	10/22/2012	XX	GW102X5E9	0.5 U	107		1.1	10 U	0.3 U		6.7		

MW04-105

XX	1/17/2005	XX	GW105X10F	0.1 U	163	6 U	16.9	11	0.1 U		97.4	209	0.03 U
XX	3/21/2005	XX	GW105X147	0.1 U	180	6 U	30.9	12	0.2 J		115	298	0.05 J
XX	7/25/2005	XX	GW105X181	0.1 U	175	6 U	20.4	8 J	0.1 U		94.5	269	0.03 U
XX	9/20/2005	XX	GW105X1AC	0.1 U	191	6 U	15.1	5 J	0.1 U		83.5	274	0.03 U
XX	5/23/2006	XX	GW105X1F7	0.1 J	138		8.7	11	0.1 U		42.1		
XD	7/25/2006	XD	GWDP3X1GI	0.1 U	140		6.4	3 J	0.1 U		30.2		
XX	7/25/2006	XX	GW105X1I1	0.1 U	193		9.4	4 J	0.1 U		44.1		
XX	9/12/2006	XX	GW105X20E	0.1 U	200		7.1	4 J	0.1 U		32.3		
XX	5/14/2007	XX	GW105X241	0.1 U	152		14.4	5 J	0.1 U		12.6		
XD	5/14/2007	XD	GWDP3X22I	0.1 U	152		13.7	3 J	0.1 U		12.7		
XD	7/24/2007	XD	GWDP3X272	0.1 J	207		15.4	10	0.1 U		18.4		
XX	7/24/2007	XX	GW105X285	0.1 U	179		14.7	7 J	0.1 U		17		
XX	9/10/2007	XX	GW105X2AF	0.1 U	225		14.9	10	0.1 U		17.7		
XD	5/19/2008	XD	GWDP3X2D6	0.1 U	201		11.8	3 U	0.1 U		13.3		
XX	5/19/2008	XX	GW105X2E9	0.1 U	206		12.1	3 U	0.1 U		13.7		
XD	7/29/2008	XD	GWDP3X2GA	0.1 U	205		8.7	8 J	0.2 J		12.9		
XX	7/29/2008	XX	GW105X2HD	0.1 U	210		8.6	7 J	0.2 J		13.4		
XD	10/27/2008	XD	GWDP1X395	0.1 U	177		7.1	3 U	0.1 U		10.8		
XX	10/27/2008	XX	GW105X303	0.1 U	177		7	3 U	0.1 U		11.2		
XX	4/15/2009	XX	GW105X33A	0.1 U	117		7.3	7 J	0.1 J		6.2		
XD	4/15/2009	XD	GWDP3X328	0.1 U	117		7.5	8 J	0.1 J		6.2		
XX	7/17/2009	XX	GW105X361	0.1 U	151		9.3	3 U	0.1 U		8.8		
XX	7/17/2009	XX	GW105X37E	0.1 U	155		10.1	3 U	0.1 U		8.7		
XD	10/26/2009	XD	GWDP1X3DG	0.1 U	143		9.6	3 U	0.1 U		7.8		
XX	10/26/2009	XX	GW105X3F9	0.1 U	147		10.5	3 U	0.1 U		8.3		
XX	4/27/2010	XX	GW105X408	0.1 U	138		8.4	3 J	0.1 U		7		
XD	4/27/2010	XD	GWDP3X3J6	0.1 U	139		8.2	4 J	0.1 U		7.5		
XX	7/19/2010	XX	GW105X43C	0.1 U	148		7	3 U	0.1 U		6.4		
XD	10/18/2010	XD	GWDP3X45E	0.1 U	133		8.9	4 J	0.1 U		5.5		
XX	10/18/2010	XX	GW105X46G	0.1 U	126		9.6	3 J	0.1 U		5.2		
XD	4/26/2011	XD	GWDP3X48F	0.6	124		8.3	3 U	0.1 U		5.2		
XX	4/26/2011	XX	GW105X4AH	0.1 U	125		8.3	3 U	0.1 U		5.2		
XX	7/18/2011	XX	GW105X4EF	0.1 U	144		7.1	3 U	0.1 U		5.9		

**SUMMARY REPORT**  
**Inorganics (part 1 of 2)**

<b>(MW04-105)</b>		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
10/25/2011	XD	GWDP1X4GH	0.1 U	102	5.8	3 U	0.1 U		5.1		
10/25/2011	XX	GW105X4IA	0.1 U	100	5	3 U	0.1 U		4.5		
4/23/2012	XD	GWDP3X5I1	0.5 U	102	5.7	10 U	0.3 U		6.4		
4/23/2012	XX	GW105X530	0.5 U	105	5.6	10 U	0.3 U		6.4		
7/24/2012	XX	GW105X57J	0.5 U	125	2.9	10 U	0.3 U		7.7		
10/22/2012	XX	GW105X5EA	0.5 U	117	3	10 U	0.3 U		4.2		
10/22/2012	XD	GWDP1X5CH	0.5 U	108	3.3	10 U	0.3 U		4.6		

**MW04-109**

1/19/2005	XD	GWDP1X110	0.1 U	276	11.1	15	0.1 U		50.1	200	0.03 U
1/19/2005	XX	GW109X10I	0.1 U	276	11.2	15	0.1 U		49.6	207	0.03 U
3/23/2005	XX	GW109X14A	0.1 U	240	9.9	15	0.1 U		54.6	193	0.04 J
7/26/2005	XX	GW109X184	0.1 U	222	5.1	7 J	0.1 U		22.4	169	0.03 U
7/26/2005	XD	GWDP5X186	0.1 U	218	5	4 J	0.1 U		22.4	164	0.03 U
9/20/2005	XX	GW109X1AF	0.1 U	264	3.3	8 J	0.1 U		13.7	183	0.03 U
9/20/2005	XD	GWDP5X1AH	0.1 U	266	3.2	3 U	0.1 U		13	186	0.03 U
5/23/2006	XX	GW109X1FA	0.1 U	220	7.4	6 J	0.1 U		8.9		
5/23/2006	XD	GWDP3X1E1	0.1 U	226	7.5	6 J	0.1 U		8.8		
7/25/2006	XX	GW109X112	0.1 U	193	4.1	3 J	0.1 U		7.3		
9/12/2006	XX	GW109X20F	0.1 U	200	4.1	7 J	0.1 U		7.3		
9/12/2006	XD	GWDP1X1J0	0.1 U	195	4	3 U	0.1 U		7.4		
5/15/2007	XX	GW109X242	0.1 U	178	4.4	4 J	0.1 U		5.5		
7/24/2007	XX	GW109X286	0.1 U	140	5.3	10	0.1 U		6.6		
9/10/2007	XX	GW109X2AG	0.1 U	147	5.8	8 J	0.1 U		5.7		
9/10/2007	XD	GWDP5X2AH	0.1 U	145	6.1	13	0.1 U		5.4		
5/19/2008	XX	GW109X2EA	0.1 U	181	92.8	13	0.1 U		3.6		
7/29/2008	XX	GW109X2HE	0.1 U	240	61.9	11	0.2 J		4.3		
10/28/2008	XX	GW109X304	0.1 U	236	36.8	7 J	0.1 U		3.4		
4/15/2009	XX	GW109X33B	0.1 U	246	19.3	12	0.1 J		2.2		
7/7/2009	XX	GW109X37F	DE	DE	DE	DE	DE		DE		

**MW04-109R**

12/8/2009	XX	GW109X39F	0.1 U	220	15.9	3 U	0.1 U		15.2		
4/27/2010	XX	GW109X409	0.1 U	185	12.3	4 J	0.1 U		12		
7/20/2010	XX	GW109X43D	0.1 U	224	6.6	3 J	0.1 U		7.9		
10/19/2010	XX	GW109X46H	0.1 U	233	6.3	3 U	0.1 U		7.1		
4/26/2011	XX	GW109X4AI	0.1 U	220	4.6	3 J	0.1 U		5.3		
7/19/2011	XX	GW109X4EG	0.1 U	195	8.5	3 J	0.1 U		5.8		
10/25/2011	XX	GW109X4IB	0.1 J	202	7.7	5 J	0.1 U		6.2		
4/24/2012	XX	GW109X531	0.5 U	186	5.7	10 U	0.3 U		6.9		
7/24/2012	XX	GW109X580	0.5 U	184	2.3	10 U	0.3 U		6.4		
10/23/2012	XX	GW109X5EB	0.5 U	203	5.8	10 U	0.3 U		2.6		

**MW09-901**

12/8/2009	XX	GW901X3GH	0.1 U	108	5.1	3 U	0.1 U		15.4		
4/27/2010	XX	GW901X3J7	0.1 U	101	4.2	3 J	0.1 U		13.2		
7/20/2010	XX	GW901X42B	0.1 U	104	2.6	3 U	0.1 U		13.7		
10/19/2010	XX	GW901X45F	0.1 U	110	2.7	4 J	0.1 U		27.4		
4/26/2011	XX	GW901X49G	0.1 U	90	1.3	3 U	0.1 U		8.4		
7/19/2011	XX	GW901X4DE	0.1 U	86	1.3	3 U	0.1 U		8.3		
10/25/2011	XX	GW901X4H9	0.1 U	87	1.2	3 J	0.1 U		7		

**SUMMARY REPORT**  
**Inorganics (part 1 of 2)**

<b>(MW09-901)</b>		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
<b>MW11-207R</b>											
4/24/2012	XX	0.5 U	75	10 U	2.2	10 U	0.3 U		8.3		
7/24/2012	XX	0.5 U	77	10 U	1 U	10 U	0.3 U		9.5		
10/23/2012	XX	0.5 U	82	12	2.5		0.3 U		9		
<b>MW11-207R</b>											
7/20/2011	XX	0.1 U	37	3 U	1.4	3 U	0.2 J		1.3 J		
10/24/2011	XX	0.1 U	36	3 U	2.1	3 U	0.2 J		1 J		
4/23/2012	XX	0.5 U	40	10 U	2.1	10 U	0.3 U		2 U		
7/23/2012	XX	0.5 U	42	10 U	1.3	10 U	0.3 U		2 U		
10/22/2012	XX	0.5 U	39	10 U	2	10 U	0.3 U		2 U		
<b>MW-204</b>											
11/13/1990	XX	0.5		14	2.4	22	0.05 U	1.7	2.5	110	
2/20/1991	XX	F		F	F	F	F	F	F	F	
6/3/1991	XX	0.54		3	2 U	8.6	0.05 U	2.7	5.5	95	
9/16/1991	XX	0.13		1 U	2	240	0.05 U	0.3	6	78	
12/17/1991	XX	0.16		1 U	2 U	13 J	0.063	0.52	7	70	
3/2/1992	XX	F		F	F	F	F	F	F	F	
6/23/1992	XX	0.15		3 U	2	7	0.1	0.88	7	86	
8/17/1992	XX	0.22		9	3	96	0.05 U	2.9	8	72	
1/26/1993	XX	0.09		5 U	2	98	0.06	0.29	6	63	
4/27/1993	XX	0.1		5 U	2	5 U	0.05	0.23	6	54	
7/2/1993	XX	0.23		5 U	1	11	0.05 U	0.23	7	63	
10/12/1993	XX	0.05 U		10 U	2	14	0.05 U	0.26	7	91	
1/1/1994	XX	0.08		5 U	2	36	0.06	0.46	8	71	
5/21/1996	XX	0.1 U		6 U	1.8	4 U	0.09	0.88	7	71	
11/25/1996	XX				1 U	4 U			6	58.9	
3/25/1997	XX				1 U	2 U			5 U	56.4	
6/3/1997	XX				1 U	2 U			5 U	63.7	
9/9/1997	XX				1 U	2 U			13	65.5	
12/3/1997	XX				1 U	2 U			5 U	68	
3/23/1998	XX				2.5	2 U			5.9	69.6	
6/8/1998	XX				3.2	2 U			5.3	72.2	
9/9/1998	XX				3.3	2 U			6	76.7	
12/14/1998	XX				2.9	4 U			5.7	70.5	
3/29/1999	XX				3	4			4.9	63.5	
6/8/1999	XX				2.8	4			4.8	66.4	
9/13/1999	XX				1.4	15 U			7.2	61.4	
12/1/1999	XX				1.6	15 U			4.3	80.1	
3/27/2000	XX				10 U	10 U			8.5	86	
6/12/2000	XX				10 U	10 U			7.5	85	
9/12/2000	XX				10 U	10 U			5.8	78	
12/11/2000	XX				10 U	10 U			7.9	77	
3/12/2001	XX				10 U	10 U			6	82	
6/18/2001	XX				10 U	10 U			6	88	
9/10/2001	XX				10 U	10 U			6.7	86	
12/1/2001	XX				10 U	11			5.7	86	
3/13/2002	XX				10 U	11			6.1	110	
6/17/2002	XX				10 U	10			8.1	150	
9/18/2002	XX				5.1	10 U			5.3	160	

SUMMARY REPORT  
 Inorganics (part 1 of 2)

Date	Type	Sample ID	Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
			mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
12/9/2002	XX	MW-204831-37599				5.3	10			6.2	160	
3/25/2003	XX	MW-204N37705				3.8	10 U			4.6	140	
6/25/2003	XX	MW-204N37797				2.8	10 U			6	140	
9/17/2003	XX	MW-204N37881				4.6	16			6.3	120	
1/29/2004	XX	GW204X03A	0.1 U	110		4.4	3 U	0.1 J		5.2		
5/4/2004	XX	GW204X008	0.1 U	98	6 U	5.1	3 U	0.1 J		9.9	102	0.03 U
7/27/2004	XX	GW204X03G	0.1 U	95	6 U	2.4	3 U	0.2 J		4	95.3	0.03 U
10/25/2004	XX	GW204X07D	0.1 U	97		4.3	4 J	0.1 J		28.7		
5/9/2005	XX	GW204X13E	0.1 U	80		5.1	3 U	0.1 J		18.4		
8/1/2005	XX	GW204X172	0.1 U	93		6.2	3 U	0.1 U		23.9		
9/20/2005	XX	GW204X1A0	0.1 U	105		7.7	3 U	0.1 J		42.5		
5/23/2006	XX	GW204X1EF	0.1 U	81		4.3	3 U	0.2 J		18.7		
7/24/2006	XX	GW204X1HC	0.1 U	81		3	3 U	0.1 U		16.3		
9/11/2006	XX	GW204X205	0.1 U	85		3.6	3 U	0.1 U		15.7		
5/14/2007	XX	GW204X23C	0.1 U	83		3.7	3 U	0.1 U		8.7		
7/23/2007	XX	GW204X27G	0.1 U	84		5.8	6 J	0.1 U		12.8		
9/10/2007	XX	GW204X2A6	0.1 U	97		7.2	9 J	0.1 U		14.3		
5/21/2008	XX	GW204X2E0	0.1 U	94		8.8	3 U	0.3		7.8		
7/30/2008	XX	GW204X2H4	0.1 U	96		5	4 J	0.2 J		9.8		
10/28/2008	XX	GW204X2JE	0.1 U	94		3.8	3 J	0.2 J		10.5		
4/13/2009	XX	GW204X332	0.1 U	84		4.7	3 U	0.3		7.7		
7/6/2009	XX	GW204X376	0.1 U	90		4.1	3 U	0.1 J		7.9		
10/26/2009	XX	GW204X3F1	0.1 U	98		4.5	3 U	0.1 U		7.2		
4/28/2010	XX	GW204X400	0.1 U	83		4.9	4 J	0.1 U		5.9		
7/19/2010	XX	GW204X434	0.1 U	81		5.1	3 U	0.1 U		5.5		
10/19/2010	XX	GW204X468	0.1 U	76		4.8	3 U	0.1 U		5.5		
4/26/2011	XX	GW204X4A9	0.1 U	73		5.1	3 U	0.1 U		4.5		
7/19/2011	XX	GW204X4E7	0.1 U	80		4.7	3 U	0.1 U		4.7		
10/26/2011	XX	GW204X4I2	0.1 U	78		4.2	3 U	0.1 U		6.4		
4/24/2012	XX	GW204X52C	0.5 U	72		3.8	10 U	0.3 U		7.7		
7/23/2012	XX	GW204X57B	0.5 U	80		3.1	10 U	0.3 U		8.1		
10/24/2012	XX	GW204X5E2	0.5 U	82		4.8	10 U	0.3 U		7.5		

MW-207

11/13/1990	XX	MW-207XX33190	0.3		1 U	3.4	26	0.05 U	2	7.4	81	
2/20/1991	XX	MW-207XX33289	0.6		5 U	6	5 U	0.05 U	1.1	7	68	
6/4/1991	XX	MW-207XX33393	0.25		5.4	2.7	20	0.05 U	0.94	2.2	85	
9/17/1991	XX	MW-207XX33468	0.14		8.3	2 U	36	0.29	1.2	5.5	53	
12/18/1991	XX	GW207X002	0.05 U		2.8	2 U	91	0.31	1.6	5.4	58	
3/2/1992	XX	GW207X00J	F		F	F	F	F	F	F	F	
6/23/1992	XX	GW207X01F	0.07		3	2	10	0.08	1.1	3	66	
6/23/1992	XX	GW207X028	0.06		3 U	2	14	0.06	1.2	4	70	
8/17/1992	XX	GW207X02D	0.09		2	3	150	0.05 U	0.82	1 U	63	
1/26/1993	XX	GW207X039	0.06		6 U	1	30	0.05 U	0.84	4	52	
4/27/1993	XX	GW207X04D	0.05		5 U	1	350	0.05 U	0.98	3	52	
7/22/1993	XX	GW207X055	0.05 U		5 U	1	20	0.05 U	0.74	2	57	
10/13/1993	XX	GW207X060	0.12		11	1	28	0.16	0.73	2	65	
1/11/1994	XX	GW207X06G	0.05 U		5 U	1	11	0.05 U	1.6	3	62	
5/21/1996	XD	GWDP-IX09A	0.1 U		6 U	1 U	2 U	0.05 U	0.6	5 U	58	
5/21/1996	XX	GW207X095	0.1 U		6 U	1 U	3	0.05 U	0.53	5 U	57	

**SUMMARY REPORT**  
**Inorganics (part 1 of 2)**

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Ammonia (N)	Bicarbonate	Biochemical	Chloride	Chemical	Nitrate (N)	Phosphate	Sulfate	Ca-mg	Bromide
			mg/L	(CaCO3) mg/L	Oxygen Demand mg/L	mg/L	Oxygen Demand mg/L	mg/L	mg/L	mg/L	mg/L	Hardness (CaCO3) mg/L
11/26/1996	XX	GW207X044				1	2 U			5 U	101	
3/24/1997	XX	MW-207825-35513				1 U	2 U			7	71.7	
6/2/1997	XX	MW-207826-35583				1 U	3			5 U	71.3	
9/8/1997	XX	MW-207827-35681				1 U	2 U			5 U	90.2	
12/3/1997	XX	MW-207828-35767				1 U	2 U			5 U	57.6	
3/23/1998	XX	MW-207829-35877				2.1	2 U			2.1	54.3	
6/8/1998	XX	MW-207830-35954				0.8	2 U			1.4	60.1	
9/8/1998	XX	MW-207831-36046				1.6	2 U			1.6	63.8	
12/14/1998	XX	MW-207832-36143				1.4	4 U			1.8	51.8	
3/29/1999	XX	MW-207833-36248				1.4	4			2	34	
6/8/1999	XX	MW-207834-36319				1.8	7			2	49.7	
9/13/1999	XX	MW-207835-36416				1.1	15 U			1.4	38.1	
12/1/1999	XX	MW-207836-36495				1.2	15 U			1.7	48.1	
3/27/2000	XX	MW-207837-36612				10 U	20			3.9	77	
6/12/2000	XX	MW-207838-36688				10 U	14			4	80	
9/12/2000	XX	MW-207839-36781				10 U	22			1.1	63	
12/1/2000	XX	MW-207840-36871				10 U	12			4.5	58	
3/13/2001	XX	MW-207841-36963				10 U	10 U			2	54	
6/18/2001	XX	MW-207842-37060				10 U	10			3	44	
9/10/2001	XX	MW-207843-37144				10 U	10 U			3.8	46	
12/11/2001	XX	MW-207844-37236				10 U	10 U			2.5	51	
3/13/2002	XX	MW-207845-37328				10 U	10 U			3.5	40	
6/17/2002	XX	MW-207846-37424				10 U	10 U			6.3	44	
9/18/2002	XX	MW-207847-37517				2 U	10 U			4.2	44	
12/9/2002	XX	MW-207848-37599				2.3	10 U			3.4	46	
3/26/2003	XX	MW-207849-37706				2.1	10 U			3.5	46	
6/25/2003	XX	MW-207850-37811				2 U	10 U			4.5	50	
9/17/2003	XX	MW-207851-37918				2 U	10 U			2.9	43	
5/5/2004	XX	GW207X011	0.1 U	69		1.6	3 U	0.1 U		1.7		
7/28/2004	XX	GW207X048	0.1 U	71		1.9	3 U	0.1 U		2.4		
10/25/2004	XX	GW207X063	0.1 U	75		1.8	3 U	0.1 U		2.1		
5/12/2005	XX	GW207X124	0.1 U	68		1.9	3 U	0.1 U		0.6 U		
8/1/2005	XX	GW207X15C	0.1 U	78		2.1	3 U	0.1 U		0.6 U		
9/19/2005	XX	GW207X18A	0.1 U	73		1.7	3 U	0.1 U		1.2 J		
9/19/2005	XD	GWDP1X18F	0.1 U	62		2.3	3 U	0.1 U		1.2 J		
5/22/2006	XX	GW207X1D5	0.1 U	72		3.6	7 J	0.1 U		5.8		
7/25/2006	XX	GW207X1G2	0.1 U	73		1.8	4 J	0.1 U		2.1		
9/11/2006	XX	GW207X1F	0.1 U	71		2.3	11	0.1 U		1.6 J		
5/14/2007	XX	GW207X222	0.1 U	80		3.6	8 J	0.1 U		4		
7/25/2007	XX	GW207X266	0.1 U	89		5.5	17	0.1 U		7.8		
9/10/2007	XX	GW207X286	0.1 U	90		4.9	12	0.1 J		6.8		
5/19/2008	XX	GW207X2CA	0.1 U	100		2.2	9 J	0.1 U		7.6		
7/29/2008	XX	GW207X2FE	0.1 U	115		2.6	11	0.1 J		8.7		
10/28/2008	XX	GW207X2I4	0.1 U	142		2	20	0.1 U		7.7		
4/13/2009	XX	GW207X31C	15.7	230		4.8	44	0.3		0.8 J		
7/6/2009	XX	GW207X35G	20.7	284		4.9	55	0.1 U		0.7 J		
10/26/2009	XX	GW207X3DB	9	195		5.2	35	2.9		9.4		
4/26/2010	XX	GW207X3IA	2.2	238		5.9	14	0.1 J		6.1		
7/19/2010	XX	GW207X41E	2.5	228		4.9	18	0.6		6.6		
10/18/2010	XX	GW207X44I	4.1	213		4	18	0.1 U		5.2		

**SUMMARY REPORT**  
**Inorganics (part 1 of 2)**

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Ammonia (N)	Bicarbonate	Biochemical	Chloride	Chemical	Nitrate (N)	Phosphate	Sulfate	Ca-mg	Bromide
			mg/L	(CaCO <sub>3</sub> ) mg/L	Oxygen Demand mg/L	mg/L	Oxygen Demand mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
4/25/2011	XX	GW207X48J	1.5	207		3.6	11	0.1 U		7		
<b>MW-206</b>												
4/27/1993	XX	GW206X04I	0.1		5 U	1 U	10	0.27	2.8	4	57	
4/27/1993	XD	GW206X04E	0.11		5 U	2	25	0.27	2.7	4	58	
7/21/1993	XX	GW206X05A	0.2		5 U	1 U	22	0.05 U	0.31	3	59	
10/13/1993	XX	GW206X05J	0.11		5 U	1 U	23	0.16	0.29	3	57	
1/11/1994	XX	GW206X06F	0.07		5 U	1 U	12	0.11	0.18	4	60	
5/21/1996	XX	GW206X09A	0.1 U		6 U	1 U	2 U	0.06	0.13	5 U	56	
11/26/1996	XX	GW206X0A3				1 U	8 U			5 U	60.2	
3/25/1997	XX	MW-206824-35514				1 U	2 U			5 U	53.5	
6/2/1997	XX	MW-206825-35583				1 U	2 U			5 U	52.4	
9/8/1997	XX	MW-206826-35681				1 U	2 U			5 U	65.2	
12/3/1997	XX	MW-206827-35767				1 U	2 U			5 U	54.7	
3/23/1998	XX	MW-206828-35877				1.7	2 U			1.4	55.6	
6/8/1998	XX	MW-206829-35954				0.8	2 U			1.1	56.4	
9/8/1998	XX	MW-206830-36046				1.4	2 U			1.3	60.1	
12/14/1998	XX	MW-206831-36143				0.8	4 U			1.1	56	
3/29/1999	XX	MW-206832-36248				0.9	5			0.9	46.1	
6/8/1999	XX	MW-206833-36319				1.3	5			1	54.8	
9/15/1999	XX	MW-206834-36418				1	15 U			1.1	50.2	
12/1/1999	XX	MW-206835-36495				0.9	15 U			0.5	61	
3/27/2000	XX	MW-206836-36612				10 U	10 U			1 U	65	
6/12/2000	XX	MW-206837-36689				10 U	10 U			1 U	65	
9/13/2000	XX	MW-206838-36782				10 U	10 U			3.3	61	
12/11/2000	XX	MW-206839-36871				10 U	10 U			2.9	61	
3/13/2001	XX	MW-206840-36963				10 U	10 U			2	58	
6/18/2001	XX	MW-206841-37060				10 U	10 U			1	61	
9/10/2001	XX	MW-206842-37144				10 U	10 U			1	63	
12/12/2001	XX	MW-206843-37237				10 U	10 U			0.8 U	51	
3/13/2002	XX	MW-206844-37328				10 U	10 U			1.3	66	
6/17/2002	XX	MW-206845-37424				10 U	10 U			4.6	65	
9/18/2002	XX	MW-206846-37517				2 U	10 U			2.5	59	
12/9/2002	XX	MW-206847-37599				2.3	10 U			1.8	61	
3/26/2003	XX	MW-206848-37706				2 U	10 U			1.4	58	
6/25/2003	XX	MW-206849-37797				2 U	10 U			1.1	61	
9/17/2003	XX	MW-206850-37881				2 U	10 U			1 U	50	
5/6/2004	XX	GW206X010	0.1 U	69		1.5	3 J	0.1 U		0.2 J		
7/28/2004	XX	GW206X047	0.1 U	68		1.7	3 U	0.1 U		1.2		
10/26/2004	XX	GW206X062	0.1 U	71		1.8	3 U	0.1 U		1.1		
5/11/2005	XX	GW206X123	0.1 U	69		1.6	3 U	0.1 U		0.6 J		
7/28/2005	XX	GW206X158	0.1 U	67		1.7	3 U	0.1 U		0.9 J		
9/19/2005	XX	GW206X189	0.1 U	73		1.9	3 U	0.1 U		1.1 J		
5/24/2006	XX	GW206X1D4	0.1 U	71		1.9	3 J	0.1 J		1.8 J		
7/25/2006	XX	GW206X1G1	0.1 U	71		1.5	3 U	0.1 U		1 J		
9/12/2006	XX	GW206X1E1	0.1 U	68		0.9 J	3 U	0.1 U		1.1 J		
5/14/2007	XX	GW206X221	0.1 U	68		1.2	3 U	0.1 U		0.8 J		
7/25/2007	XX	GW206X265	0.1 U	62		2.5	10	0.1 U		2.5		
9/11/2007	XX	GW206X28F	0.1 U	58		2.6	3 U	0.1 U		1.2 J		
5/20/2008	XX	GW206X2C9	0.1 U	67		1.5	3 U	0.1 J		1.6 J		

SUMMARY REPORT  
 Inorganics (part 1 of 2)

Date	Type	Sample ID	Ammonia (N)	Biochemical	Chloride	Chemical	Nitrate (N)	Phosphate	Sulfate	Ca-mg	Bromide
			mg/L	Oxygen Demand	mg/L	Oxygen Demand	mg/L	mg/L	mg/L	mg/L	mg/L
7/29/2008	XX	GW2062FD	0.1 U	69	1.5	3 J	0.2 J		2		
10/27/2008	XX	GW2062I3	0.5	69	0.9 J	3 U	0.1 U		4.1		
4/13/2009	XX	GW206231B	0.1 U	68	1.6	4 J	0.2 J		1.4 J		
7/6/2009	XX	GW206235F	0.1 U	68	1.3	3 U	0.1 J		1.9 J		
10/28/2009	XX	GW20623DA	0.1 U	71	1.7	3 U	0.1 U		1.2 J		
4/26/2010	XX	GW20623I9	0.3 J	67	2.7	3 U	0.1 U		1.6 J		
7/19/2010	XX	GW206241D	0.6	70	1.8	8 J	0.1 U		1.7 J		
10/18/2010	XX	GW206244H	2	80	1.2	5 J	0.1 U		0.6 U		
4/25/2011	XX	GW206248I	0.1 U	65	1.1	3 J	0.1 U		1 J		
7/18/2011	XX	GW20624CG	0.1 U	73	1.8	14	0.1 U		0.8 J		
10/24/2011	XX	GW20624GB	0.1 U	69	1.8	6 J	0.1 J		1.1 J		
4/23/2012	XX	GW2062511	0.5 U	70	1.8	10 U	0.3 U		2.7		
7/23/2012	XX	GW2062560	0.5 U	69	1.2	10 U	0.3 U		2 U		
7/23/2012	XD	GWDP4573	0.5 U	68	1.4	10 U	0.3 U		2.1		
10/22/2012	XX	GW20625CB	0.5 U	70	1.2	10 U	0.3 U		2 U		

**MW-212**

11/13/1990	XX	MW-212XX33190	I	I	I	I	I	I	I	I	I
2/19/1991	XX	MW-212XX33288	I	I	I	5 U	I	I	I	I	69
6/4/1991	XX	MW-212XX33393	0.1 U	14	2 U	34	0.08	I	4.6	I	42
9/16/1991	XX	MW-212XX33497	I	I	I	I	I	I	I	I	I
12/17/1991	XX	GW212X004	0.05 U	3.8	2 U	29	0.11	0.072	4.3	I	33
3/2/1992	XX	GW212X011	0.1	I	I	I	I	0.38	I	I	I
6/23/1992	XX	GW212X01H	D	D	D	D	D	D	D	D	D
1/26/1993	XX	GW212X03B	D	D	D	D	D	D	D	D	D
4/27/1993	XX	GW212X04G	0.06	6	1 U	14	0.72	0.38	51	I	73
7/21/1993	XX	GW212X058	D	D	D	D	D	D	D	D	D
10/12/1993	XX	GW212X062	D	D	D	D	D	D	D	D	D
1/11/1994	XX	GW212X06I	I	I	1	I	0.09	I	10	I	40
5/21/1996	XX	GW212X097	0.1 U	6 U	2	2 U	0.06	0.11	D	I	21.3
11/26/1996	XX	GW212X0A5			D	D			D	D	
3/24/1997	XX	MW-212826-35513			F	F			F	F	
6/2/1997	XX	MW-212827-35583			1 U	2 U			6		14.4
3/23/1998	XX	MW-212830-35877			2.5	2 U			16.9		23.7
6/8/1998	XX	MW-212831-35864			1.5	2 U			2.6		18.2
3/29/1999	XX	MW-212834-36248			0.9	15 U			11.7		17.9
6/8/1999	XX	MW-212835-36319			1	4			2.5		17.5
12/1/1999	XX	MW-212837-36495			0.6	15 U			2.5		21.8
3/27/2000	XX	MW-212839-36612			10 U	10 U			16		25
6/12/2000	XX	MW-212839-36689			10 U	10 U			4.2		21
3/13/2002	XX	MW-212840-37328			10 U	10 U			16		10 U
6/17/2002	XX	MW-212841-37424			2 U	10 U			7		18
3/26/2003	XX	MW-212N37706			10 U	10 U			3.3		22
6/25/2003	XX	MW-212N37797			2 U	10 U			4.1		19
5/5/2004	XX	GW212X00B	0.1 U	20	0.7	3 U	0.1 U		5.5		14
7/27/2004	XX	GW212X03J	D	D	D	D	D		D		D
10/27/2004	XX	GW212X07F	D	D	D	D	D		D		D
5/12/2005	XX	GW212X15G	0.1 U	35	1.9	3 U	0.1 J		16.9		
8/1/2005	XX	GW212X174	0.1 U	13.8	1.2	3 U	0.1 U		1.9 J		
9/20/2005	XX	GW212X1A2	I	I	I	I	I		I		I

SUMMARY REPORT  
 Inorganics (part 1 of 2)

(MW-212)		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
Date Type Sample ID											
5/22/2006	XX	GW212X1EH	0.1 U	15.2	2.3	3 J	0.1 U		5.8		
7/25/2006	XX	GW212X1HE	0.1 U	12.5	1.4	3 U	0.1 U		2.1		
9/11/2006	XX	GW212X297	I	I	I	I	I		I		
5/14/2007	XX	GW212X23E	0.1 U	20	1.6	3 U	0.1 J		4.3		
7/24/2007	XX	GW212X271	D	D	D	D	D		D		
9/10/2007	XX	GW212X2A8	D	D	D	D	D		D		
5/19/2008	XX	GW212X2E2	0.1 U	24	1.8	3 U	0.5		3.3		
7/29/2008	XX	GW212X2H6	D	D	D	D	D		D		
10/28/2008	XX	GW212X2JG	D	D	D	D	D		D		
4/13/2009	XX	GW212X334	0.1 U	42	27.5	3 J	0.2 J		7		
7/6/2009	XX	GW212X378	2.2	46	19.6	17	0.1 U		5		
10/26/2009	XX	GW212X3F3	D	D	D	D	D		D		
4/26/2010	XX	GW212X402	0.1 U	30	47.2	3 U	0.3		3.4		
7/19/2010	XX	GW212X436	D	D	D	D	D		D		
10/18/2010	XX	GW212X46A	D	D	D	D	D		D		
4/25/2011	XX	GW212X4A8	0.1 U	53	25.3	3 U	0.1 U		3.2		
7/18/2011	XX	GW212X4E9	D	D	D	D	D		D		
10/24/2011	XX	GW212X4H4	D	D	D	D	D		D		
4/23/2012	XX	GW212X52E	D	D	D	D	D		D		
7/23/2012	XX	GW212X57D	D	D	D	D	D		D		
10/22/2012	XX	GW212X5E4	D	D	D	D	D		D		

MW-216B

11/12/1990	XX	MW-216BX33189	0.2 U		2	12	0.05 U	0.12	5.8	69	
2/19/1991	XX	MW-216BX33288	0.2			5 U	0.05 U	0.11	5	47	
6/4/1991	XD	MW-216BX33393	0.1 U		2.1	23	0.05 U	0.02 U	4.4	46	
6/4/1991	XX	MW-216BX33393	0.1 U		2.2	5	0.05 U	0.026	4.4	44	
9/16/1991	XX	MW-216BX33497	0.1 U		2 U	240	0.05 U	0.027	4.9	51	
9/16/1991	XD	MW-216BX33497	0.1 U		2 U	22	0.052	0.02 U	4.6	53	
12/17/1991	XX	GW216B007	0.055 U		2.3	29	0.05 U	0.02 U	4.4	34	
12/17/1991	XD	GW216B00F	0.06		2 U	93	0.05 U	0.02 U	4.2	34	
3/2/1992	XX	GW216B014	0.06		1 U	5 U	0.05 U	0.07	4	35	
6/23/1992	XX	GW216B01J	0.05 U		3 U	8	0.08	0.02 U	4	40	
8/17/1992	XX	GW216B02I	0.05		1	9	0.05 U	0.05	6	41	
1/26/1993	XX	GW216B03D	0.05 U		1	5 U	0.05	0.02 U	5	53	
4/27/1993	XX	GW216B043	0.06		2	25	0.05 U	0.07	4	44	
10/13/1993	XD	GW216B050	0.05 U		1	5 U	0.05 U	0.05	5	47	
10/13/1993	XX	GW216B066	0.05 U		2	7	0.06	0.18	7	62	
10/13/1993	XX	GW216X064	0.05 U		2	7	0.06	0.06	7	60	
1/11/1994	XX	GW216B070	0.05 U		1	5 U	0.05 U	0.03	5	61	
1/11/1994	XX	GW216B071	0.05 U		1	5 U	0.05	0.02 U	5	59	
5/21/1996	XX	GW216B099	0.1 U		1.9	2 U	0.05 U	0.05	5 U	53	
11/25/1996	XX	GW216B0A7			1 U	3	0.05 U		5 U	48.9	
3/25/1997	XX	MW-216B81C-35514								54.3	
6/2/1997	XX	MW-216B811-35583			1 U	2 U			5 U	52.9	
9/9/1997	XX	MW-216B812-35682			1 U	2 U			7	54.7	
12/3/1997	XX	MW-216B813-35787			1 U	2 U			5 U	53	
3/25/1998	XD	MW-216B814-35955			1.1	2 U			3.9	59.3	
3/25/1998	XX	MW-216B814-35879			2.3	2 U			4.1	63	
9/8/1998	XX	MW-216B815-36046			1.9	2 U			3.9	66.7	

SUMMARY REPORT  
 Inorganics (part 1 of 2)

<b>(MW-216B)</b>		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	Sample ID	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
12/14/1998	XX	MW-216B817-36143			1.6	4 U			3.9	67.6	
3/30/1999	XX	MW-216B818-36249			1.6	15 U			3.7	60.2	
6/9/1999	XX	MW-216B819-36320			1.7	9			3.8	47.7	
9/14/1999	XX	MW-216B820-36417			1.1	15 U			4.3	47.3	
12/2/1999	XX	MW-216B821-36496			1.8	15 U			2.6	35.2	
3/28/2000	XX	MW-216B822-36613			10 U	10 U			4	52	
6/13/2000	XX	MW-216B823-36690			10 U	10 U			4	71	
9/13/2000	XX	MW-216B824-36782			10 U	10 U			3.9	43	
12/12/2000	XX	MW-216B825-36872			10 U	10 U			4	62	
3/14/2001	XX	MW-216B826-36964			10 U	10 U			4	72	
6/19/2001	XX	MW-216B827-37061			10 U	10 U			3	75	
9/11/2001	XX	MW-216B828-37145			10 U	10 U			4.4	61	
12/12/2001	XX	MW-216B829-37237			10 U	10 U			5.1	45	
3/14/2002	XX	MW-216B830-37329			10 U	10 U			4.3	85	
6/18/2002	XX	MW-216B831-37425			2 U	10 U			7	73	
9/19/2002	XX	MW-216B832-37518			10 U	10 U			5.2	58	
12/10/2002	XX	MW-216B833-37600			2.7	10 U			4.8	71	
3/26/2003	XX	MW-216B83706			2.3	10 U			3.9	78	
6/26/2003	XX	MW-216B83798			2.3	10 U			5.3	59	
9/18/2003	XX	MW-216B837882			2 U	10 U			4.8	58	
5/6/2004	XD	GWDP1X017	0.1 U	58	2.3	3 J	0.3		2.5		
5/6/2004	XX	GW216B013	0.1 U	65	2.3	3 J	0.3		2.5		
7/26/2004	XX	GW216B049	0.1 U	48	2.1	3 U	0.1 U		4.4		
10/26/2004	XX	GW216B064	0.1 U	38	2.1	3 U	0.2 J		4.5		
10/26/2004	XD	GWDP1X068	0.1 U	44	2	3 U	0.2 J		4.4		
5/10/2005	XX	GW216B125	0.1 U	29	2.7	4 J	0.3		3.4		
7/27/2005	XD	GWDP3X168	0.1 U	73	3	3 U	0.1 U		3.5		
7/27/2005	XX	GW216B15D	0.1 U	74	3	3 U	0.1 U		3.7		
9/22/2005	XX	GW216B16B	0.1 U	33	1.4	3 U	0.1 J		4		
5/23/2006	XX	GW216B1D6	0.1 U	70	15.8	24	0.1 U		10		
7/25/2006	XX	GW216B1G3	0.1 U	40	5.7	10	0.1 U		4.1		
9/12/2006	XX	GW216B11G	0.1 U	44	5.6	13	0.1 U		4.1		
5/15/2007	XX	GW216B223	0.1 U	46	4.5	8 J	0.1 U		4.3		
7/24/2007	XX	GW216B267	0.1 U	44	6.6	10	0.1 U		4.2		
7/24/2007	XD	GWDP1X26B	0.1 U	41	6.2	8 J	0.1 U		10.3		
9/10/2007	XX	GW216B28H	0.1 U	46	6	7 J	0.1 U		10.3		
5/20/2008	XX	GW216B2CB	0.1 U	56	29.9	5 J	0.2 J		7.9		
7/28/2008	XX	GW216B2FF	3.6	95	50.4	14	0.1 U		11.5		
7/28/2008	XD	GWDP1X2FJ	3.4	95	51.9	10	0.1 U		19.7		
10/28/2008	XX	GW216B215	0.1 U	58	13.8	11	0.1 U		20.5		
4/14/2009	XX	GW216B31D	0.1 U	60	8.7	4 J	0.1 U		9.1		
7/7/2009	XX	GW216B35H	DE	DE	DE	DE	DE		4.5		
<b>MW-216BR</b>											
12/8/2009	XX	GW216B3G6	0.1 U	122	15.3	3 U	0.1 U		8		
4/27/2010	XX	GW216B31B	0.1 U	127	10.9	7 J	0.1 U		6.8		
7/20/2010	XX	GW216B41F	0.1 U	117	9.3	5 J	0.1 U		6.2		
10/19/2010	XX	GW216B44J	0.1 U	117	8.7	3 U	0.1 U		5.2		
4/26/2011	XX	GW216B490	0.1 U	164	8.1	3 U	0.1 U		4.6		

SUMMARY REPORT  
 Inorganics (part 1 of 2)

Date	Type	Sample ID	Ammonia (N)	Bicarbonate	Biochemical	Chloride	Chemical	Nitrate (N)	Phosphate	Sulfate	Ca-mg	Bromide
			mg/L	(CaCO <sub>3</sub> ) mg/L	Oxygen Demand mg/L	mg/L	Oxygen Demand mg/L	mg/L	mg/L	mg/L	mg/L	Hardness (CaCO <sub>3</sub> ) mg/L
7/19/2011	XX	GW216B4C1	0.1 U	171		9.1	3 J	0.1 U		4.7		
10/25/2011	XX	GW216B4GD	0.1 U	190		9.4	4 J	0.1 U		5.6		
4/24/2012	XX	GW216B513	0.5 U	182		9.3	10 U	0.3 U		4.6		
7/24/2012	XX	GW216B562	0.5 U	180		5.5	10 U	0.3 U		2 U		
10/23/2012	XX	GW216B5CD	0.5 U	156		7.5	10 U	0.3 U		2.5		
<b>MW-223A</b>												
11/12/1990	XX	MW-223AX33189	0.2 U		1	1.6	5 U	0.05 U	0.08	4.6	82	
2/19/1991	XX	MW-223AX33288	F		F	F	F	F	F	F	F	
6/3/1991	XX	MW-223AX33392	0.1 U	3.8	3.8	2 U	5 U	0.05 U	0.02 U	4.9	73	
9/16/1991	XX	MW-223AX33497	0.1 U	1 U	1 U	2 U	5 U	0.05 U	0.02 U	4.8	70	
12/17/1991	XX	GW223A008	F		F	F	F	F	F	F	F	
3/2/1992	XX	GW223A016	F		F	F	F	F	F	F	F	
6/23/1992	XX	GW223A020	0.05 U	3 U	3 U	1	5 U	0.06	0.04	4	76	
8/17/1992	XX	GW223A02J	0.05 U	2 U	2 U	1	5 U	0.05 U	0.02 U	6	69	
1/26/1993	XX	GW223A03E	F		F	F	F	F	F	F	F	
4/27/1993	XX	GW223A044	0.05 U	5 U	5 U	1	5 U	0.05 U	0.08	4	79	
7/21/1993	XD	GW223A056	0.05 U	5 U	5 U	1	5 U	0.05 U	0.03	5	72	
7/21/1993	XX	GW223A05B	0.09	5 U	5 U	1	5 U	0.05 U	0.02	6	74	
10/12/1993	XX	GW223X065	0.29	5 U	5 U	2	5 U	0.05	0.02 U	4	70	
1/11/1994	XX	GW223A072	F		F	F	F	F	F	F	F	
5/21/1996	XX	GW223A08B	0.1 U	6 U	6 U	1 U	2 U	0.07	0.01 U	5 U	72	
11/25/1996	XX	GW223A0A8				1 U	4 U			5 U	81.9	
3/24/1997	XX	MW-223A811-35513				F	F			F	F	
6/3/1997	XX	MW-223A812-35584				1 U	2 U			5	73.1	
9/10/1997	XX	MW-223A813-35683				1 U	2 U			7	71.1	
12/4/1997	XX	MW-223A814-35768				1 U	2 U			5 U	73.5	
6/11/1998	XX	MW-223A816-35957				1.6	2 U			5.1	78.1	
9/9/1998	XX	MW-223A817-36047				2	2 U			4.9	78.1	
12/15/1998	XX	MW-223A818-36144				1.6	4 U			4.4	78.1	
3/30/1999	XX	MW-223A819-36249				1.6	15 U			4.1	76.9	
6/9/1999	XX	MW-223A820-36320				1.7	15 U			3.8	82.7	
9/14/1999	XX	MW-223A821-36417				1.6	15 U			2.9	70.2	
12/2/1999	XX	MW-223A822-36496				1.5	15 U			3.1	82.7	
3/28/2000	XX	MW-223A823-36613				10 U	10 U			6.9	88	
6/13/2000	XX	MW-223A824-36660				10 U	10 U			6.5	86	
9/13/2000	XX	MW-223A825-36782				24	10 U			4.3	87	
12/12/2000	XX	MW-223A826-36872				10 U	10 U			4	90	
6/19/2001	XX	MW-223A827-37061				10 U	15			5	89	
9/11/2001	XX	MW-223A828-37145				10 U	18			5.4	89	
12/11/2001	XX	MW-223A829-37236				10 U	10 U			5.2	98	
3/14/2002	XX	MW-223A830-37329				10 U	10 U			5.2	89	
6/18/2002	XX	MW-223A831-37425				10 U	10 U			7.8	86	
9/19/2002	XX	MW-223A832-37518				2.2	10 U			5	100	
12/10/2002	XX	MW-223A833-37600				3	10 U			5.6	240	
3/25/2003	XX	MW-223AN37705				2.1	10 U			4.7	90	
3/25/2003	XD	MW-223AD37705				2 U	10 U			4.4	87	
6/26/2003	XX	MW-223AN37798				2 U	10 U			6	90	
9/18/2003	XX	MW-223AN37882				2 U	10 U			5.2	76	
5/5/2004	XX	GW223A014	0.1 U	93		1.9	3 U	0.1 J		3.4		

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Inorganics (part 1 of 2)

Page 16 of 34  
 SEVLEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-223A)		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
7/28/2004	XD	0.1 U	87		2.4	3 U	0.1 J		5		
7/28/2004	XX	0.1 U	89		2.4	3 U	0.1 J		5		
10/25/2004	XX	0.1 U	88		2.4	3 U	0.1 J		4.5		
5/10/2005	XD	0.1 U	90		2.2	3 U	0.1 J		4.7		
5/10/2005	XX	0.1 U	87		2.2	3 U	0.1 J		4.7		
7/26/2005	XX	0.1 U	88		2.3	3 U	0.1 J		4.3		
9/21/2005	XX	0.1 U	87		2.5	3 U	0.1 J		4.8		
5/24/2006	XD	0.1 U	90		3	3 U	0.3		7		
5/24/2006	XX	0.1 U	91		3	3 U	0.3		6.4		
7/26/2006	XD	0.1 U	88		2	5 J	0.2 J		4.3		
7/26/2006	XX	0.1 U	90		1.9	6 J	0.2 J		4.4		
9/13/2006	XD	0.1 U	91		2.2	3 U	0.1 U		4.4		
9/13/2006	XX	0.1 U	104		2.2	3 J	0.1 U		4.2		
5/15/2007	XD	0.1 U	91		2.8	3 U	0.1 U		4		
5/15/2007	XX	0.1 U	93		2.7	3 U	0.1 U		4.1		
7/24/2007	XD	0.1 U	76		3.2	5 J	0.1 J		4.8		
7/24/2007	XX	0.1 U	86		3.2	3 U	0.1 J		4.9		
9/11/2007	XX	0.1 U	88		3.6	3 U	0.2 J		4.7		
5/20/2008	XX	0.1 U	92		2.8	3 U	0.2 J		5.4		
5/20/2008	XD	0.1 U	95		2.8	4 J	0.2 J		5.4		
7/30/2008	XX	0.1 U	99		2.9	3 J	0.3		6		
7/30/2008	XD	0.1 U	95		3.2	3 U	0.3		5.7		
10/28/2008	XX	0.1 J	98		2.6	3 U	0.2 J		6.4		
4/14/2009	XD	0.1 U	165		14.1	3 U	0.1 J		4.4		
4/14/2009	XX	0.1 U	155		14	3 U	0.1 U		3.7		
7/7/2009	XX	0.1 U	108		8.9	3 U	0.2 J		4.8		
10/27/2009	XX	0.1 U	112		10.6	3 U	0.1 J		4.2		
10/27/2009	XD	0.1 U	113		11	3 U	0.1 J		4.2		
4/27/2010	XD	0.1 U	121		14.2	3 U	0.1 J		4.5		
4/27/2010	XX	0.1 U	124		14.2	3 U	0.2 J		4.5		
7/20/2010	XX	0.1 U	127		12.7	3 U	0.2 J		4.2		
10/19/2010	XD	0.1 U	125		14.9	3 U	0.1 J		3.7		
10/19/2010	XX	0.1 U	120		16.5	3 U	0.1 J		3.9		
4/26/2011	XX	0.1 J	137		20.3	3 U	0.2 J		3.8		
4/26/2011	XD	0.1 U	135		19.5	3 U	0.2 J		3.7		
7/19/2011	XX	0.1 J	138		21.3	3 U	0.1 J		4.7		
10/25/2011	XD	0.1 U	139		22.8	3 U	0.4		6.6		
10/25/2011	XX	0.1 U	143		21.8	3 U	0.4		6.3		
4/24/2012	XD	0.5 U	147		24.1	10 U	0.3 U		7.5		
4/24/2012	XX	0.5 U	149		24.1	10 U	0.3 U		7.4		
7/24/2012	XX	0.5 U	144		23.9	10 U	0.3 U		7.8		
10/23/2012	XX	0.5 U	153		25.4	10 U	0.3 U		4		
10/23/2012	XD	0.5 U	149		24.4	10 U	0.3 U		7		

MW-223B

11/12/1990	XX	0.3	2		1.8	5 U	0.05 U	0.15	3.8	60	
2/19/1991	XX	F	F		F	F	F	F	F	F	
6/3/1991	XX	0.1 U	1 U		2 U	5 U	0.05 U	0.022	4	60	
9/16/1991	XX	0.1 U	1 U		2 U	5 U	0.062	0.38	4.1	61	
12/17/1991	XX	F	F		F	F	F	F	F	F	

**SUMMARY REPORT**  
**Inorganics (part 1 of 2)**

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

<b>(MW-223B)</b>		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
Sample ID											
3/2/1992	XX										
6/23/1992	XX	0.05 U		3 U	F	F	F	0.02 U	F	F	
8/17/1992	XX	0.05 U		2 U	2	5 U	0.08	0.05 U	10	68	
1/26/1993	XX	F		F	F	21	F	F	6	89	
4/27/1993	XX	0.06		5 U	1	5 U	0.12	0.12	5	62	
7/21/1993	XX	0.07		5 U	1	5 U	0.07	0.07	4	62	
10/12/1993	XX	0.22		5 U	2	5 U	0.05 U	0.02	5	59	
1/11/1994	XX	F		F	F	F	F	F	F	F	
5/21/1996	XX	0.1 U		6 U	1 U	2 U	0.05	0.03	5	59	
11/25/1996	XX				1 U	4 U			5 U	67.7	
3/24/1997	XX				F	F			F	F	
6/3/1997	XX				1 U	2 U			5 U	64.6	
9/10/1997	XX				1 U	2 U			5	57.3	
12/4/1997	XX				1 U	2 U			5 U	66.4	
6/8/1998	XX				1.5	2 U			3.9	60.2	
9/9/1998	XX				1.9	2 U			4.2	71.8	
12/15/1998	XX				1.7	4 U			4.1	69.3	
3/30/1999	XX				1.8	5			3.6	63.1	
6/19/1999	XX				1.6	15 U			3.5	64.3	
9/14/1999	XX				1.6	7			3	65.2	
12/2/1999	XX				1.6	15 U			2.9	74.3	
3/28/2000	XX				10 U	20			6.8	78	
6/13/2000	XX				10 U	10 U			4.7	83	
9/13/2000	XX				50	10 U			3.6	76	
12/12/2000	XX				10 U	10 U			4	82	
6/19/2001	XX				10 U	30			4	86	
9/11/2001	XX				10 U	10			4.3	88	
12/11/2001	XX				10 U	12			3	92	
3/14/2002	XX				10 U	10 U			3.9	89	
6/18/2002	XX				10 U	10 U			7.3	120	
9/19/2002	XX				2.3	10 U			4.1	91	
12/10/2002	XX				3.5	10 U			4.5	85	
3/25/2003	XX				2.5	10 U			3.9	95	
6/26/2003	XD				3	16			4.6	90	
9/18/2003	XX				2.9	10 U			4.2	90	
5/5/2004	XX	0.1 U	101	6 U	2.7	3 U	0.3		4.3	68	0.06 J
7/27/2004	XX	0.1 U	92	6 U	2.4	3 U	0.2 J		2.8	85.5	0.05 J
10/25/2004	XX	0.1 U			2.9	3 U	0.3		4		
5/10/2005	XX	0.1 U	98		3.1	3 U	0.2 J		3.7		
7/26/2005	XX	0.1 U	95		3	3 U	0.2 J		3.5		
9/21/2005	XX	0.1 U	96		3.2	3 U	0.2 J		3.7		
5/24/2006	XX	0.1 U	100		3.8	3 U	0.4		3.6		
7/26/2006	XX	0.1 U	99		2.1	6 J	0.3		5.2		
9/13/2006	XX	0.1 U	104		2.7	3 U	0.1 U		3.5		
5/15/2007	XX	0.1 U	103		3.6	3 U	0.1 U		4.2		
7/24/2007	XX	0.1 U	98		4.3	3 J	0.2 J		3.2		
9/11/2007	XX	0.1 U	100		5.7	3 U	0.2 J		5.6		
5/20/2008	XX	0.1 U	111		5.4	3 U	0.2 J		3.8		
7/30/2008	XX	0.1 U	124		5.8	4 J	0.3		4.4		

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Inorganics (part 1 of 2)

Page 18 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
			mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
10/28/2008	XX	GW22382JF	0.1 U	120		5.5	3 J	0.2 J		5.6		
4/14/2009	XX	GW2238333	0.1 U	103		6.8	3 U	0.1 U		3		
7/7/2009	XD	GWDPX361	0.1 U	128		8.7	3 U	0.1 U		3.9		
7/7/2009	XX	GW2238377	0.1 U	129		9.6	3 U	0.1 U		4		
10/27/2009	XX	GW22383F2	0.1 U	128		10.9	3 J	0.2 J		3.5		
4/27/2010	XX	GW2238401	0.1 U	133		12.6	3 J	0.1 J		3.8		
7/20/2010	XD	GWDP1X41J	1.1	136		12	5 J	0.1 U		2.3		
7/20/2010	XX	GW2238435	1.3	140		11.8	12	0.1 U		2.2		
10/19/2010	XX	GW2238469	0.3 J	128		12	3 U	0.1 U		3.1		
4/26/2011	XX	GW22384AA	0.1 U	124		15.6	3 U	0.1 U		2.5		
7/19/2011	XD	GWDP3X4DD	0.3 J	127		18	4 J	0.1 J		2.6		
7/19/2011	XX	GW22384E8	0.3 J	122		18.1	3 J	0.1 J		3.6		
10/25/2011	XX	GW22384I3	0.6	128		17.9	9 J	0.1 U		3.3		
4/24/2012	XX	GW223852D	0.5 U	118		22.3	10 U	0.3 U		5.1		
7/24/2012	XX	GW223857C	0.5 U	115		24.4	10 U	0.3 U		4.6		
7/24/2012	XD	GWDP3X56H	0.5 U	117		23.7	10 U	0.3 U		4.6		
10/23/2012	XX	GW22385E3	0.5 U	121		24.1	10 U	0.3 U		5		

MW-227

11/13/1990	XX	MW-227X33190	0.2 U		5	2.2	17	0.05 U	0.11	9.4	71	
2/19/1991	XX	MW-227X33288	F		F	F	F	F	F	F	F	
6/3/1991	XX	MW-227X33392	0.1 U	1 U	1 U	2 U	5 U	0.05 U	0.46	10	76	
9/16/1991	XX	MW-227X33497	0.11	1 U	1 U	2 U	430	0.05 U	0.22	14	78	
12/17/1991	XX	GW227X00A	0.06	1 U	1 U	2 U	29 J	0.066	0.05	14	72	
3/2/1992	XX	GW227X018	F	F	F	F	F	F	F	F	F	
6/23/1992	XX	GW227X023	0.09	8	4	2	8	0.08	0.22	4	86	
8/17/1992	XX	GW227X031	0.05	4	1 U	1 U	140	0.05 U	0.15	14	69	
1/26/1993	XX	GW227X03G	F	F	F	F	F	F	F	F	F	
4/27/1993	XX	GW227X047	0.09	5 U	1	1	10	0.05 U	0.67	12	83	
7/21/1993	XX	GW227X05E	0.13	5 U	1	1	8	0.12	0.22	12	82	
10/12/1993	XX	GW227X068	0.05 U	5 U	2	2	27	0.05	0.43	12	75	
1/11/1994	XX	GW227X074	F	F	F	F	F	F	F	F	F	
5/21/1996	XX	GW227X09D	0.1 U	6 U	1 U	1 U	2 U	0.05	0.16	12	71	
11/25/1996	XX	GW227X0AA			1 U	1 U	4 U			9	83	
3/24/1997	XX	MW-227813-35513			F	F	F			F	F	
6/3/1997	XX	MW-227814-35584			1 U	1 U	2 U			7	71.8	
9/9/1997	XX	MW-227815-35682			1 U	1 U	2 U			13	75.5	
12/4/1997	XX	MW-227816-35768			1 U	1 U	2 U			8	78.8	
3/25/1998	XX	MW-227817-35719			2	2	2 U			12.2	78	
6/8/1998	XX	MW-227818-35954			1.1	1.1	2 U			11.2	71.4	
9/9/1998	XX	MW-227819-36047			1.7	1.7	2 U			12.4	79.2	
12/15/1998	XX	MW-227820-36144			1.2	1.2	4 U			11.6	81.4	
3/29/1999	XX	MW-227821-36248			1.4	1.4	4			10.4	70.6	
6/8/1999	XX	MW-227822-36319			1.2	1.2	15 U			8.5	68.9	
9/13/1999	XX	MW-227823-36416			1.1	1.1	15 U			8.7	64.3	
12/1/1999	XX	MW-227824-36465			10 U	10 U	10 U			14	78	
3/27/2000	XX	MW-227825-36612			10 U	10 U	10 U			13	87	
6/12/2000	XX	MW-227826-36688			10 U	10 U	10 U			11	82	
9/12/2000	XX	MW-227827-36781			10 U	10 U	10 U			12	82	
12/11/2000	XX	MW-227828-36871			10 U	10 U	10 U			12	78	

SUMMARY REPORT  
 Inorganics (part 1 of 2)

(MW-227)		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
3/12/2001	XX				10 U	10 U			12	78	
6/18/2001	XX				10 U	10			13	79	
9/10/2001	XX				10 U	10 U			14	84	
12/12/2001	XX				10 U	10 U			14	77	
3/14/2002	XX				10 U	10 U			13	82	
6/17/2002	XX				10 U	10 U			13	83	
9/18/2002	XX				2 U	2 U			12	87	
12/9/2002	XX				2 U	10 U			12	82	
3/25/2003	XX				2 U	10 U			12	81	
6/25/2003	XX				2 U	10 U			13	82	
9/18/2003	XX				2 U	10 U			12	55	
5/5/2004	XX	0.1 U	89		1.1	3 U	0.1 U		9.2		
7/26/2004	XX	0.1 U	78		1.6	3 U	0.1 U		10.5		
10/26/2004	XX	0.1 U	81		1.7	3 U	0.1 U		9.6		
5/9/2005	XX	0.1 U	81		1.5	3 U	0.1 U		10.5		
7/27/2005	XX	0.1 U	79		1.7	3 U	0.1 U		8.3		
9/21/2005	XX	0.1 U	79		1.8	3 U	0.1 U		9.3		
5/24/2006	XX	0.1 U	81		2	3 U	0.1 J		12.8		
7/26/2006	XX	0.1 U	76		1.6	5 J	0.1 U		9.7		
9/13/2006	XX	0.1 U	84		1.4	3 J	0.1 U		9.2		
5/15/2007	XX	0.1 U	79		1.7	3 U	0.1 U		8.8		
7/24/2007	XX	0.1 U	75		2.4	6 J	0.1 U		9.9		
9/11/2007	XX	0.1 U	77		2.6	5 J	0.1 U		10.5		
5/20/2008	XX	0.1 U	80		1.5	3 U	0.1 J		11		
7/30/2008	XX	0.1 U	82		1.5	3 J	0.2 J		11.3		
10/27/2008	XX	0.1 U	75		1.3	3 U	0.1 U		14.4		
4/14/2009	XX	0.1 U	80		3	3 U	0.1 U		8.9		
7/7/2009	XX	0.1 U	75		2	3 U	0.1 U		10.4		
10/27/2009	XX	0.1 U	80		2.3	3 U	0.1 U		9.2		
4/27/2010	XX	0.1 U	81		22.9	3 U	0.1 J		1.6 J		
7/20/2010	XX	0.1 J	79		1.1	3 U	0.1 U		8.6		
10/19/2010	XX	0.1 U	77		1.7	3 U	0.1 U		8.1		
4/26/2011	XX	0.1 U	76		1.1	3 U	0.1 U		7.5		
7/19/2011	XX	0.1 U	80		1	3 U	0.1 U		9.7		
10/25/2011	XX	0.1 U	78		2.2	3 U	0.1 U		11.2		
4/24/2012	XX	0.5 U	79		1.6	10 U	0.3 U		12		
7/24/2012	XX	0.5 U	75		1 U	10 U	0.3 U		13.4		
10/23/2012	XX	0.5 U	78		2.6	10 U	0.3 U		11.2		

MW-301

11/25/1996	XD				1 U	4 U			5	64	
11/25/1996	XX				1 U	4 U			7	66.8	
3/24/1997	XX				F	F			F	F	
6/3/1997	XX				1 U	2 U			6	60.2	
9/9/1997	XX				1 U	2 U			8	63.5	
12/3/1997	XX				1 U	2 U			5	55.6	
3/23/1998	XX				1.9	2 U			8.3	58.9	
6/8/1998	XX				1.2	2 U			8	59.7	
9/9/1998	XX				1.8	2 U			8.7	65.1	
12/14/1998	XX				1.2	4 U			7.3	59	

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Inorganics (part 1 of 2)

Page 20 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-301)		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
3/29/1999	XX				1.3	4			7.4	52.7	
6/8/1999	XX				1.5	4			7.5	54.4	
9/13/1999	XX				2.3	15 U			4.9	50.2	
12/1/1999	XX				1.2	15 U			6.4	64.7	
3/27/2000	XX				10 U	10 U			7.7	70	
6/12/2000	XX				10 U	10 U			9.5	68	
9/12/2000	XX				10 U	10			8.4	66	
6/18/2001	XX				10 U	10 U			10	71	
9/10/2001	XX				10 U	10 U			10	71	
12/1/2001	XX				10 U	10 U			11	65	
3/13/2002	XX				10 U	10 U			10	73	
6/17/2002	XX				10 U	10 U			12	66	
9/18/2002	XX				2 U	10 U			9.8	67	
3/25/2003	XX				2 U	10 U			9.7	68	
6/25/2003	XX				2 U	10 U			12	66	
9/17/2003	XX				2 U	10 U			12	57	
9/17/2003	XX				2 U	10 U			11	61	
5/5/2004	XD	0.1 U	79		1.4	3 U	0.1 U		0.1 U		
5/5/2004	XX	0.1 U	87		1.3	3 U	0.1 U		9		
7/26/2004	XX	0.1 U	76		1.8	3 U	0.1 U		11.7		
10/25/2004	XX	0.1 U	76		1.8	3 U	0.1 U		11		
5/9/2005	XX	0.1 U	75		1.8	3 U	0.1 U		12.2		
8/1/2005	XX	0.1 U	76		1.9	3 U	0.1 U		8		
9/22/2005	XX	0.1 U	75		2	3 U	0.1 U		10.9		
5/22/2006	XX	0.1 U	78		3.4	3 U	0.1 U		14.3		
7/24/2006	XX	0.1 U	76		1.5	3 U	0.1 U		11.5		
9/11/2006	XX	0.1 U	77		1.5	3 U	0.1 U		11.5		
5/14/2007	XX	0.1 U	73		1.7	3 U	0.1 U		9.8		
7/23/2007	XX	0.1 U	72		2	9 J	0.1 U		11.8		
9/10/2007	XX	0.1 U	74		1.8	3 J	0.1 U		14.1		
5/19/2008	XX	0.1 U	75		1.2	3 U	0.1 U		14.4		
7/30/2008	XX	0.1 U	75		1.7	3 J	0.1 J		14.8		
10/28/2008	XX	0.1 U	75		1.1	3 J	0.1 U		14.8		
4/15/2009	XX	0.1 U	91		6	12	0.7		14.4		
7/7/2009	XX	0.1 U	76		1.9	4 J	0.1 U		13.6		
10/26/2009	XX	0.1 U	82		1.9	3 U	0.1 U		12.5		
4/26/2010	XX	0.1 U	72		2.6	3 U	0.1 U		12.4		
7/19/2010	XX	0.1 U	73		1.4	3 U	0.1 U		11.7		
10/19/2010	XX	0.1 U	76		1.5	3 U	0.1 U		12.3		
4/27/2011	XX	0.1 U	76		1.3	3 U	0.1 U		10.3		
7/20/2011	XX	0.1 U	73		1.4	3 U	0.1 U		11.7		
10/26/2011	XX	0.1 U	72		1.9	3 J	0.1 U		11.3		
4/25/2012	XX	0.5 U	76		2.3	10 U	0.3 U		15		
7/25/2012	XX	0.5 U	74		2.3	10 U	0.3 U		14.3		
10/24/2012	XX	0.5 U	77		2.3	10 U	0.3 U		15.1		
10/24/2012	XD	0.5 U	75		2.3	10 U	0.3 U		15.2		

MW-302

6/23/1992	XX	0.05 U		3 U	1	10	0.05 U	0.38	12	71	
8/17/1992	XD	0.05 U		6 U	1 U	13	0.06	0.11	6	73	

**SUMMARY REPORT**  
**Inorganics (part 1 of 2)**

<b>(MW-302)</b>		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
Date	Type	Sample ID									
8/17/1992	XX	GW302X032	0.05 U	9	1	10	0.05 U	0.11	6	72	
1/26/1993	XX	GW302X03H	0.05 U	7 U	1	23	0.09	0.03	4	76	0.04 J
7/27/1993	XX	GW302X048	0.05 U	5 U	2	5 U	0.07	0.06	5	87	
4/21/1993	XX	GW302X05F	0.19	5 U	2	11	0.05 U	0.03	6	78	
10/12/1993	XX	GW302X069	0.06	5 U	2	13	0.08	0.04	5	78	
1/11/1994	XX	GW302X075	0.05	5 U	2	5 U	0.14	0.25	5	100	
5/21/1996	XX	GW302X09E	!	!	!	!	!	!	!	!	!
11/26/1996	XX	GW302X0AB			1 U	4 U			6	135	
3/26/1997	XX	MW-302827-35515			1 U	2 U			5 U	116	
6/3/1997	XX	MW-302828-35584			1 U	2 U			5 U	119.2	
9/10/1997	XX	MW-302829-35683			1 U	2 U			7	160	
12/4/1997	XX	MW-302830-35768			1 U	2 U			5	188	
3/25/1998	XX	MW-302831-35879			4	2 U			5.7	130	
6/8/1998	XX	MW-302832-35954			2.8	2 U			5.5	134	
9/9/1998	XX	MW-302833-36047			3	2 U			7.8	136	
12/15/1998	XX	MW-302834-36144			2.4	4 U			6.5	173	
3/30/1999	XX	MW-302835-36249			2.2	15 U			5.6	121	
6/9/1999	XX	MW-302836-36320			2.6	8			5.2	135	
9/13/1999	XX	MW-302837-36416			2.1	15 U			4.7	160	
12/1/1999	XX	MW-302838-36485			2.4	15 U			5.4	178	
3/27/2000	XX	MW-302839-36612			10 U	10 U			10	190	
6/13/2000	XX	MW-302840-36690			10 U	10 U			9.1	140	
9/12/2000	XX	MW-302841-36781			10 U	10 U			6	190	
12/11/2000	XX	MW-302842-36871			10 U	10 U			10	210	
3/12/2001	XX	MW-302843-36962			10 U	10 U			9	150	
6/18/2001	XX	MW-302844-37060			10 U	10 U			7	160	
9/10/2001	XX	MW-302845-37144			10 U	10 U			9.1	180	
12/1/2001	XX	MW-302846-37236			10 U	10 U			10	200	
3/13/2002	XX	MW-302847-37328			10 U	10 U			11	160	
6/17/2002	XX	MW-302848-37424			10 U	10 U			11	180	
9/18/2002	XX	MW-302849-37517			5.5	10 U			11	190	
12/9/2002	XX	MW-302850-37599			6	10 U			12	190	
3/25/2003	XX	MW-302851-37705			5.4	10 U			9.1	170	
6/25/2003	XX	MW-302852-37797			11	10 U			12	170	
9/17/2003	XX	MW-302853-37881			9.8	11			12	180	
5/6/2004	XX	GW302X009	0.1 U	6 U	6.1	3 U	0.2 J		8.7	148	0.03 J
7/27/2004	XX	GW302XHD1	0.1 U	6 U	5.7	3 U	0.3		10.1	161	0.04 J
10/25/2004	XX	GW302X07C	0.1 U	149	5.6	3 U	0.5		10.3		
5/10/2005	XX	GW302X13D	0.1 U	139	14.3	3 U	0.4		10.2		
7/27/2005	XX	GW302X171	0.1 U	121	12.9	3 U	0.4		7		
9/19/2005	XX	GW302X19J	0.1 U	159	14.6	3 U	0.5		9.4		
5/23/2006	XX	GW302X1EE	0.1 U	112	18.4	3 U	0.6		11.7		
7/24/2006	XX	GW302X1HB	0.1 U	110	26.6	3 U	0.2 J		8.5		
9/12/2006	XX	GW302X204	0.1 U	115	34.4	3 U	0.1 J		9.5		
5/14/2007	XX	GW302X23B	0.1 U	100	19.3	3 U	0.1 J		7.2		
7/25/2007	XX	GW302X27F	0.1 U	100	18	9 U	0.1 U		9.5		
9/10/2007	XX	GW302X2A5	DE	DE	DE	DE	DE		DE		
<b>MW-302R</b>											
5/20/2008	XX	GW302X2DJ	0.1 U	66	26.2	3 U	0.2 J		7		

**SUMMARY REPORT**  
**Inorganics (part 1 of 2)**

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

<b>(MW-302R)</b>		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
7/29/2008	XX	GW302X2H3	75		22.2	3 J	0.3		9		
10/27/2008	XX	GW302X2JD	91		22.5	3 U	0.2 J		10.5		
4/13/2009	XX	GW302X3S1	44		20.8	5 J	0.3		5.6		
7/6/2009	XX	GW302X375	46		25.4	3 J	0.1 U		8.8		
10/27/2009	XX	GW302X3F0	116		55.9	3 J	0.7		22.9		
4/26/2010	XX	GW302X3JJ	46		12.8	3 U	0.1 J		6.9		
7/19/2010	XX	GW302X433	106		56.1	3 U	1.4		18		
10/18/2010	XX	GW302X467	96		60.8	3 U	1.6		21.7		
4/25/2011	XX	GW302X4A8	44		51.2	3 U	0.2 J		8.9		
7/18/2011	XX	GW302X4E6	58		61.5	3 U	0.2 J		13.3		
10/24/2011	XX	GW302X4H1	80		49.3	3 U	0.4		15.8		
4/23/2012	XX	GW302X52B	51		28.2	10 U	0.3 U		10.8		
7/23/2012	XX	GW302X57A	57		52.4	10 U	0.3 U		21.1		
10/22/2012	XX	GW302X5E1	78		66.1	10 U	0.8		28.8		

**MW-303**

11/26/1996	XX	GW303X0B1			1 U	8 U			5 U	15.5	
3/26/1997	XX	MW-303828-35515			1 U	2 U			5 U	15.3	
6/2/1997	XX	MW-303829-35583			1 U	2 U			5 U	15.6	
9/8/1997	XX	MW-303830-35681			1 U	2 U			5 U	14.9	
12/3/1997	XX	MW-303831-35767			1 U	2 U			7	16.8	
3/25/1998	XX	MW-303832-35979			2	2 U			2.4	18.7	
6/9/1998	XX	MW-303833-35955			1.4	2 U			2.2	18.1	
9/8/1998	XX	MW-303834-36046			1.8	2 U			2.2	18.6	
12/14/1998	XX	MW-303835-36143			1.4	4 U			2	18.3	
3/29/1999	XX	MW-303836-36248			1.6	15 U			1.9	13.5	
6/8/1999	XX	MW-303837-36319			2.2	10			1.9	17.4	
9/13/1999	XX	MW-303838-36416			1.5	15 U			1.4	13.2	
12/1/1999	XX	MW-303839-36485			1.7	15 U			1.3	20.5	
3/27/2000	XX	MW-303840-36612			10 U	10 U			10	21	
6/12/2000	XX	MW-303841-36689			10 U	10 U			3.1	21	
9/13/2000	XX	MW-303842-36782			10 U	10 U			1.8	20	
12/1/2000	XX	MW-303843-36871			10 U	10 U			3.5	22	
3/13/2001	XX	MW-303844-36963			10 U	10 U			2	23	
6/19/2001	XX	MW-303845-37061			10 U	10 U			2	21	
9/11/2001	XX	MW-303846-37145			10 U	10 U			1.8	28	
12/12/2001	XX	MW-303847-37237			10 U	10 U			1.1	18	
3/13/2002	XX	MW-303848-37328			10 U	10 U			1.9	24	
6/17/2002	XX	MW-303849-37424			10 U	10 U			5.1	23	
9/18/2002	XX	MW-303850-37517			2 U	10 U			2.1	20	
12/9/2002	XX	MW-303851-37599			2.6	10 U			2.1	24	
3/26/2003	XX	MW-303852-37706			2.4	10 U			2.5	22	
6/25/2003	XX	MW-303853-37797			2 U	10 U			1.3	21	
9/17/2003	XX	MW-303854-37881			2 U	10 U			1.6	18	
5/6/2004	XX	GW303X00C	23	6 U	1.9	3 U	0.1 U		1	20	0.03 U
7/28/2004	XX	GW303X040	24	6 U	2	3 J	0.1 U		1.9	16.1	0.03 U
10/26/2004	XX	GW303X07G	23		2.1	3 U	0.1 U		1.6		
10/26/2004	XD	GWDF3X06J	24		1.5	3 U	0.2 J		1.1		
5/11/2005	XX	GW303X13H	25		1.6	3 U	0.1 J		2.6		
8/1/2005	XX	GW303X175	24		1.8	3 U	0.1 U		1.4 J		

**SUMMARY REPORT**  
**Inorganics (part 1 of 2)**

(MW-303)		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
8/1/2005	XD	GWDP1X15H	24		1.8	3 U	0.1 U		1 J		
9/19/2005	XX	GW303X1A3	25		2.1	3 U	0.1 U		1.7 J		
5/23/2006	XX	GW303X1E1	25		2.8	4 J	0.1 J		2		
7/24/2006	XD	GWDP4X1H4	23		1.5	3 U	0.1 J		1.6 J		
7/24/2006	XX	GW303X1HF	24		1.5	3 U	0.1 J		1.6 J		
9/12/2006	XX	GW303X208	24		1.6	3 U	0.1 U		1.8 J		
5/14/2007	XX	GW303X23F	26		1.6	3 U	0.1 U		1.5 J		
7/25/2007	XD	GWDP4X278	24		2.5	13	0.1 U		1.9 J		
7/25/2007	XX	GW303X27J	22		2.4	6 J	0.1 U		1.9 J		
9/11/2007	XX	GW303X2A9	28		2.8	3 U	0.1 U		1 J		
9/11/2007	XX	GWDP1X281	27		2.5	13	0.1 U		1 J		
5/19/2008	XX	GW303X2E3	41		1.3	3 U	0.1 U		1.7 J		
7/29/2008	XD	GWDP4X2G6	50		1.7	3 J	0.2 J		2		
7/29/2008	XX	GW303X2H7	49		1.7	4 J	0.1 J		2.2		
10/27/2008	XD	GWDP3X2J0	52		1.6	3 U	0.1 U		1.8 J		
4/13/2009	XX	GW303X335	72		3.2	6 J	0.2 J		2.1		
7/6/2009	XX	GW303X379	86		4.1	3 U	0.1 U		1.8 J		
7/6/2009	XD	GWDP3X38C	87		4.3	3 U	0.1 U		1.8 J		
10/28/2009	XX	GW303X3F4	77		3.7	3 U	0.1 U		1.3 J		
4/26/2010	XX	GW303X403	89		8.3	3 U	0.1 U		1.5 J		
7/19/2010	XD	GWDP4X42G	92		4.6	3 U	0.1 U		1.2 J		
7/19/2010	XX	GW303X437	91		4.5	3 U	0.1 U		1.2 J		
10/18/2010	XX	GW303X46B	82		3.5	3 U	0.1 U		0.8 J		
4/25/2011	XX	GW303X4AC	96		6.8	3 U	0.1 U		1.9 J		
7/18/2011	XD	GWDP4X4DJ	101		5.3	3 U	0.1 U		0.8 J		
7/18/2011	XX	GW303X4EA	101		5.8	3 U	0.1 U		0.9 J		
10/24/2011	XX	GW303X4I5	105		5.9	3 U	0.1 U		1.1 J		
10/24/2011	XD	GWDP4X4HE	106		5.9	3 U	0.1 U		1.1 J		
4/23/2012	XX	GW303X52F	113		7.5	10 U	0.3 U		2.1		
7/24/2012	XX	GW303X57E									
<b>MW12-303R</b>											
10/23/2012	XX	GW303X5EG	92		4.9	10 U	0.3 U		4.2		
<b>MW-304A</b>											
7/29/2004	XX	GW304AHD0	77	6 U	2.3	4 J	0.1 U		5	59.7	
10/27/2004	XX	GW304A07B	92	6 U	2	4 J	0.1 U		4.3	68.4	
5/11/2005	XX	GW304A13C	37		1	3 U	0.1 U		1.5 J		
7/28/2005	XX	GW304A170	39		1.8	3 U	0.1 U		2.2		
9/19/2005	XX	GW304A19I	54		2.1	3 U	0.1 U		4		
5/24/2006	XX	GW304A1ED	54		1.3	3 U	0.1 J		4.7		
7/25/2006	XX	GW304A1HA	48		1.6	5 J	0.1 J		2.9		
9/12/2006	XX	GW304A203	54		1.6	3 U	0.1 U		2.8		
5/15/2007	XX	GW304A23A	48		2	10	0.1 J		3		
7/24/2007	XX	GW304A27E	55		2.5	8 J	0.2 J		3.9		
9/11/2007	XX	GW304A244	49		2.6	7 J	0.1 J		3		
5/20/2008	XX	GW304A2DI	39		1.7	3 J	0.2 J		2.7		
7/29/2008	XX	GW304A2H2	53		1.7	3 J	0.2 J		4.3		
10/27/2008	XX	GW304A2JC	60		2.5	3 U	0.1 J		8.8		

SUMMARY REPORT  
 Inorganics (part 1 of 2)

(MW-304A)	Date	Type	Sample ID	Ammonia (N) mg/L	Bicarbonate (CaCO3) mg/L	Biochemical Oxygen Demand mg/L	Chloride mg/L	Chemical Oxygen Demand mg/L	Nitrate (N) mg/L	Phosphate Phosphorus mg/L	Sulfate mg/L	Ca-mg Hardness (CaCO3) mg/L	Bromide mg/L
XX	4/13/2009	XX	GW304A330	0.1 U	43		2	3 U	0.2 J		3.2		
XX	7/16/2009	XX	GW304A374	0.1 U	49		2.1	3 U	0.1 J		3.4		
XX	10/27/2009	XX	GW304A3EJ	0.1 U	51		3.3	3 U	0.1 U		2.7		
XX	4/26/2010	XX	GW304A3J	0.1 U	41		3.5	3 U	0.1 U		2.6		
XX	7/19/2010	XX	GW304A432	0.1 U	49		3.2	3 U	0.1 U		2.5		
XX	10/18/2010	XX	GW304A466	0.1 J	45		2.3	3 U	0.1 U		2.4		
XX	4/25/2011	XX	GW304A4A7	0.1 U	37		2.1	3 U	0.1 U		1.6 J		
XX	7/18/2011	XX	GW304A4E5	0.1 U	44		3	3 U	0.1 U		3.1		
XX	10/24/2011	XX	GW304A4I0	0.1 U	46		3.3	3 U	0.1 U		3.5		
XX	4/23/2012	XX	GW304A52A	0.5 U	56		3	10 U	0.3 U		5.7		
XX	7/23/2012	XX	GW304A579	0.5 U	55		1.9	10 U	0.3 U		2.4		
XX	10/22/2012	XX	GW304A5E0	0.5 U	43		1.8	10 U	0.3 U		2 U		

**MW-401A**

XX	7/29/2004	XX	GW401A059	0.1 U	64	6 U	1.6	4 J	0.1 U	0.04	3	48.9	
XX	10/27/2004	XX	GW401A071	0.1 U	58	6 U	1.8	6 J	0.1 U	0.08	2.7	47.7	
XD	10/27/2004	XD	GWDP4X075	0.1 U	62	6 U	1.8	3 U	0.2 J	0.08	2.7	47.7	
XX	5/10/2005	XX	GW401A132	0.1 U	53		1.8	3 U	0.1 U		2.5		
XX	7/28/2005	XX	GW401A16A	0.1 U	59		1.8	3 U	0.1 U		2.4		
XD	7/28/2005	XD	GWDP4X16E	0.1 U	58		1.7	3 U	0.1 U		2		
XX	9/21/2005	XX	GW401A198	0.1 U	51		1.8	3 U	0.1 U		2.6		
XX	5/23/2006	XX	GW401A1E3	0.1 U	60		3.2	3 U	0.1 U		3.3		
XX	7/25/2006	XX	GW401A1H0	0.1 U	55		1.6	3 U	0.1 U		2.6		
XX	9/12/2006	XX	GW401A1J0	0.1 U	59		1.6	3 U	0.1 U		2.6		
XX	5/14/2007	XX	GW401A230	0.1 U	57		1.5	3 U	0.1 U		2.3		
XX	7/24/2007	XX	GW401A274	0.1 U	55		2.4	6 J	0.1 U		3.3		
XX	9/11/2007	XX	GW401A29E	0.1 U	51		2.7	3 J	0.1 U		3.1		
XX	5/20/2008	XX	GW401A2D8	0.1 U	54		1.6	9 J	0.2 J		3.5		
XX	7/28/2008	XX	GW401A2GC	0.1 U	58		1.8	3 J	0.1 J		4.7		
XX	10/27/2008	XX	GW401A2J2	0.1 U	56		1.5	3 U	0.1 U		3.4		
XX	4/13/2009	XX	GW401A32A	0.1 U	52		1.6	3 U	0.2 J		3.2		
XX	7/7/2009	XX	GW401A36E	0.1 U	57		1.7	3 U	0.1 U		3.5		
XX	10/28/2009	XX	GW401A3E9	0.1 U	58		1.8	3 U	0.1 U		2.8		
XX	4/27/2010	XX	GW401A3J8	0.1 J	57		2.4	3 U	0.1 U		3		
XX	7/20/2010	XX	GW401A42C	0.1 U	60		1	3 U	0.1 U		2.6		
XX	10/20/2010	XX	GW401A45G	0.1 U	56		1.5	3 U	0.1 U		2.2		
XX	4/25/2011	XX	GW401A48H	0.1 U	58		1.1	3 U	0.1 U		2.1		
XX	7/18/2011	XX	GW401A4DF	0.1 U	56		1.3	3 U	0.1 U		2.4		
XX	10/24/2011	XX	GW401A4HA	0.2 J	58		2	3 U	0.1 U		2.7		
XX	4/23/2012	XX	GW401A520	0.5 U	56		1.9	10 U	0.3 U		4.4		
XX	7/23/2012	XX	GW401A56J	0.5 U	57		1.2	10 U	0.3 U		4.2		
XX	10/22/2012	XX	GW401A5DA	0.5 U	55		1.2	10 U	0.3		2 U		

**MW-401B**

XD	7/29/2004	XD	GWDP4X05D	0.1 U	217	6 U	36.7	11	0.1 U	0.01 J	25.1	261	
XX	7/29/2004	XX	GW401B05A	0.1 U	217	6 U	36.4	11	0.1 U	0.01 J	24.7	261	
XX	10/27/2004	XX	GW401B072	0.1 U	245	6 U	38.8	17	0.1 U	0.02 J	52.4	324	
XD	5/10/2005	XD	GWDP4X136	0.1 U	205		32.9	8 J	0.1 U		41.5		
XX	5/10/2005	XX	GW401B133	0.1 U	211		31.9	8 J	0.1 U		36.4		
XX	7/27/2005	XX	GW401B16B	0.1 U	218		9.7	8 J	0.1 U		44.7		

**SUMMARY REPORT**  
**Inorganics (part 1 of 2)**

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
			mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
9/21/2005	XX	GW401B189	0.1 U	229		40.5	6 J	0.1 U		69.2		
9/21/2005	XD	GWDP4X19C	0.1 U	233		38.9	6 J	0.1 U		70.9		
5/23/2006	XX	GW401B1E4	0.1 U	192		20.4	8 J	0.1 U		40.5		
5/23/2006	XD	GWDP4X1E7	0.1 U	195		18.1	5 J	0.1 U		40.1		
7/25/2006	XX	GW401B1H1	0.1 U	192		18.6	3 J	0.1 U		32.6		
9/12/2006	XD	GWDP3X1J8	0.1 U	194		19.8	3 U	0.1 U		32.8		
9/12/2006	XX	GW401B1J6	0.1 U	196		19.3	4 J	0.1 U		32.3		
5/14/2007	XD	GWDP4X234	0.1 U	152		9.1	4 J	0.1 U		17.2		
5/14/2007	XX	GW401B231	0.1 U	152		9.4	5 J	0.1 U		17.4		
7/24/2007	XX	GW401B275	0.1 U	156		21.2	4 J	0.1 U		28.3		
9/11/2007	XD	GWDP4X29I	0.1 U	166		19.9	3 J	0.1 U		36.6		
9/11/2007	XX	GW401B29F	0.1 U	177		19.9	6 J	0.1 U		36.5		
5/20/2008	XX	GW401B2D9	0.1 U	130		18.4	3 U	0.1 U		15.8		
5/20/2008	XD	GWDP4X2DC	0.1 U	130		19.3	3 J	0.1 U		16.1		
7/28/2008	XX	GW401B2GD	0.1 U	143		30	4 J	0.1 U		20.9		
10/27/2008	XD	GWDP4X2J6	0.1 U	153		22.6	3 U	0.1 U		22.4		
4/13/2009	XD	GWDP4X32E	0.1 U	119		22.6	3 U	0.1 U		22.2		
4/13/2009	XX	GW401B32B	0.1 U	118		10.4	6 J	0.2 J		12.2		
7/7/2009	XX	GW401B36F	0.1 U	121		9.2	5 J	0.2 J		11.3		
10/28/2009	XD	GWDP3X3E7	0.1 U	145		11.6	3 U	0.1 U		12.9		
4/27/2010	XX	GW401B3J9	0.1 U	116		12.6	3 U	0.1 U		17		
4/27/2010	XD	GWDP4X3JC	0.1 U	121		8	4 J	0.1 U		10.6		
7/20/2010	XX	GW401B42D	0.1 U	137		8.4	5 J	0.1 U		11		
7/20/2010	XD	GWDP3X42A	0.1 U	136		10.8	3 U	0.1 U		12.5		
10/20/2010	XX	GW401B45H	0.1 U	132		11.5	4 J	0.1 U		12.8		
10/20/2010	XD	GWDP4X460	0.1 U	133		7.2	3 U	0.1 U		13.5		
4/25/2011	XD	GWDP4X4A1	0.1 U	119		6.2	3 U	0.1 U		13.6		
4/25/2011	XX	GW401B49I	0.1 U	116		7.1	3 U	0.1 U		7.8		
7/18/2011	XX	GW401B4DG	0.1 U	126		11.9	3 U	0.1 U		8		
7/18/2011	XD	GWDP1X4D2	0.1 U	122		11.3	3 U	0.1 U		10.6		
10/24/2011	XX	GW401B4HB	0.1 U	131		10.5	3 U	0.1 U		10.3		
4/23/2012	XX	GW401B52I	0.5 U	117		9.4	10 U	0.3 U		11		
4/23/2012	XD	GWDP4X524	0.5 U	116		9.8	10 U	0.3 U		11		
7/23/2012	XX	GW401B570	0.5 U	117		12	10 U	0.3 U		13.4		
10/22/2012	XX	GW401B5DB	0.5 U	133		10.7	10 U	0.3 U		12.5		
7/29/2004	XX	GW402A05B	0.1 J	54	6 U	1.6	4 J	0.1 U	0.05	4.3	36.9	
10/27/2004	XX	GW402A073	0.1 U	53	6 U	1.7	4 J	0.1 U	0.05	3.7	37.3	
5/11/2005	XX	GW402A134	0.1 U	52		1.8	3 U	0.1 U		3.5		
8/1/2005	XX	GW402A16C	0.1 U	55		1.8	3 U	0.1 U		3		
9/21/2005	XX	GW402A19A	0.1 U	48		1.9	3 U	0.1 U		3.5		
5/23/2006	XX	GW402A1E5	0.1 U	53		3	3 U	0.1 U		4.8		
7/26/2006	XX	GW402A1H2	0.1 U	51		1.4	5 J	0.1 U		4.6		
9/12/2006	XX	GW402A1JF	0.1 U	52		1.4	3 U	0.1 U		4.3		
5/15/2007	XX	GW402A232	0.1 U	52		1.6	3 U	0.1 U		4.4		
7/25/2007	XX	GW402A276	0.1 U	46		2.4	7 J	0.1 U		5.8		

**MW-402A**

7/29/2004	XX	GW402A05B	0.1 J	54	6 U	1.6	4 J	0.1 U	0.05	4.3	36.9	
10/27/2004	XX	GW402A073	0.1 U	53	6 U	1.7	4 J	0.1 U	0.05	3.7	37.3	
5/11/2005	XX	GW402A134	0.1 U	52		1.8	3 U	0.1 U		3.5		
8/1/2005	XX	GW402A16C	0.1 U	55		1.8	3 U	0.1 U		3		
9/21/2005	XX	GW402A19A	0.1 U	48		1.9	3 U	0.1 U		3.5		
5/23/2006	XX	GW402A1E5	0.1 U	53		3	3 U	0.1 U		4.8		
7/26/2006	XX	GW402A1H2	0.1 U	51		1.4	5 J	0.1 U		4.6		
9/12/2006	XX	GW402A1JF	0.1 U	52		1.4	3 U	0.1 U		4.3		
5/15/2007	XX	GW402A232	0.1 U	52		1.6	3 U	0.1 U		4.4		
7/25/2007	XX	GW402A276	0.1 U	46		2.4	7 J	0.1 U		5.8		

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Inorganics (part 1 of 2)**

Page 26 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

<b>(MW-402A)</b>		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
Date	Type	Sample ID									
9/12/2007	XX	GW402A29G	48		2.4	3 J	0.1 U		5.8		
5/20/2008	XX	GW402A2DA	56		1.6	3 U	0.1 J		6.1		
7/28/2008	XX	GW402A29E	53		1.5	3 U	0.1 U		7.4		
10/27/2008	XX	GW402A2J4	47		1.5	3 U	0.1 U		6.3		
4/14/2009	XX	GW402A32C	54		3.1	3 U	0.1 U		5		
7/8/2009	XX	GW402A36G	52		1.7	3 U	0.1 J		6		
10/28/2009	XX	GW402A3EB	54		1.7	4 J	0.1 U		5.3		
4/27/2010	XX	GW402A3JA	53		2.3	3 U	0.1 U		5.6		
7/21/2010	XX	GW402A42E	54		1.2	3 U	0.1 U		4.7		
10/20/2010	XX	GW402A45I	53		1.5	3 U	0.1 U		4.2		
4/27/2011	XX	GW402A4DH	51		1.2	3 U	0.1 U		4.1		
7/20/2011	XX	GW402A4HC	54		0.8 J	5 J	0.1 U		4.4		
10/26/2011	XX	GW402A452	52		2	10 U	0.3 U		7		
4/24/2012	XX	GW402A571	52		1.6	10 U	0.3 U		6.4		
7/25/2012	XX	GW402A571	51		2.3	10 U	0.3 U		7.3		
10/24/2012	XX	GW402A5DC	51								

<b>MW-402B</b>		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
Date	Type	Sample ID									
7/29/2004	XX	GW402B05C	69	6 U	1.8	4 J	0.1 U	0.04	8.4	62.6	
10/27/2004	XX	GW402B074	79	6 U	2	6 J	0.1 U	0.05	7.9	57.2	
5/11/2005	XX	GW402B135	68		1.7	3 U	0.1 U		8.6		
8/1/2005	XX	GW402B16D	71		1.9	3 U	0.1 U		5.6		
9/21/2005	XD	GWDF3X196	66		2	3 U	0.1 U		7.8		
9/21/2005	XX	GW402B19B	66		2.1	3 U	0.1 U		7.7		
5/23/2006	XX	GW402B1E6	67		2.9	3 U	0.1 U		8.9		
7/26/2006	XX	GW402B1H3	68		1.4	4 J	0.1 U		7.5		
9/12/2006	XX	GW402B1JG	69		1.5	3 U	0.1 U		7.8		
5/15/2007	XX	GW402B233	66		1.5	3 U	0.1 U		7.3		
7/25/2007	XX	GW402B277	63		3.1	6 J	0.1 U		8.6		
9/12/2007	XX	GW402B29H	65		2.8	3 U	0.1 U		9.1		
5/20/2008	XX	GW402B2DB	57		1.7	3 U	0.1 J		9		
7/28/2008	XX	GW402B2GF	34		2.2	3 U	0.1 U		44.9		
10/27/2008	XX	GW402B2J5	65		1.8	3 U	0.1 U		9.2		
4/14/2009	XX	GW402B32D	66		26.5	3 U	0.1 U		2.3		
7/8/2009	XX	GW402B39H	65		1.7	3 U	0.1 U		8.5		
10/28/2009	XX	GW402B3EC	70		1.8	3 U	0.1 U		7.3		
4/27/2010	XX	GW402B3JB	68		2.5	3 U	0.1 U		8		
7/21/2010	XX	GW402B42F	69		1	3 U	0.1 U		6.9		
10/20/2010	XX	GW402B45J	65		1.5	3 U	0.1 U		6.3		
4/27/2011	XX	GW402B4A0	68		1.1	3 U	0.1 U		6.6		
7/20/2011	XX	GW402B4DI	65		1.2	3 U	0.1 U		6.6		
10/26/2011	XX	GW402B4HD	69		1.1	3 U	0.1 U		6.3		
4/24/2012	XX	GW402B523	64		2.2	10 U	0.3 U		9		
7/25/2012	XX	GW402B572	68		1.9	10 U	0.3 U		9.9		
10/24/2012	XX	GW402B5DD	65		2.5	10 U	0.3 U		9.5		

<b>P-04-02</b>		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
Date	Type	Sample ID									
2/5/2004	XX	GWXXXX03E	178		7	28	0.1 U		16		
2/11/2004	XX	GWXXXX03C	116		3	30	0.3		29		
5/5/2004	XX	GWXXXX00E	121		1.8	3 U	0.1 U		21.2		

**SUMMARY REPORT**  
**Inorganics (part 1 of 2)**

Date	Type	Sample ID	Ammonia (N)		Biochemical Oxygen Demand		Chloride		Chemical Oxygen Demand		Nitrate (N)		Phosphate Phosphorus		Sulfate		Ca-mg Hardness (CaCO3)		Bromide		
			mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
7/26/2004	XX	GWXXXX042	0.1 U	111			2.2		3 U						19.5						
10/25/2004	XX	GWXXXX071	0.1 U	108			2		3 U						16						
5/9/2005	XX	GWXXXX13J	0.1 U	108			2		3 U						14.5						
7/27/2005	XX	GWXXXX177	0.1 U	107			1.9		4 J						11.9						
9/22/2005	XX	GWXXXX1A5	0.1 U	104			2.2		3 U						11.6						
5/22/2006	XX	GWXXXX1F0	0.1 U	95			3		3 U						14.5						
7/24/2006	XX	GWXXXX1HH	0.1 U	95			1.5		3 U						11						
9/11/2006	XX	GWXXXX20A	0.1 U	98			2		3 U						11.2						
5/14/2007	XX	GWXXXX23H	0.1 U	98			1.5		3 J						9.2						
7/23/2007	XX	GWXXXX281	0.1 U	91			2		4 J						11.6						
9/10/2007	XX	GWXXXX2AB	0.1 U	92			1.8		3 J						13.5						
5/21/2008	XX	GWXXXX2E5	0.1 U	96			2.1		3 U						12.6						
7/30/2008	XX	GWXXXX2H9	0.1 U	95			1.6		7 J						13.8						
10/29/2008	XX	GWXXXX2JJ	0.1 U	93			1.2		4 J						13.7						
4/13/2009	XX	GWXXXX337	0.1 U	93			1.6		3 J						11.4						
7/6/2009	XX	GWXXXX37B	0.1 U	93			1.6		3 U						13						
10/27/2009	XX	GWXXXX3F6	0.1 U	93			2		3 U						11.1						
4/26/2010	XX	GWXXXX405	0.1 J	95			3.1		3 J						11.2						
7/21/2010	XX	GWXXXX489	0.1 U	93			1		3 U						10.5						
10/20/2010	XX	GWXXXX48D	0.1 U	90			1.3		3 U						10.7						
4/27/2011	XX	GWXXXX4AE	0.1 U	90			1.1		3 U						8.9						
7/20/2011	XX	GWXXXX4EC	0.1 U	93			1.1		3 U						12.2						
10/26/2011	XX	GWXXXX4I7	I	I			I		I						I						
4/25/2012	XX	GWXXXX52H	0.5 U	63			8.8		19						11.3						
7/25/2012	XX	GWXXXX57G	0.5 U	94			7.8		10 U						25.2						
10/24/2012	XX	GWXXXX5E7	0.5 U	85			4.9		15						25.1						
<b>P-04-04</b>																					
2/5/2004	XX	GWXXXX03F	0.1 U	153			7.2		3 U						18.2						
2/11/2004	XX	GWXXXX03D	0.1 U	91			1.5		13						23.8						
5/6/2004	XX	GWXXXX00F	0.1 U	108			2		3 U						18.1						
7/26/2004	XX	GWXXXX043	0.1 U	101			1.9		3 U						15.1						
10/25/2004	XX	GWXXXX07J	0.1 U	97			2		3 U						11						
5/9/2005	XX	GWXXXX140	0.1 U	93			1.7		3 U						9.5						
7/27/2005	XX	GWXXXX178	0.1 U	86			1.8		3 U						6.2						
9/22/2005	XX	GWXXXX1A8	0.1 U	84			2		3 U						7.5						
5/22/2006	XX	GWXXXX1F1	0.1 U	84			2.9		3 U						8.9						
7/24/2006	XX	GWXXXX1HI	0.1 U	80			1.4		3 J						7.2						
9/11/2006	XX	GWXXXX20B	0.1 U	80			1.9		3 U						6.7						
5/14/2007	XX	GWXXXX23I	0.1 U	79			1.6		3 U						5.7						
7/23/2007	XX	GWXXXX282	0.1 U	73			2		5 J						7.1						
9/10/2007	XX	GWXXXX2AC	0.1 U	74			2.7		3 U						7.1						
5/21/2008	XX	GWXXXX2E6	0.1 U	80			1.7		3 U						8.3						
7/30/2008	XX	GWXXXX2HA	0.1 U	80			1.5		3 U						9.4						
10/29/2008	XX	GWXXXX300	0.2 J	78			1.1		3 U						8.5						
4/13/2009	XX	GWXXXX338	0.1 U	77			1.6		4 J						7.3						
7/6/2009	XX	GWXXXX37C	0.1 U	77			1.4		3 U						8.2						
10/27/2009	XX	GWXXXX3F7	0.1 U	80			1		3 U						6.7						
4/26/2010	XX	GWXXXX406	0.4 J	79			2.7		3 U						7.9						
7/21/2010	XX	GWXXXX49A	0.1 U	78			0.9 J		3 J						6.5						

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Inorganics (part 1 of 2)**

Page 28 of 34

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
			mg/L	mg/L	-mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
10/20/2010	XX	GWXXXX48E	0.1 U	72		1.4	3 U	0.1 U		5.9		
4/27/2011	XX	GWXXXX4AF	0.1 U	80		1	3 U	0.1 U		5.5		
7/20/2011	XX	GWXXXX4ED	0.1 U	76		1.1	3 U	0.1 J		9		
10/26/2011	XX	GWXXXX4I8	0.1 U	78		1.8	3 U	0.2 J		6.8		
4/25/2012	XX	GWXXXX52I	0.5 U	75		1.8	10 U	0.3 U		8.5		
7/25/2012	XX	GWXXXX57H	0.5 U	76		1.8	10 U	0.3 U		28.8		
10/24/2012	XX	GWXXXX5E8	0.5 U	78		2	10 U	0.3 U		8.1		

**PWS10-1**

4/26/2010	XX	GWPWS13J	1.1	74		14.6	33	0.1 U	0.14	1 J		
7/19/2010	XX	GWPWS1423	1.1	125		10.1	31	0.1 U	0.26	2.1		
10/18/2010	XX	GWPWS1457	0.1 U	100		10.6	29	0.1 U	0.05	10		
4/25/2011	XX	GWPWS1468	0.1 J	73		14.2	20	0.1 U	0.03 J	1.3 J		
7/18/2011	XX	GWPWS14D6	0.1 U	110		7.3	31	0.1 U	0.14	2.9		
10/24/2011	XX	GWPWS14H1	0.2 J	70		10.8	40	0.1 U	0.08	1.6 J		
4/23/2012	XX	GWPWS151B	0.5 U	63		8.4	26	0.3 U	0.04 U	6.3		
7/23/2012	XX	GWPWS156A	0.5 U	41		3.5	58	0.5	0.16	2 U		
10/22/2012	XX	GWPWS15D1	0.5 U	48		8.2	38	0.3 U	0.09	2.7		

**PWS10-2**

4/26/2010	XX	GWPWS23J0	0.2 J	16.3		9.5	19	0.1 U	0.02 J	3.1		
7/19/2010	XX	GWPWS2424	0.7	35		12.6	26	0.2 J	0.08	4.2		
10/18/2010	XX	GWPWS2458	0.1 J	16.4		5.7	40	0.1 U	0.03 J	6.9		
4/25/2011	XX	GWPWS2499	0.1 U	12.1		5.8	18	0.1 U	0.02 J	1.7 J		
7/18/2011	XX	GWPWS24D7	0.1 J	62		4.1	25	0.1 U	0.03 J	1.6 J		
10/24/2011	XX	GWPWS24H2	0.1 U	36		3.8	27	0.1 U	0.03 J	2.9		
4/23/2012	XX	GWPWS251C	0.5 U	10.6		8.3	33	0.3 U	0.04 U	7.7		
7/23/2012	XX	GWPWS256B	0.5 U	35		3.2	40	0.4	0.05	2 U		
10/22/2012	XX	GWPWS25D2	0.5 U	9.3		4.4	29	0.3 U	0.04 U	8.4		

**PWS10-3**

4/26/2010	XX	GWPWS33J1	0.1 U	87		2.5	11	0.1 U	0.05	3.3		
7/19/2010	XX	GWPWS3425	1.9	70		1.7	251	0.1 U	0.48	1.8 J		
10/18/2010	XX	GWPWS3459	0.1 U	12.5		7.7	105	0.1 U	0.22	4.6		
4/25/2011	XX	GWPWS349A	0.1 U	64		2.3	18	0.1 U	0.03 J	0.6 U		
7/18/2011	XX	GWPWS34D8	1.2	56		3.2	60	0.1 U	0.15	1.2 J		
10/24/2011	XX	GWPWS34H3	0.1 U	37		3.4	56	0.1 U	0.07	0.6 U		
4/23/2012	XX	GWPWS351D	0.5 U	16.4		4.5	25	0.4	0.06	6.3		
7/23/2012	XX	GWPWS356C	0.5 U	26		3	47	0.5	0.07	2 U		
10/22/2012	XX	GWPWS35D3	0.5 U	11.8		2.6	79	0.3 U	0.06	2 U		

**SW-1**

11/13/1990	XD	SW-1X033190	0.2 U	4		3.4	41	0.05 U	0.05 U	7.7	16	
11/13/1990	XX	SW-1X033190	0.4	2		3.8	33	0.05 U	0.05 U	2.3	15	
2/19/1991	XX	SW-1X033288	F	F		F	F	F	F	F	F	
6/4/1991	XX	SW-1X033393	0.1 U	1 U		3.2	27	0.05 U	0.02 U	1.3	27	
9/16/1991	XX	SW-1X033497	0.1 U	1 U		3.2	360	0.05 U	0.02 U	1.2	27	
12/18/1991	XX	SWXX1X00B	0.05 U	1.3		5	55	0.05 U	0.02 U	2.9	23	
3/2/1992	XX	SWXX1X019	F	F		F	F	F	F	F	F	
6/23/1992	XX	SWXX1X024	0.05 U	3 U		5	34	0.05 U	0.06	4	32	
8/17/1992	XX	SWXX1X033	0.2	2 U		6	43	0.05 U	0.34	4	66	

SUMMARY REPORT  
 Inorganics (part 1 of 2)

(SW-1)	Date	Type	Sample ID	Ammonia (N)	Bicarbonate	Biochemical	Chloride	Chemical	Nitrate (N)	Phosphate	Sulfate	Ca-mg	Bromide
				mg/L	(CaCO3) mg/L	Oxygen Demand mg/L	mg/L	Oxygen Demand mg/L	mg/L	Phosphorus mg/L	mg/L	Hardness (CaCO3) mg/L	mg/L
1/26/1993	XX	SWXX1X03J		0.19		6 U	11	33	0.05 U	0.03	3	34	
4/27/1993	XX	SWXX1X049		0.06		5 U	7	35	0.05 U	0.29	4	15	
7/21/1993	XX	SWXX1X051		1.5		5 U	4	35	0.05 U	0.1	2	38	
10/12/1993	XX	SWXX1X06A		0.07		5 U	6	33	0.05	0.02 U	3	24	
1/11/1994	XX	SWXX1X076		0.08		5 U	8	26	0.05 U	0.02 U	5	36	
5/21/1996	XX	SWXX1X09F		0.1 U		6 U	2 U	38	0.05 U	0.01 U	5 U	19.9	
11/25/1996	XX	SWXX1X0AH					1	40			5 U	25.2	
3/26/1997	XX	SW-1816-35515					F	F			F	F	
6/4/1997	XX	SW-1817-35585					2 U	44			5 U	29.7	
9/11/1997	XX	SW-1816-35684					1 U	44			5 U	34.3	
12/8/1997	XX	SW-1819-35772					5 U	44			5 U	27.8	
3/25/1998	XX	SW-1820-35879					2 U	25			5 U	20.6	
6/9/1998	XX	SW-1821-35955					3	27			5 U	32.9	
9/10/1998	XX	SW-1822-36048					11.1	38			2.1	35.3	
12/15/1998	XX	SW-1823-36144					9	45			2.8	28.6	
3/30/1999	XX	SW-1824-36249					5	19			2.1	11.2	
6/9/1999	XX	SW-1825-36320					2.6	46			1.6	28.3	
9/15/1999	XX	SW-1826-36418					3.6	42			1.8	33	
12/2/1999	XX	SW-1827-36496					5.7	37			1.9	38.6	
3/28/2000	XX	SW-1828-36613					10 U	22			17	19	
6/13/2000	XX	SW-1829-36690					10 U	33			3.7	40	
9/13/2000	XX	SW-1830-36762					11	45			0.8 U	32	
6/19/2001	XX	SW-1831-37081					10 U	45			1	36	
9/11/2001	XX	SW-1832-37145					10 U	40			1.6	44	
12/12/2001	XX	SW-1833-37237					10 U	44			4.6	28	
3/14/2002	XX	SW-1834-37329					10 U	22			3.7	20	
6/18/2002	XX	SW-1835-37425					12	40			3.8	26	
9/19/2002	XX	SW-1836-37518					11	140			2.1	35	
6/26/2003	XX	SW-1837-37596					13	100			1 U	64	
9/18/2003	XX	SW-1837-37682					20	61			1 U	44	
5/3/2004	XX	SWXX1X018		0.1 U		6 U	12.5	36	0.1 U	0.03 J	1.3	44	
7/27/2004	XX	SWXX1X04E		0.1 U		6 U	3.5	61	0.1 U	0.07	0.2 J		
10/26/2004	XX	SWXX1X069		0.1 U		6 U	5.4	42	0.1 U	0.03 J	1.2		
5/10/2005	XX	SWXX1X12A		0.1 U		13.9	7.5	28	0.1 U	0.02 J	0.6 J		
7/28/2005	XX	SWXX1X15I		0.1 U		22	4.9	229	0.1 U	0.11	0.6 U		
9/20/2005	XX	SWXX1X18G		0.1 U		6 U	3.1	33	0.1 U	0.26	6		
5/24/2006	XX	SWXX1X1DB		0.1 U		6 U	22.7	31	0.1 U	0.03 J	11.3		
7/26/2006	XX	SWXX1X16B		0.1 U		6 U	4.4	71	0.1 U	0.06	0.6 U		
7/26/2006	XD	SWDP2X1GE		0.1 U		23	4.1	64	0.1 U	0.07	0.6 U		
9/13/2006	XX	SWXX1X1J1		0.1 U		148	13.3	15	0.1 U	0.06	9.3		
5/15/2007	XD	SWDP2X2ZE		0.1 U		25	6.5	24	0.1 U	0.02 J	0.6 J		
5/15/2007	XX	SWXX1X228		0.1 U		6 U	6.5	24	0.1 U	0.06	0.6 J		
7/24/2007	XD	SWDP2X28I		0.1 U		31	8.7	44	0.1 U	0.05	0.6 U		
7/24/2007	XX	SWXX1X26C		0.1 U		30	8.4	43	0.1 U	0.04	0.6 U		
9/11/2007	XX	SWXX1X292		0.1 U		33	8.4	67	0.1 J	0.11	0.6 U		
5/21/2008	XD	SWDP2X2D2		0.1 U		28	9.4	26	0.1 J	0.07	1.2 J		
5/21/2008	XX	SWXX1X2CG		0.1 U		28	9.4	26	0.1 J	0.06	1.2 J		
7/29/2008	XX	SWXX1X2G0											
10/28/2008	XX	SWXX1X2IA		0.1 U		23	4.8	36	0.1 U	0.02 J	1.2 J		

SUMMARY REPORT  
 Inorganics (part 1 of 2)

(SW-1)	Date	Type	Sample ID	Ammonia (N) mg/L	Bicarbonate (CaCO3) mg/L	Biochemical Oxygen Demand mg/L	Chloride mg/L	Chemical Oxygen Demand mg/L	Nitrate (N) mg/L	Phosphate Phosphorus mg/L	Sulfate mg/L	Ca-mg Hardness (CaCO3) mg/L	Bromide mg/L
XX	4/14/2009	XX	SWXX1X311	0.1 U	20	4 U	11.6	20	0.1 U	0.01 U	2.2		
XX	7/7/2009	XX	SWXX1X362	0.2 U	17.2	5 U	4.7	45	0.1 U	0.03 J	0.9 J		
XX	10/27/2009	XX	SWXX1X3DH	0.1 U	10.6	5 U	6.3	36	0.1 U	0.02 J	2.2		
XX	4/28/2010	XX	SWXX1X3IG	0.1 U	23	2 U	8.9	29	0.1 U	0.02 J	1.4 J		
XX	7/20/2010	XX	SWXX1X420	0.6	126	3 U	8.5	752	0.1 U	0.81	3.5		
XX	10/19/2010	XX	SWXX1X454	0.1 U	11.6	5 U	7.3	55	0.1 U	0.02 J	4.4		
XX	4/26/2011	XX	SWXX1X485	0.1 U	16.7	3 U	6.8	22	0.1 U	0.02 J	1.6 J		
XX	7/19/2011	XX	SWXX1X4D3	0.1 J	107	4	6.9	48	0.1 U	0.21	2.6		
XX	10/25/2011	XX	SWXX1X461	0.1 U	19	4 U	5.8	37	0.1 U	0.02 J	2.4		
XX	4/24/2012	XX	SWXX1X518	0.5 U	13.9	5 U	9.3	33	0.3 U	0.04 U	3.6		
XX	7/24/2012	XX	SWXX1X567	0.5 U	40	4 U	3.8	50	0.3	0.11	2 U		
XX	10/23/2012	XX	SWXX1X5CI	0.5 U	35	2 U	6	29	0.3 U	0.04 U	5.6		
<b>SW-2</b>													
XX	11/13/1990	XX	SW-2XX33190	0.4		3	3.5	24	0.05 U	0.05 U	3.8	14	
XX	2/20/1991	XD	SW-2XD33289	0.5			6	41	0.05 U	0.64	2	26	
XX	2/20/1991	XX	SW-2XX33289	0.8			6	9.6	0.05 U	0.06	2	29	
XX	6/4/1991	XX	SW-2XX33393	0.1 U		1.7	3.4	34	0.05 U	0.02 U	1.2	21	
XX	9/17/1991	XX	SW-2XX33498	0.1		2.2	4	45	0.05 U	0.02 U	1 U	0.66 U	
XX	12/18/1991	XX	SWXX2X00C	0.05 U		3.8	3.2	38	0.05 U	0.02 U	2.8	17	
XD	3/2/1992	XD	SWXX2XHA0	0.05		6	5	70	0.13	0.21	7	31	
XX	3/2/1992	XX	SWXX2X01A	0.06		5	5	100	0.13	0.3	3	32	
XX	6/23/1992	XX	SWXX2X025	0.05 U		3	7	39	0.05 U	0.05	1 U	31	
XX	8/17/1992	XX	SWXX2X034	0.22		16	7	39	0.2	0.31	8	38	
XX	1/26/1993	XX	SWXX2X040	0.16		6 U	10	30	0.05 U	0.02 U	3	29	
XD	1/27/1993	XD	SWXX2XHA5	1.1		6 U	11	30	0.05 U	0.04	4	26	
XX	4/27/1993	XX	SWXX2X04A	0.08		5 U	7	35	2.1	0.12	4	15	
XX	7/21/1993	XX	SWXX2X052	0.47		5 U	4	43	0.05 U	0.05	2	35	
XX	10/13/1993	XX	SWXX2X06B	0.09		5 U	7	33	0.05 U	0.02	1	17	
XX	1/11/1994	XX	SWXX2X077	0.17		5 U	11	46	0.05 U	0.02 U	4	39	
XX	5/21/1996	XX	SWXX2X09G	0.1 U		6 U	2	50	0.05 U	0.04	5 U	14.4	
XD	11/25/1996	XD	SWDF2X0AG				1 U	45			5 U	20.7	
XX	11/25/1996	XX	SWXX2X0AI				2	40			5 U	20.4	
XX	3/26/1997	XX	SW-2818-35515				4	34			5 U	24	
XX	6/4/1997	XX	SW-2818-35585				2 U	39			5 U	25.1	
XX	9/11/1997	XX	SW-2820-35684				5 U	55			5 U	28.4	
XX	12/8/1997	XX	SW-2821-35772				5 U	62			5 U	27.6	
XX	3/25/1998	XX	SW-2822-35879				5 U	34			5 U	16.9	
XX	6/9/1998	XX	SW-2823-35955				5 U	37			5 U	22.9	
XX	9/10/1998	XX	SW-2824-36048				11.9	59			0.2 U	37.7	
XX	12/15/1998	XX	SW-2825-36144				5.2	56			1.1	23.4	
XX	3/30/1999	XX	SW-2826-36249				4.9	51			1.6	8.1	
XX	9/15/1999	XX	SW-2828-36418				3.3	54			0.4	25.2	
XX	12/2/1999	XX	SW-2828-36496				5.5	54			0.3	25.9	
XX	3/28/2000	XX	SW-2830-36613				10 U	20			0.4	21.5	
XX	6/13/2000	XX	SW-2831-36690				10	38			4.9	10 U	
XX	9/13/2000	XX	SW-2832-36782				10 U	42			1.2	22	
XX	12/12/2000	XX	SW-2833-36872				10 U	22			0.8 U	26	
XX	6/19/2001	XX	SW-2834-37061				10	45			1	10 U	
											0.8 U	22	

(SW-2)	Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	Sample ID	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
9/11/2001	XX	SW-2835-37145		10 U	54			0.8 U	32	
12/12/2001	XX	SW-2836-37237		10 U	32			0.8 U	18	
3/14/2002	XX	SW-2837-37329		10 U	28			2.5	15	
6/18/2002	XX	SW-2838-37425		12	45			0.8 U	19	
9/19/2002	XX	SW-2838-37518		14	44			0.8 U	31	
12/10/2002	XX	SW-2840-37600		13	52			2.1	27	
3/26/2003	XX	SW-2N37706		18	20			1.9	17	
6/26/2003	XX	SW-2N37788		17	58			1 U	28	
9/18/2003	XX	SW-2N37882		23	64			1 U	33	
5/3/2004	XX	SWXX2X019	22	16.4	39	0.1 U	0.03 J	0.1 U		
7/27/2004	XD	SWDP2X050	24	4.5	58	0.1 U	0.04	0.3 J		
7/27/2004	XX	SWXX2X04F	24	4.4	57	0.1 U	0.05	0.3 J		
10/26/2004	XX	SWXX2X06A	15.3	10.1	40	0.1 U	0.02 J	0.9		
5/10/2005	XX	SWXX2X12B	11	8.8	30	0.1 U	0.02 J	0.6 U		
5/10/2005	XD	SWDP2X12G	13.8	8.9	32	0.1 U	0.01 J	0.6 U		
7/28/2005	XX	SWXX2X15J	18.2	3.4	43	0.1 U	0.02 J	0.6 U		
9/20/2005	XX	SWXX2X18H	20	5.2	56	0.1 U	0.02 J	0.6 U		
5/24/2006	XD	SWDP2X1DH	14.3	10.3	37	0.1 U	0.01 J	0.6 J		
5/24/2006	XX	SWXX2X1DC	15.2	9.6	36	0.1 U	0.01 J	0.6 J		
7/26/2006	XX	SWXX2X1G9	14.1	3.2	74	0.1 U	0.07	0.6 U		
9/13/2006	XX	SWXX2X1J2	28	4.5	46	0.1 U	0.04	0.6 U		
9/13/2006	XD	SWDP2X1U7	28	4.5	42	0.1 U	0.03 J	0.6 U		
5/15/2007	XX	SWXX2X229	17.3	8.8	30	0.1 U	0.03 J	0.6 U		
7/24/2007	XX	SWXX2X26D	27	7.9	48	0.1 U	0.03 J	0.6 U		
9/11/2007	XD	SWDP2X298	30	6 U	50	0.1 J	0.01 J	0.6 U		
9/11/2007	XX	SWXX2X293	31	7.1	57	0.1 J	0.02 J	0.6 U		
5/21/2008	XX	SWXX2X2CH	18.1	9.6	21	0.1 J	0.04	1.1 J		
7/29/2008	XX	SWXX2X2G1	26	8.6	50	0.1 J	0.04	1 J		
10/28/2008	XD	SWDP2X2IG	15.8	4.1	34	0.1 U	0.27	1 J		
10/28/2008	XX	SWXX2X2IB	16.1	4	32	0.1 U	0.02 J	0.9 J		
4/14/2009	XX	SWXX2X31J	8.5	8.7	27	0.1 U	0.02 J	1.4 J		
7/7/2009	XD	SWDP2X368	13.5	4.9	46	0.1 U	0.02 J	1 J		
7/7/2009	XX	SWXX2X363	13	5.1	47	0.1 U	0.02 J	1.1 J		
10/27/2009	XX	SWXX2X3DI	21	6.4	31	0.1 U	0.02 J	3.2		
4/28/2010	XX	SWXX2X3IH	14.6	9.8	33	0.1 U	0.02 J	0.9 J		
4/28/2010	XD	SWDP2X3J2	14.5	9.8	33	0.1 U	0.02 J	1.1 J		
7/20/2010	XX	SWXX2X421	25	3.8	72	0.1 U	0.05	0.6 U		
7/20/2010	XD	SWDP2X426	23	3.7	72	0.1 U	0.04	1.9 J		
10/19/2010	XX	SWXX2X455	10.1	8	58	0.1 U	0.02 J	4.8		
10/19/2010	XD	SWDP2X45A	10	8.2	57	0.1 U	0.02 J	4.2		
4/26/2011	XD	SWDP2X49B	11.4	7.1	21	0.1 U	0.01 J	1 J		
4/26/2011	XX	SWXX2X496	11.5	6.7	24	0.1 U	0.01 J	0.9 J		
7/19/2011	XD	SWDP2X4D9	33	2.8	36	0.1 U	0.06	1.5 J		
7/19/2011	XX	SWXX2X4D4	35	2.9	43	0.1 U	0.06	1.6 J		
10/25/2011	XD	SWDP2X4H4	13	6.3	43	0.1 U	0.01 J	2.3		
10/25/2011	XX	SWXX2X4GJ	12.6	7.4	42	0.1 U	0.01 J	2.6		
4/24/2012	XD	SWDP2X5IE	15.4	21.6	35	0.3 U	0.04 U	2.6		
4/24/2012	XX	SWXX2X519	15.1	21.6	35	0.3 U	0.04 U	2.6		
7/24/2012	XX	SWXX2X568	17.6	3.3	65	0.3	0.08	2 U		
10/23/2012	XD	SWDP2X5D4	13.8	4	31	0.3 U	0.04 U	3		

SUMMARY REPORT  
 Inorganics (part 1 of 2)

(SW-2)	Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	Sample ID	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
10/23/2012	XX	SWXX2X5CJ	0.5 U	13	2 U	4.2	32	0.3 U	0.04 U	3
<b>SW-3</b>										
5/26/1994	XX	SWXX3X078	0.13		5 U	5	56	0.05 U	0.06	10 U
8/8/1994	XX	SWXX3X07G	0.11		5 U	1 U	51	0.05 U	0.05	10 U
11/15/1994	XX	SWXX3X080	0.1		5 U	5	41	0.05 U	0.04	10 U
2/7/1995	XX	SWXX3X084	0.1		5 U	5	21	0.05 U	0.03 U	10 U
5/24/1995	XX	SWXX3X088	0.08		5 U	5	61	0.05 U	0.05	10 U
8/16/1995	XX	SWXX3X08C	0.06		5 U	5	53	0.05 U	0.05	10 U
11/30/1995	XX	SWXX3X08G	0.1 U		6 U	4.6	28	0.05 U	0.4	4 U
2/27/1996	XX	SWXX3X090	0.1 U		6 U	9.6	32	0.058	0.1 U	2.1
5/21/1996	XX	SWXX3X0A0	0.1 U		6 U	4.3	42	0.05 U	0.02	5 U
11/25/1996	XX	SWXX3X0AJ				1 U	35			5 U
3/26/1997	XX	SW-3818-3515				F	F		F	
6/4/1997	XX	SW-3820-35585				2 U	36			5 U
9/11/1997	XX	SW-3821-35684				2 U	33			5 U
12/8/1997	XX	SW-3822-35772				5 U	39			5 U
3/26/1998	XX	SW-3823-35880				2 U	21			1 U
6/9/1998	XX	SW-3824-35955				2 U	25			5 U
9/10/1998	XX	SW-3825-36048				7.9	32			0.9
12/15/1998	XX	SW-3826-36144				4.8	40			2.6
3/30/1999	XX	SW-3827-36249				3.8	18			2.4
6/9/1999	XX	SW-3828-36320				4	53			1.6
9/15/1999	XX	SW-3829-36418				3.3	43			4.8
12/2/1999	XX	SW-3830-36496				3.9	22			1.1
3/28/2000	XX	SW-3831-36613				12	22			35
6/13/2000	XX	SW-3832-36680				10 U	33			1.2
9/13/2000	XX	SW-3833-36782				10 U	30			1.1
6/19/2001	XX	SW-3834-37061				10 U	45			1
9/11/2001	XX	SW-3835-37145				10 U	31			3.3
12/12/2001	XX	SW-3836-37237				10 U	34			6.9
3/14/2002	XX	SW-3837-37329				10 U	26			4.4
6/18/2002	XX	SW-3838-37425				11	40			0.8 U
9/19/2002	XX	SW-3839-37518				12	31			9.8
12/10/2002	XX	SW-3840-37600				12	40			8.6
6/26/2003	XX	SW-3N37798				6.5	48			1 U
9/18/2003	XX	SW-3N37882				7.9	46			1 U
5/3/2004	XD	SWDP2X01E	0.5	20	6 U	7.9	31	0.1 U	0.03 J	1.3
5/3/2004	XD	SWXX3X01A	0.5	22	6 U	10	31	0.1 U	0.03 J	1.3
7/27/2004	XX	SWXX3X04G	0.1 J	37	6 U	4.7	49	0.1 U	0.04	0.4
10/26/2004	XD	SWDP2X06F	0.1 U	31	6 U	3.9	39	0.1 U	0.03 J	0.4
10/26/2004	XX	SWXX3X06B	0.1 U	28	6 U	3.9	40	0.1 U	0.03 J	0.5
5/10/2005	XX	SWXX3X12C	0.1 U	10	6 U	5	30	0.1 U	0.02 J	1.1 J
7/28/2005	XD	SWDP2X164	0.1 U	25	6 U	3.5	47	0.1 U	0.03 J	0.6 U
7/28/2005	XX	SWXX3X160	0.1 U	25	6 U	3.5	41	0.1 U	0.02 J	0.6 U
9/20/2005	XD	SWDP2X192	0.1 U	25	6 U	4.6	38	0.1 U	0.04	1.3 J
9/20/2005	XX	SWXX3X181	0.1 U	25	6 U	4.5	38	0.1 U	0.03 J	1.3 J
5/24/2006	XX	SWXX3X1DD	0.1 U	15	6 U	8.1	33	0.1 U	0.02 J	2.3
7/26/2006	XX	SWXX3X1GA	0.1 U	17	6 U	2.5	45	0.1 U	0.02 J	0.8 J
9/13/2006	XX	SWXX3X1J3	0.1 U	27	6 U	4.2	30	0.1 U	0.02 J	0.6 J

SUMMARY REPORT  
 Inorganics (part 1 of 2)

(SW-3)	Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	Sample ID	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
5/15/2007	XX	SWXX3X22A	0.1 U	21	6 U	6.4	30	0.1 U	0.02 J	1 J
7/24/2007	XX	SWXX3X26E	0.1 U	26	6 U	5.9	43	0.1 J	0.03 J	1.8 J
9/11/2007	XX	SWXX3X294	0.1 U	31	6 U	7.5	38	0.1 J	0.02 J	1.3 J
5/21/2008	XX	SWXX3X2C1	0.1 U	23	6 U	8.4	29	0.1 J	0.03 J	1.9 J
7/29/2008	XX	SWXX3X2G2	0.1 U	26	6 U	6.4	37	0.2 J	0.03 J	2.5
10/28/2008	XX	SWXX3X2IC	0.1 U	15.9	5 U	6.7	32	0.1 U	0.02 J	2.9
4/14/2009	XX	SWXX3X320	0.1 U	10.5	4 U	9.8	19	0.1 U	0.01 U	1.5 J
7/7/2009	XX	SWXX3X364	0.2 U	16.6	5 U	4.5	42	0.1 U	0.03 J	1.5 J
10/27/2009	XX	SWXX3X3DJ	0.1 U	10.7	5 U	4.8	35	0.1 U	0.02 J	2.5
4/28/2010	XX	SWXX3X3II	0.1 U	21	2 U	8.1	27	0.1 U	0.03 J	1.8 J
7/20/2010	XX	SWXX3X422	0.3 J	40	3 U	5	27	0.1 U	0.06	1.8 J
10/19/2010	XX	SWXX3X456	0.1 U	12.5	5 U	6.4	49	0.1 U	0.02 J	5.5
4/26/2011	XX	SWXX3X497	0.1 U	12.3	3 U	5.8	20	0.1 U	0.01 J	1.4 J
7/19/2011	XX	SWXX3X4D5	0.1 U	36	4 U	5	29	0.1 U	0.04	0.6 J
10/25/2011	XX	SWXX3X4H0	0.1 U	18.5	4 U	5.6	35	0.1 U	0.02 J	1.9 J
10/26/2011	XX	SWXX3X4BB			4 U					
4/24/2012	XX	SWXX3X51A	0.5 U	10.9	5 U	4.6	32	0.3 U	0.04 U	3.5
7/24/2012	XD	SWDP2X56D	0.5 U	33	4 U	1.9	33	0.3 U	0.05	2 U
7/24/2012	XX	SWXX3X569	0.5 U	33	4 U	2	31	0.3 U	0.05	2 U
10/23/2012	XX	SWXX3X5D0	0.5 U	13.6	2 U	3.8	35	0.3 U	0.04 U	2.3

SW-DP1

5/3/2004	XX	SWDP1X01H	0.1 U	128		12.5	21	0.1 U	0.02 J	13.5
7/27/2004	XX	SWDP1X053	0.1 U	170		1.5	39	0.1 U	0.03 J	0.2 J
10/26/2004	XX	SWDP1X06H	0.1 U	116		4.5	10	0.1 U	0.02 J	4.7
5/10/2005	XX	SWDP1X121	0.1 U	42		3.4	38	0.1 U	0.09	4.7
7/28/2005	XX	SWDP1X166	0.1 U	47		2.1	15	0.1 U	0.07	3.7
9/20/2005	XX	SWDP1X194	0.1 U	81		5.5	9 J	0.1 U	0.15	12
5/24/2006	XX	SWDP1X1DJ	0.1 U	91		9.7	13	0.1 U	0.04	22
7/26/2006	XX	SWDP1X16G	0.1 U	52	6 U	8.3	45	0.1 U	0.12	30
9/13/2006	XX	SWDP1X1U9	0.1 U	69		3.6	9 J	0.1 U	0.03 J	9.2
5/15/2007	XX	SWDP1X22G	0.1 U	74		6.9	3 J	0.1 U	0.01 J	11.4
7/24/2007	XX	SWDP1X270	0.1 U	42		5.2	14	0.1 U	0.02 J	11.9
9/11/2007	XX	SWDP1X29A	0.1 U	33		5.1	13	0.1 U	0.01 U	12.8
5/21/2008	XX	SWDP1X2D4	0.1 U	30		11.3	9 J	0.1 J	0.02 J	8.8
7/29/2008	XX	SWDP1X2G8	0.1 U	26		8.8	9 J	0.1 J	0.03 J	6.5
10/28/2008	XX	SWDP1X2II	0.1 U	56		8.2	11	0.1 J	0.05	12.9
4/14/2009	XX	SWDP1X326	0.1 U	69		11.7	10	0.1 U	0.05	11.7
7/7/2009	XX	SWDP1X36A	0.5 U	39		4.1	9 J	0.1 J	0.02 J	7.5
10/27/2009	XX	SWDP1X3E5	0.1 U	37		5.5	10	0.1 U	0.04	11
4/28/2010	XX	SWDP1X3J4	0.1 U	62		10.2	8 J	0.1 U	0.02 J	12.1
7/20/2010	XX	SWDP1X428	0.1 U	16		4.1	15	0.1 U	0.02 J	6.5
10/19/2010	XX	SWDP1X45C	0.1 U	37		5.2	6 J	0.1 U	0.02 J	9.7
4/26/2011	XX	SWDP1X49D	0.1 U	46		4.1	7 J	0.1 U	0.03 J	4
7/19/2011	XX	SWDP1X4DB	0.1 U	69		2.4	8 J	0.1 U	0.02 J	4.5
10/25/2011	XX	SWDP1X4H6	0.1 U	43		3.4	5 J	0.1 U	0.03 J	6.1
4/24/2012	XX	SWDP1X51G	0.5 U	28		4.1	10 U	0.3 U	0.1	11.2
7/24/2012	XX	SWDP1X56F	0.5 U	63		4.1	16	0.3 U	0.14	8.1
10/23/2012	XX	SWDP1X5D6	0.5 U	23		3	10 U	0.3 U	0.08	5.5

SUMMARY REPORT  
 Inorganics (part 1 of 2)

(SW-DP6)		Ammonia (N)	Bicarbonate (CaCO3)	Biochemical Oxygen Demand	Chloride	Chemical Oxygen Demand	Nitrate (N)	Phosphate Phosphorus	Sulfate	Ca-mg Hardness (CaCO3)	Bromide
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
10/27/2009	XX	0.1 U	29		5.4	14	0.1 J	0.12	5.5		
4/28/2010	XX	0.1 U	66		22.3	29	0.1 U	0.11	18.5		
7/20/2010	XX	0.1 U	71		22.1	36	0.1 U	0.07	10.4		
10/19/2010	XX	0.1 U	39		10.7	17	0.1 U	0.03 J	20.8		
4/26/2011	XX	0.1 U	23		17.7	13	0.1 U	0.04	22.2		
7/19/2011	XX	0.1 U	75		8.7	14	0.2 U	0.05	155		
10/25/2011	XX	0.1 U	59		16.3	8 J	0.1 U	0.03 J	42.2		
4/24/2012	XX	0.5 U	16.8		10.3	13	0.3 U	0.04 U	21.3		
7/24/2012	XX	0.5 U	30		1.1	37	0.3 U	0.14	5.5		
10/23/2012	XX	0.5 U	22		3.5	14	0.3 U	0.07	3.9		

Notes:

TYPE - Sample Type Qualifier where D = Duplicate Sample.  
 Blank Cells appear when a parameter was not analyzed.

Concentration Qualifier Notes:

- ! - The sampling location was damaged or destroyed.
- D - The sampling location was dry.
- DE - Decommissioned Location
- F - The sampling location was frozen.
- F12 - Pipe under water, no sample taken.
- F6 - No flow. Sample not taken.
- G - Greater than specified amount.
- H2 - Waterlevel higher than pipes. See LF-COMP for readings
- I - The sampling location yielded insufficient quantity to collect a sample.
- J - Analyte was positively identified/Associated value is an estimate below reporting limit.
- U - Not Detected above the reported sample detection limit.

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

Page 1 of 34

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
<b>DP-4</b>														
1/30/2004	XX	GWDP4X039	575	8.1	18						301			
5/6/2004	XX	GWXXXX00D	433	6.2	84	1.1	0.1 U	0.63	0.061					
7/26/2004	XX	GWXXXX041	253	3.5	6	0.55	0.1 U	0.26	0.027					
10/26/2004	XX	GWXXXX07H	248	3.3	4 U	0.37	0.1 U	0.39	0.018					
5/9/2005	XX	GWXXXX13I	262	2.9	5	0.4		0.3 U						
8/1/2005	XX	GWXXXX176	235	2.5	26	0.24	0.1 U	0.3 U						
9/20/2005	XX	GWXXXX1A4	229	2.8	11	0.4	0.1 U	0.74						
5/22/2006	XX	GWXXXX1EJ	189	2.6	258	0.23		0.59						
7/24/2006	XX	GWXXXX1HG	200	2.2	192	0.2 U		1.1						
9/11/2006	XX	GWXXXX209	191	2.5	40	0.2 U		0.69						
5/14/2007	XX	GWXXXX23G	210	6.3	391	0.35		0.69						
7/23/2007	XX	GWXXXX280	223	4.1	363	0.2 U		0.41						
9/10/2007	XX	GWXXXX2AA	234	3.1	137	0.2 U		0.3 U						
5/19/2008	XX	GWXXXX2E4	237	2.2	443	0.21		0.92						
7/29/2008	XX	GWXXXX2H8	229	3.5	157	0.21		0.5 U						
10/27/2008	XX	GWXXXX2JI	300	2.2	394	0.2 U		0.5 U						
4/13/2009	XX	GWXXXX336	292	2	1084	0.21		110						
7/6/2009	XX	GWXXXX37A	274	2.7	116	0.21		20						
10/26/2009	XX	GWXXXX3F5	225	3	254	0.2 U		0.47						
4/26/2010	XX	GWXXXX404	185	1.8 J	1490	0.2 U		0.31						
7/19/2010	XX	GWXXXX438	170	1.3 J	37	0.2 U		0.34						
10/18/2010	XX	GWXXXX46C	165	1.3 J	33	0.2 U		0.3 U						
4/25/2011	XX	GWXXXX4AD	166	0.9 J	114	0.2 U		0.3 U						
7/18/2011	XX	GWXXXX4EB	172	1.4 J	46	0.2 U		0.3 U						
10/24/2011	XX	GWXXXX4I6	166	1.4	5	0.2 U		0.3 U						
4/25/2012	XX	GWXXXX52G	198	2 U	21	0.2 U		0.3						
7/25/2012	XX	GWXXXX57F	182	2 U	22	0.2 U		0.4						
10/24/2012	XX	GWXXXX5E6	196	2 U	34	0.2 U		0.31						

**LF-COMP**

7/19/2011	XX	LFXXXX4F1	233	0.7 U	4 U	0.2 U								
4/24/2012	XX	LFXXXX53B	195	2 U	4 U	0.2 U								

**LF-UD-1**

7/28/2004	XX	LFUD1X06E	151	0.5 U	4 U	0.2 U	0.1 U							
10/27/2004	XX	LFUD1X076	130	2.2	4 U	0.2 U	0.1 U							
5/11/2005	XX	LFUD1X137	162	2	4 U	0.2 U								
7/27/2005	XX	LFUD1X16F	154	0.8 J	4 U	0.2 U	0.1 U							
9/21/2005	XX	LFUD1X19D	155	1.1 J	4 U	0.2 U	0.1 U							
5/24/2006	XX	LFUD1X1E8	170	3.8	4 U	0.2 U								
7/25/2006	XX	LFUD1X1H5	151	1.6	4 U	0.2 U								
9/11/2006	XX	LFUD1X1J1	169	1 J	4	0.2 U								
5/16/2007	XX	LFUD1X235	181	2.3	4 U	0.21								
7/25/2007	XX	LFUD1X279	190	6.4	4 U	0.2 U								
9/12/2007	XX	LFUD1X29J	1	1	1	1								
5/20/2008	XX	LFUD1X2DD	178	1.8 J	4 U	0.2 U								
7/28/2008	XX	LFUD1X2GH	218	1.7 J	4 U	0.2 U								
10/28/2008	XX	LFUD1X2J7	202	1.1 J	4 U	0.2 U								
4/15/2009	XX	LFUD1X32F	211	1.8 J	4 U	0.2 U								

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

(LF-UD-1)		Total Dissolved Solids	Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO <sub>3</sub> )	Cyanide	Total Coliform	Apparent Color
Date	Type Sample ID	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	ug/L	Colonies/100 mL	CU
7/18/2009	XX LFUD1X36J	H2	H2	H2	H2							
10/27/2009	XX LFUD1X3EE	H2	H2	H2	H2							
4/27/2010	XX LFUD1X3JD	191	2.3	4 U	0.2 U							
7/20/2010	XX LFUD1X42H	F6	F6	F6	F6							
10/19/2010	XX LFUD1X461	F6	F6	F6	F6							
4/26/2011	XX LFUD1X4A2	211	1.6 J	4 U	0.2 U							
7/19/2011	XX LFUD1X4E0	232	0.7 J	8	0.2 U							
10/25/2011	XX LFUD1X4HF	205	1 J	40	1 U							
4/24/2012	XX LFUD1X525	H2	H2	H2	H2							
7/24/2012	XX LFUD1X574	208	2 U	10	0.2 U							
10/23/2012	XX LFUD1X5DF	F6	F6	F6	F6							
<b>LF-UD-2</b>												
7/28/2004	XX LFUD2X06F	138	0.8 J	4 U	0.2 U	0.1 U						
10/27/2004	XX LFUD2X077	133	1.1 J	4 U	0.2 U	0.1 U						
5/11/2005	XX LFUD2X138	132	2	4 U	0.2 U							
7/27/2005	XX LFUD2X166	145	0.9 J	4 U	0.2 U	0.1 U						
9/21/2005	XX LFUD2X19E	143	0.7 J	4 U	0.2 U	0.1 U						
5/24/2006	XX LFUD2X1E9	145	12	4 U	0.2 U							
7/25/2006	XX LFUD2X1H6	139	1.2 J	4 U	0.2 U							
9/11/2006	XX LFUD2X1JU	208	2.4	4 U	0.2 U							
5/16/2007	XX LFUD2X236	160	1 J	4 U	0.2 U							
7/25/2007	XX LFUD2X27A	158	1.4 J	4 U	0.2 U							
9/12/2007	XX LFUD2X2A0	176	0.6 J	4 U	0.2 U							
5/20/2008	XX LFUD2X2DE	157	2	4 U	0.2 U							
7/28/2008	XX LFUD2X2G1	186	1.3 J	4 U	0.2 U							
10/29/2008	XX LFUD2X2J8	159	0.8 J	4 U	0.2 U							
4/15/2009	XX LFUD2X326	171	1.7 J	4 U	0.2 U							
7/8/2009	XX LFUD2X370	H2	H2	H2	H2							
10/27/2009	XX LFUD2X3EF	H2	H2	H2	H2							
4/27/2010	XX LFUD2X3JE	152	1.9 J	4 U	0.2 U							
7/20/2010	XX LFUD2X421	229	0.7 U	4 U	0.2 U							
10/19/2010	XX LFUD2X462	290	0.7 U	39	0.2 U							
4/26/2011	XX LFUD2X4A3	172	0.7 U	4 U	0.2 U							
7/19/2011	XX LFUD2X4E1	191	0.7 U	4 U	0.2 U							
10/25/2011	XX LFUD2X4HG	173	0.7 J	36	0.3							
4/24/2012	XX LFUD2X526	H2	H2	H2	H2							
7/24/2012	XX LFUD2X575	188	2 U	4 U	0.2 U							
10/23/2012	XX LFUD2X5DG	211	2 U	4 U	0.2 U							
<b>LF-UD-3A,B</b>												
5/16/2007	XX LFUD3X246	249	4.8	4 U	0.24							
7/25/2007	XX LFUD3X288	F6	F6	F6	F6							
9/12/2007	XX LFUD3X2AI	F6	F6	F6	F6							
5/20/2008	XX LFUD3X2EE	163	4.3	4 U	0.2 U							
7/28/2008	XX LFUD3X2HG	D	D	D	D							
10/29/2008	XX LFUD3X306	F6	F6	F6	F6							
4/15/2009	XX LFXXXX33F	263	2.6	4 U	0.2 U							
7/8/2009	XX LFXXXX371	H2	H2	H2	H2							
10/27/2009	XX LFXXXX3FC	H2	H2	H2	H2							

SUMMARY REPORT  
 Inorganics (part 2 of 2)

(LF-UD-3A,B)		Total Dissolved Solids	Organic Carbon	Total Suspended Solids	Tannin & Lignans (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	ug/L	Colonies/100 mL	CU
Date	Type	Sample ID										
4/27/2010	XX	LFXXX40C	236	4	4 U							
7/20/2010	XX	LFXXX43S	F6	F6	F6							
10/19/2010	XX	LFXXX46J	F6	F6	F6							
4/26/2011	XX	LFXXX481	229	1.2 J	4 U							
7/19/2011	XX	LFXXX4EJ	H2	H2	H2							
10/25/2011	XX	LFXXX4IC	F6	F6	F6							
4/24/2012	XX	LFXXX634	H2	H2	H2							
7/24/2012	XX	LFXXX681	F6	F6	F6							
10/23/2012	XX	LFXXX6EC	F6	F6	F6							
<b>LF-UD-4</b>												
4/15/2009	XX	LFXXX34A	206	5.1	5							
7/8/2009	XX	LFXXX380	H2	H2	H2							
10/27/2009	XX	LFXXX3FE	H2	H2	H2							
4/27/2010	XX	LFXXX40E	F6	F6	F6							
7/20/2010	XX	LFXXX43I	F6	F6	F6							
10/19/2010	XX	LFXXX471	F6	F6	F6							
4/26/2011	XX	LFXXX483	F12	F12	F12							
7/19/2011	XX	LFXXX4G2	H2	H2	H2							
10/25/2011	XX	LFXXX4GA	F6	F6	F6							
4/24/2012	XX	LFXXX536	H2	H2	H2							
7/24/2012	XX	LFXXX582	263	2 U	4 U							
10/23/2012	XX	LFXXX5CA	252	2 U	4 U							
<b>LF-UD-5</b>												
4/27/2010	XX	LFXXX40F	197	1.4 J	4 U							
<b>LF-UD-5and6</b>												
7/20/2010	XX	LFXXX43J	272	2.5	7							
10/19/2010	XX	LFXXX472	277	1.6 J	42							
4/26/2011	XX	LFXXX4B4	287	1.5 J	4 U							
7/19/2011	XX	LFXXX4F2	293	1.9 J	14							
10/25/2011	XX	LFXXX4G7	332	2.5	154							
4/24/2012	XX	LFXXX637	272	2 U	26							
7/24/2012	XX	LFXXX684	279	2 U	4 U							
10/23/2012	XX	LFXXX6C7	268	2 U	128							
<b>LF-UD-6</b>												
4/26/2011	XX	LFUD6486	366	3.6	4 U							
7/19/2011	XX	LFUD64F4	368	3.6	102							
10/25/2011	XX	LFUD64G9	344	3.5	4 U							
4/24/2012	XX	LFUD6539	309	2 U	4 U							
7/24/2012	XX	LFUD6586	414	2.8	4 U							
10/23/2012	XX	LFUD65C9	563	3.1	4 U							
<b>LF-UD-7</b>												
4/24/2012	XX	LFUD753A	H2	H2	H2							
7/24/2012	XX	LFXXX687	F6	F6	F6							
10/23/2012	XX	LFXXX6EF	F6	F6	F6							
<b>LP-COMP</b>												
10/27/2004	XX	LPCOMP02	459	5.5	4 U						0.1 U	

SUMMARY REPORT  
 Inorganics (part 2 of 2)

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
<b>LP-LD-1</b>														
7/28/2004	XX	LPD1X051		578	5.2	34	0.2 U	0.1 U						
10/27/2004	XX	LPD1X07A		306	5.4	141	0.46	0.1 U						
5/11/2005	XX	LPD1X13B		73	4	4 U	0.59							
7/27/2005	XX	LPD1X16J		247	2.1	4 U	0.2 U	0.1 U						
9/21/2005	XX	LPD1X16H		571	10.7	13	1	0.17						
5/24/2006	XX	LPD1X1EC		172	4.7	4 U	0.28							
7/25/2006	XX	LPD1X1H9		370	4.5	4 U	0.2 U							
9/11/2006	XX	LPD1X202		492	6.3	4 U	0.2 U							
5/16/2007	XX	LPD1X239		312	5.4	4 U	0.37							
7/25/2007	XX	LPD1X27D		486	6.4	4 U	0.2 U							
9/12/2007	XX	LPD1X2A3		509	9.7	21	0.35							
5/20/2008	XX	LPD1X2DH		75	5.2	4 U	0.54							
7/28/2008	XX	LPD1X2H1		182	4.8	4 U	0.55							
10/29/2008	XX	LPD1X2JB		196	44.7	4 U	0.43							
4/15/2009	XX	LPD1X32J		371	3.8	4 U	0.2 U							
7/8/2009	XX	LPD1X373		85	2	9	0.2 U							
10/27/2009	XX	LPD1X3E1		97	3.8	4 U	0.2 U							

<b>LP-UD-1</b>														
7/28/2004	XX	LPUD1X05G	D	D	D	D	D	D	D	D	D	D	D	D
10/27/2004	XX	LPUD1X078	H2											
5/11/2005	XX	LPUD1X139	D	D	D	D	D	D	D	D	D	D	D	D
7/27/2005	XX	LPUD1X16H	D	D	D	D	D	D	D	D	D	D	D	D
9/21/2005	XX	LPUD1X16F	D	D	D	D	D	D	D	D	D	D	D	D
5/24/2006	XX	LPUD1X1EA	D	D	D	D	D	D	D	D	D	D	D	D
7/26/2006	XX	LPUD1X1H7	F6											
9/11/2006	XX	LPUD1X200	D	D	D	D	D	D	D	D	D	D	D	D
5/16/2007	XX	LPUD1X237	F6											
7/25/2007	XX	LPUD1X27B	F6											
9/12/2007	XX	LPUD1X2A1	F6											
5/20/2008	XX	LPUD1X2DF	F6											
7/28/2008	XX	LPUD1X2GJ	D	D	D	D	D	D	D	D	D	D	D	D
10/29/2008	XX	LPUD1X2J9	F6											
4/15/2009	XX	LPUD1X32H	F6											
7/8/2009	XX	LPUD1X371	F6											
10/27/2009	XX	LPUD1X3EG	F6											
4/27/2010	XX	LPUD1X3JF	F6											
7/20/2010	XX	LPUD1X42J	F6											
10/19/2010	XX	LPUD1X463	F6											
4/26/2011	XX	LPUD1X4A4	F6											
7/19/2011	XX	LPUD1X4E2	F6											
10/25/2011	XX	LPUD1X4HH	F6											
4/24/2012	XX	LPUD1X527	F6											
7/24/2012	XX	LPUD1X576	F6											
10/23/2012	XX	LPUD1X5DH	F6											

<b>LP-UD-2</b>														
7/28/2004	XX	LPUD2X05H		300	2.9	4 U	0.2 U	0.1 U						
10/27/2004	XX	LPUD2X079		455	6.3	4 U	0.2 U	0.1 U						



REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Inorganics (part 2 of 2)

Page 6 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Laminic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
5/20/2008	XX	GW102X2E8	122	1.3 J	4 U	0.2 U	0.3 U							
7/29/2008	XX	GW102X2HC	121	1.2 J	4 U	0.2 U	1.2							
10/27/2008	XX	GW102X302	120	2.1	4 U	0.2 U	0.5 U							
4/14/2009	XX	GW102X339	147	0.9 J	4 U	0.2 U	0.5 U							
7/17/2009	XX	GW102X37D	131	0.7 U	4 U	0.2 U	0.5 U							
10/27/2009	XX	GW102X3F8	136	0.7 U	4 U	0.2 U	0.3 U							
4/27/2010	XX	GW102X407	141	1.2 J	4 U	0.2 U	0.3 U							
7/21/2010	XX	GW102X43B	134	0.7 U	4 U	0.2 U	0.3 U							
10/19/2010	XX	GW102X46F	139	0.7 U	4 U	0.2 U	0.3 U							
4/25/2011	XX	GW102X4AG	136	0.7 U	4 U	0.2 U	0.3 U							
7/19/2011	XX	GW102X4EE	137	0.7 U	4 U	0.2 U	0.3 U							
10/25/2011	XX	GW102X4I9	126	0.7 U	4 U	0.2 U	0.3 U							
4/24/2012	XX	GW102X52J	119	2 U	4 U	0.2 U	0.35							
7/24/2012	XX	GW102X57I	122	2 U	4 U	0.2 U	3.8							
10/22/2012	XX	GW102X5E9	141	2 U	4 U	0.2 U	0.98							
<b>MW04-105</b>														
1/17/2005	XX	GW105X10F	379	5.2	4 U	0.2 U	0.1 U	0.46	163	0.002 U				
3/21/2005	XX	GW105X147	432	7.5	4 U	0.2 U	0.02 U	0.34	180	0.002 U				
7/25/2005	XX	GW105X181	407	5	4 U	0.2 U	0.1 U	0.31	175	0.002 U				
9/20/2005	XX	GW105X1AC	396	4.5	4 U	0.2 U	0.1 U	0.32	191	0.002 U				
5/23/2006	XX	GW105X1F7	241	2.7	4 U	0.2 U		0.34						
7/25/2006	XD	GWDF3X1G1	231	2.9	4 U	0.2 U		0.43						
7/25/2006	XX	GW105X1H1	318	3.4	4 U	0.2 U		0.92						
9/12/2006	XX	GW105X20E	272	3.5	4 U	0.2 U		0.3 U						
5/14/2007	XX	GW105X241	234	3.5	4 U	0.22		0.5 U						
5/14/2007	XD	GWDF3X22I	220	3.4	4 U	0.2 U		0.5 U						
7/24/2007	XD	GWDF3X272	294	5	4 U	0.2 U		0.3 U						
7/24/2007	XX	GW105X285	257	4	4 U	0.2 U		0.3 U						
9/10/2007	XX	GW105X2AF	292	2.5	4 U	0.2 U		0.3 U						
5/19/2008	XD	GWDF3X2D6	256	2.2	4 U	0.2 U		0.5 U						
5/19/2008	XX	GW105X2E9	263	2.5	4 U	0.2 U		0.5 U						
7/29/2008	XD	GWDF3X2GA	250	2.6	4 U	0.2 U		0.5 U						
7/29/2008	XX	GW105X2HD	251	2.5	4 U	0.2 U		0.5 U						
10/27/2008	XD	GWDF1X305	218	2.9	4 U	0.2 U		0.5 U						
10/27/2008	XX	GW105X303	216	2.9	4 U	0.2 U		0.5 U						
4/15/2009	XX	GW105X33A	168	2.3	4 U	0.2 U		0.5 U						
4/15/2009	XD	GWDF3X328	167	2.8	4 U	0.2 U		0.5 U						
7/17/2009	XD	GWDF1X381	199	1.8 J	4 U	0.2 U		0.5 U						
7/17/2009	XX	GW105X37E	195	2.8	4 U	0.2 U		0.5 U						
10/26/2009	XD	GWDF1X3DG	196	1.6 J	4 U	0.2 U		0.3 U						
10/26/2009	XX	GW105X3F9	201	1.3 J	4 U	0.2 U		0.3 U						
4/27/2010	XX	GW105X408	185	3	5	0.2 U		0.3 U						
4/27/2010	XD	GWDF3X3J6	156	1.3 J	4 U	0.2 U		0.3 U						
7/19/2010	XX	GW105X43C	170	0.8 J	4 U	0.2 U		0.3 U						
10/18/2010	XD	GWDF3X48E	179	0.8 J	4 U	0.2 U		0.3 U						
10/18/2010	XX	GW105X46G	177	0.9 J	4 U	0.2 U		0.3 U						
4/26/2011	XD	GWDF3X49F	175	0.7 J	4 U	0.2 U		0.3 U						
4/26/2011	XX	GW105X44H	178	0.8 J	4 U	0.2 U		0.3 U						
7/18/2011	XX	GW105X4EF	184	1.1 J	4 U	0.2 U		0.3 U						



SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

REPORT PREPARED: 1/17/2013 13:57  
FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignin (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
<b>(MW09-901)</b>														
4/24/2012	XX	GW901X51J	103	2 U	2 U	4 U	0.2 U		0.3 U					
7/24/2012	XX	GW901X56I	108	2 U	2 U	4 U	0.2 U		0.3 U					
10/23/2012	XX	GW901X5D9	118	2 U	2 U	4 U	0.2 U		0.3 U					
<b>MW11-207R</b>														
7/20/2011	XX	GW207X4CH	70	0.7 U	0.7 U	4 U	0.2 U		0.48					
10/24/2011	XX	GW207X4GC	61	0.7 U	0.7 U	4 U	0.2 U		0.3 U					
4/23/2012	XX	GW207X512	69	2 U	2 U	4 U	0.2 U		0.3 U					
7/23/2012	XX	GW207X561	72	2 U	2 U	4 U	0.2 U		0.3 U					
10/22/2012	XX	GW207X5CC	69	2 U	2 U	4 U	0.2 U		0.93					
<b>MW-204</b>														
11/13/1990	XX	MW-204XX33190	200	7.2	7.2	F	0.5		4				700	
2/20/1991	XX	MW-204XX33289	F	F	F	F	F		F				F	
6/3/1991	XX	MW-204XX33392	160	4.4	4.4		0.32		1.1				5	
9/16/1991	XX	MW-204XX33497	200	8.4	8.4		0.23		0.96				5 U	
12/17/1991	XX	GW204X001	180	2.2	2.2		0.2 U		0.86				25	
3/2/1992	XX	GW204X001	F	F	F		F		F				F	
6/23/1992	XX	GW204X01E	140	2	2		0.2 U		1.6				20	
8/17/1992	XX	GW204X02C	220	17	17		0.2 U		3.6				20	
1/26/1993	XX	GW204X038	130	2	2		0.2 U		0.8				15	
4/27/1993	XX	GW204X04C	85	1 U	1 U		0.2 U		0.6				10	
7/21/1993	XX	GW204X054	110	2	2		0.2 U		0.5				5 U	
10/12/1993	XX	GW204X05I	120	5	5		0.2 U		0.4				5	
1/11/1994	XX	GW204X06E	140	14	14		0.2 U		0.4				20	
5/21/1996	XX	GW204X089	113	1.5	1.5		0.2 U		0.73				50	
11/25/1996	XX	GW204X0A2	75	1 U	1 U									
3/25/1997	XX	MW-204808-35514	61	1 U	1 U									
6/3/1997	XX	MW-204809-35584	108	1 U	1 U									
9/9/1997	XX	MW-204810-35682	160	0.5 U	0.5 U									
12/3/1997	XX	MW-204811-35767	120	1 U	1 U									
3/23/1998	XX	MW-204812-35877	117	1 U	1 U									
6/8/1998	XX	MW-204813-35954	106	1 U	1 U									
9/9/1998	XX	MW-204814-38047	108	1 U	1 U									
12/14/1998	XX	MW-204815-38143	134	1 U	1 U									
3/29/1999	XX	MW-204816-38248	112	1.4	1.4									
6/8/1999	XX	MW-204817-38319	117	1.7 U	1.7 U									
9/13/1999	XX	MW-204818-38416	122	1	1									
12/1/1999	XX	MW-204819-38495	115	0.4	0.4									
3/27/2000	XX	MW-204820-38612	130	1 U	1 U									
6/12/2000	XX	MW-204821-38689	110	1 U	1 U									
9/12/2000	XX	MW-204822-38781	130	1 U	1 U									
12/11/2000	XX	MW-204823-38871	64	1 U	1 U									
3/12/2001	XX	MW-204824-38982	110	1 U	1 U									
6/18/2001	XX	MW-204825-37080	110	1.4	1.4									
9/10/2001	XX	MW-204826-37144	95	1 U	1 U									
12/11/2001	XX	MW-204827-37236	110	1.4	1.4									
3/13/2002	XX	MW-204828-37328	120	2.5	2.5									
6/17/2002	XX	MW-204829-37424	150	3.2	3.2									
9/18/2002	XX	MW-204830-37517	160	3.5	3.5									

SUMMARY REPORT  
 Inorganics (part 2 of 2)

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Suspended Solids	Tannin & Lignins (Tannic Acid)		Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L			mg/L	mg/L							
12/9/2002	XX	MW-204831-37599	170	3.6											
3/25/2003	XX	MW-204837705	130	2.2											
6/25/2003	XX	MW-20483787	120	3											
9/17/2003	XX	MW-204837881	150	2.9											
1/29/2004	XX	GW204X03A	151	1.3J	4U						110				
5/4/2004	XX	GW204X008	138	1J	4U			0.1U	0.15U		98	0.002U			
7/27/2004	XX	GW204X03G	148	1.2J	4U			0.1U	0.29		95	0.002U			
10/25/2004	XX	GW204X07D	175	9.3	4U			0.1U	0.53	0.011					
5/9/2005	XX	GW204X13E	146	1.4J	4U			0.2U	0.3U						
8/1/2005	XX	GW204X17Z	170	1.3J	4U			0.1U	0.3U						
9/20/2005	XX	GW204X1A0	210	2	4U			0.1U	0.3U						
5/23/2006	XX	GW204X1EF	147	3.3	4U			0.2U	0.33						
7/24/2006	XX	GW204X1HC	143	1.7	4U			0.2U	0.82						
9/11/2006	XX	GW204X205	138	2.4	4U			0.2U	0.3U						
5/14/2007	XX	GW204X23C	142	1.7	4U			0.2U	0.5U						
7/23/2007	XX	GW204X27G	140	1.9	4U			0.2U	0.3U						
9/10/2007	XX	GW204X2A6	161	3.7	4U			0.2U	0.3U						
5/21/2008	XX	GW204X2E0	134	3	4U			0.2U	0.3U						
7/30/2008	XX	GW204X2H4	147	0.8J	4U			0.2U	0.5U						
10/28/2008	XX	GW204X2JE	144	0.7J	4U			0.2U	0.5U						
4/13/2009	XX	GW204X332	148	4.7	4U			0.2U	0.54						
7/6/2009	XX	GW204X376	134	1.2J	4U			0.2U	2U						
10/26/2009	XX	GW204X3F1	133	0.9J	4U			0.2U	0.3U						
4/28/2010	XX	GW204X400	119	3.7	4U			0.2U	0.34						
7/19/2010	XX	GW204X434	113	0.7U	4U			0.2U	0.3U						
10/19/2010	XX	GW204X468	138	0.9J	4U			0.2U	0.3U						
4/26/2011	XX	GW204X4A9	120	0.7U	4U			0.2U	0.3U						
7/19/2011	XX	GW204X4E7	121	0.7U	4U			0.2U	0.3U						
10/26/2011	XX	GW204X4I2	124	0.8J	4U			0.2U	0.3U						
4/24/2012	XX	GW204X52C	112	2U	4U			0.2U	0.3U						
7/23/2012	XX	GW204X57B	130	2U	4U			0.2U	0.3U						
10/24/2012	XX	GW204X5E2	136	2U	4U			0.2U	0.3						

MW-207

11/13/1990	XX	MW-207XX33190	250	11				0.9	1					170	
2/20/1991	XX	MW-207XX33289	190	9.4				0.4	11	4				200	
6/4/1991	XX	MW-207XX33393	170	9.9				1.3	0.59					5	
9/17/1991	XX	MW-207XX33498	120	14				0.45	0.96					5U	
12/18/1991	XX	GW207X002	130	4.7				0.27	0.39					10	
3/2/1992	XX	GW207X00J	F	F				F	F					F	
6/23/1992	XX	GW207X01F	140	4				0.2U	0.3					20	
8/23/1992	XD	GW207X028	150	5				0.2U	0.4					15	
8/17/1992	XX	GW207X02D	130	43				0.2U	0.3					75	
1/26/1993	XX	GW207X039	100	3				0.2U	0.3					20	
4/27/1993	XX	GW207X04D	74	30				0.2U	0.3					15	
7/22/1993	XX	GW207X055	100	6				0.2	1.3					5U	
10/13/1993	XX	GW207X060	96	8				0.2U	0.3					5U	
1/11/1994	XX	GW207X06G	150	4				0.2U	0.4					15	
5/21/1996	XD	GWDP1X09A	104	2.7				0.2U	0.15U					25	
5/21/1996	XX	GW207X095	100	2.5				0.3	0.18					55	

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

Page 10 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignin (Vanillic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO <sub>3</sub> )	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
1/126/1996	XX	GW207X0A4	98	3.8										
3/24/1997	XX	MW-207825-35513	85	6.6										
6/2/1997	XX	MW-207826-35583	116	2.1										
9/8/1997	XX	MW-207827-35681	127	2.2										
12/3/1997	XX	MW-207828-35767	105	2										
3/23/1998	XX	MW-207829-35877	94	1										
6/8/1998	XX	MW-207830-35954	85	1.4										
6/8/1998	XX	MW-207831-36046	105	1.4										
12/14/1998	XX	MW-207832-36143	127	1.3										
3/29/1999	XX	MW-207833-36248	98	1.8										
6/8/1999	XX	MW-207834-36319	96	1.7 U										
9/13/1999	XX	MW-207835-36416	108	3.3										
12/1/1999	XX	MW-207836-36495	77	1.5										
3/27/2000	XX	MW-207837-36612	80	5.6										
6/12/2000	XX	MW-207838-36689	110	4.4										
9/12/2000	XX	MW-207839-36781	130	6.3										
12/11/2000	XX	MW-207840-36871	44	3.2										
3/13/2001	XX	MW-207841-36963	78	2.2										
6/18/2001	XX	MW-207842-37060	72	2.44										
9/10/2001	XX	MW-207843-37144	45	1.8										
12/1/2001	XX	MW-207844-37236	70	1.6										
3/13/2002	XX	MW-207845-37328	57	1.1										
6/17/2002	XX	MW-207846-37424	46	1.4										
9/18/2002	XX	MW-207847-37517	45	1 U										
12/9/2002	XX	MW-207848-37599	68	1 U										
3/26/2003	XX	MW-207849-37681	43	1 U										
6/25/2003	XX	MW-207850-37767	39	2.6										
9/17/2003	XX	MW-207851-37851	46	1.2										
5/5/2004	XX	GW207X011	80	1.2 J			0.25	0.1 U	0.15 U	0.01 U				
7/28/2004	XX	GW207X048	97	1.9			0.2 U	0.1 U	0.15 U	0.01 U				
10/25/2004	XX	GW207X083	107	4.1			0.32	0.1 U	0.42	0.01 U				
5/12/2005	XX	GW207X124	104	2			0.51		0.59					
8/1/2005	XX	GW207X15C	101	1 J			0.3	0.3	0.6					
9/19/2005	XX	GW207X18A	93	3.1			0.25	0.1 U	0.3					
9/19/2005	XD	GWDP1X18F	90	1.1 J			0.24	0.1 U	0.31					
5/22/2006	XX	GW207X1D5	114	4.6			0.29		0.42					
7/25/2006	XX	GW207X1G2	117	4.8			0.2 U		0.58					
9/11/2006	XX	GW207X1F	105	4.7			0.2 U		0.55					
5/14/2007	XX	GW207X222	130	2.5			0.28		0.5 U					
7/25/2007	XX	GW207X266	136	4.5			0.2 U		0.3					
9/10/2007	XX	GW207X28G	143	6.8			0.2 U		0.39					
5/19/2008	XX	GW207X2CA	144	3.7			0.2 U		0.54					
7/29/2008	XX	GW207X2FE	162	5.2			0.27		0.5 U					
10/28/2008	XX	GW207X2I4	210	6.4			0.36		0.58					
4/13/2009	XX	GW207X31C	195	17.1			1.8		25					
7/6/2009	XX	GW207X35G	213	22.3			2.1		22					
10/26/2009	XX	GW207X3DB	265	9.2			1		12					
4/26/2010	XX	GW207X3IA	259	6.5			0.74		3.8					
7/19/2010	XX	GW207X41E	244	5.3			0.78		4.4					
10/18/2010	XX	GW207X44I	286	6.2			2.3		5.1					

SUMMARY REPORT  
 Inorganics (part 2 of 2)

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
4/25/2011	XX	GW207X48J	266	4.4	4.4	4 U	0.4 U		1.9					
<b>MW-206</b>														
4/27/1993	XX	GW206X04I	190	4	4		0.2 U		2.2				20	
4/27/1993	XD	GW206X04E	190	2	2		0.2		1.7				30	
7/21/1993	XX	GW206X05A	150	9	9		0.2 U		0.2				5 U	
10/13/1993	XX	GW206X05J	130	8	8		0.2 U		0.7				5 U	
1/11/1994	XX	GW206X06F	160	4	4		0.2 U		0.3				20	
5/21/1996	XX	GW206X09A	95	2	2		0.2 U		0.15 U				35	
1/126/1996	XX	GW206X0A3	72	1 U	1 U									
3/25/1997	XX	MW-206824-35514	58	1 U	1 U									
6/21/1997	XX	MW-206825-35583	30	1 U	1 U									
9/8/1997	XX	MW-206826-35681	105	0.5 U	0.5 U									
12/31/1997	XX	MW-206827-35767	93	1 U	1 U									
3/23/1998	XX	MW-206828-35877	101	1 U	1 U									
6/8/1998	XX	MW-206829-35954	86	1 U	1 U									
9/8/1998	XX	MW-206830-36046	110	1 U	1 U									
12/14/1998	XX	MW-206831-36143	134	3	3									
3/29/1999	XX	MW-206832-36248	81	1.2	1.2									
6/8/1999	XX	MW-206833-36319	115	1.7 U	1.7 U									
9/15/1999	XX	MW-206834-36418	116	0.8	0.8									
12/1/1999	XX	MW-206835-36485	91	1.2 U	1.2 U									
3/27/2000	XX	MW-206836-36612	91	1 U	1 U									
6/12/2000	XX	MW-206837-36689	83	1 U	1 U									
9/13/2000	XX	MW-206838-36782	96	1 U	1 U									
12/11/2000	XX	MW-206839-36871	48	1 U	1 U									
3/13/2001	XX	MW-206840-36963	74	1 U	1 U									
6/18/2001	XX	MW-206841-37060	78	1 U	1 U									
9/10/2001	XX	MW-206842-37144	69	1 U	1 U									
12/12/2001	XX	MW-206843-37237	62	1 U	1 U									
3/13/2002	XX	MW-206844-37328	67	1 U	1 U									
6/17/2002	XX	MW-206845-37424	56	1 U	1 U									
9/18/2002	XX	MW-206846-37517	55	1 U	1 U									
12/9/2002	XX	MW-206847-37599	84	1 U	1 U									
3/26/2003	XX	MW-206848-37706	58	1 U	1 U									
6/25/2003	XX	MW-206849-37797	60	2.1	2.1									
9/17/2003	XX	MW-206850-37881	66	1 U	1 U									
5/6/2004	XX	GW206X010	96	0.5 U	0.5 U	8	0.2 U	0.1 U	0.15 U	0.01 U				
7/28/2004	XX	GW206X047	96	0.5 U	0.5 U	4 U	0.2 U	0.1 U	0.15 U	0.01 U				
10/26/2004	XX	GW206X062	86	0.7 J	0.7 J	4 U	0.2 U	0.1 U	0.3 U	0.01 U				
5/11/2005	XX	GW206X123	97	0.8 J	0.8 J	4 U	0.2 U	0.2 U	0.3 U					
7/28/2005	XX	GW206X158	89	1.3 J	1.3 J	4 U	0.2 U	0.1 U	0.3 U					
9/19/2005	XX	GW206X189	81	1.1 J	1.1 J	4 U	0.2 U	0.1 U	0.3 U					
5/24/2006	XX	GW206X1D4	98	1.7	1.7	4 U	0.2 U		0.44					
7/25/2006	XX	GW206X1G1	88	2.2	2.2	4 U	0.2 U		1.2					
9/12/2006	XX	GW206X1IE	66	0.8 J	0.8 J	4 U	0.2 U		0.3 U					
5/14/2007	XX	GW206X221	97	2.7	2.7	4 U	0.2 U		0.5 U					
7/25/2007	XX	GW206X265	85	2.1	2.1	4 U	0.2 U		0.3 U					
9/11/2007	XX	GW206X28F	95	2.6	2.6	4 U	0.2 U		0.5 U					
5/20/2008	XX	GW206X2C9	74	1.5 J	1.5 J	4 U	0.2 U		0.3 U					

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Vanillic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
7/29/2008	XX	GW206X2FD	83	1.4 J		4 U	0.2 U		0.5 U					
10/27/2008	XX	GW206X2I3	90	1.2 J		4 U	0.2 U		0.5 U					
4/13/2009	XX	GW206X31B	97	1.2 J		4 U	0.2 U		0.5 U					
7/6/2009	XX	GW206X35F	86	0.7 U		4 U	0.2 U		2 U					
10/28/2009	XX	GW206X3DA	86	0.8 J		4 U	0.2 U		0.3 U					
4/26/2010	XX	GW206X3I9	69	0.7 J		4 U	0.2 U		0.3 U					
7/19/2010	XX	GW206X41D	81	1.4 J		4 U	0.2 U		2.4					
10/18/2010	XX	GW206X44H	98	1.5 J		10	0.2 U		2.4					
4/25/2011	XX	GW206X48I	97	0.7 U		8	0.2 U		0.3 U					
7/18/2011	XX	GW206X4CG	92	2.2		12	0.2 U		1.2					
10/24/2011	XX	GW206X4GB	91	1.1 J		5	0.2 U		0.3 U					
4/23/2012	XX	GW206X511	91	2 U		4 U	0.2 U		0.35					
7/23/2012	XX	GW206X560	99	2 U		4 U	0.2 U		0.35					
7/23/2012	XD	GWDP4X573	86	2 U		6	0.2 U		0.3 U					
10/22/2012	XX	GW206X5CB	95	2 U		4	0.2 U		0.94					
<b>MW-212</b>														
1/13/1990	XX	MW-212XX33160	I	I		I	I		I			I		I
2/19/1991	XX	MW-212XX33288	I	1 U		I	I		I			I		I
6/4/1991	XX	MW-212XX33393	120	12			0.2 U		I				5	
9/16/1991	XX	MW-212XX33487	I	I		I	I		I			I		I
12/17/1991	XX	GW212X004	88	7.3			0.2 U		0.68				5	
3/2/1992	XX	GW212X011	I	I		I	I		1				I	
6/23/1992	XX	GW212X01H	D	D		D	D		D			D	D	D
1/26/1993	XX	GW212X03B	D	D		D	D		D			D	D	D
4/27/1993	XX	GW212X04G	160	5			0.2 U		0.8				10	
7/21/1993	XX	GW212X058	D	D		D	D		D			D	D	D
10/12/1993	XX	GW212X062	D	D		D	D		D			D	D	D
1/11/1994	XX	GW212X06I	100	I		I	0.2 U		I				5 U	
5/21/1996	XX	GW212X097	61	1.6			0.2 U		0.24				10	
1/26/1996	XX	GW212X0A5	D	D		D	D							
3/24/1997	XX	MW-212826-35513	F	F										
6/2/1997	XX	MW-212827-35583	59	1 U										
3/23/1998	XX	MW-212830-35877	72	1 U										
6/8/1998	XX	MW-212831-35954	44	1 U										
3/29/1999	XX	MW-212834-36248	74	1.2										
6/8/1999	XX	MW-212835-36319	60	1.7 U										
12/1/1999	XX	MW-212837-36495	55	1.2 U										
3/27/2000	XX	MW-212838-36612	53	1 U										
6/12/2000	XX	MW-212839-36689	45	1 U										
3/13/2002	XX	MW-212840-37328	59	2.4										
6/17/2002	XX	MW-212841-37424	33	1 U										
3/26/2003	XX	MW-212N37706	12	1 U										
6/25/2003	XX	MW-212N37797	9	1.4										
5/5/2004	XX	GW212X00B	48	0.5 U		4 U		0.1 U	0.15 U		20	0.002 U		
7/27/2004	XX	GW212X03J	D	D		D	D	D	D		D	D		
10/27/2004	XX	GW212X07F	D	D		D	D	D	D		D	D		
5/12/2005	XX	GW212X13G	101	2.3		4 U	0.2 U		0.32					
8/1/2005	XX	GW212X174	35	0.6 J		4 U	0.2 U	0.1 U	0.3 U					
9/20/2005	XX	GW212X1A2	I	I		I	I	I	I					

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
5/22/2006	XX	GW212X1EH	56	2.4		4 U	0.2 U		0.38					
7/25/2006	XX	GW212X1HE	48	2.5		4 U	0.2 U		3.1					
9/11/2006	XX	GW212X207	1	1		1	1		1					
5/14/2007	XX	GW212X23E	60	0.5 U		4 U	0.2 U		0.5 U					
7/24/2007	XX	GW212X271	D	D		D	D		D					
9/10/2007	XX	GW212X2A8	D	D		D	D		D					
5/19/2008	XX	GW212X2E2	64	0.7 U		4 U	0.2 U		0.5 U					
7/29/2008	XX	GW212X2H6	D	D		D	D		D					
10/28/2008	XX	GW212X2JG	D	D		D	D		D					
4/13/2009	XX	GW212X334	132	4.7		4 U	0.2 U		0.72					
7/6/2009	XX	GW212X378	100	6.7		4 U	0.33		2.6					
10/26/2009	XX	GW212X3F3	D	D		D	D		D					
4/26/2010	XX	GW212X402	135	1.3 J		5	0.2 U		0.36					
7/19/2010	XX	GW212X436	D	D		D	D		D					
10/18/2010	XX	GW212X46A	D	D		D	D		D					
4/25/2011	XX	GW212X4AB	129	0.7 U		4 U	0.2 U		0.3 U					
7/18/2011	XX	GW212X4E9	D	D		D	D		D					
10/24/2011	XX	GW212X4H4	D	D		D	D		D					
4/23/2012	XX	GW212X52E	D	D		D	D		D					
7/23/2012	XX	GW212X57D	D	D		D	D		D					
10/22/2012	XX	GW212X5E4	D	D		D	D		D					

**MW-216B**

11/12/1990	XX	MW-216BX33189	140	1 U		0.2 U			0.3					70
2/19/1991	XX	MW-216BX33288	80	1 U		0.2 U			0.3	1 U				50
6/4/1991	XD	MW-216BX03393	96	5.6		0.2 U			0.2 U					5
6/4/1991	XX	MW-216BX03393	110	1.8		0.2 U			0.2 U					5
9/16/1991	XX	MW-216BX33487	70	1 U		0.2 U			0.2 U					5
9/16/1991	XD	MW-216BX033497	92	1.1		0.2 U			0.38					5
12/17/1991	XX	GW216B007	63	1 U		0.2 U			0.2 U					5 U
12/17/1991	XD	GW216B00F	52	1.3		0.2 U			0.2 U					20
3/2/1992	XX	GW216B014	90	1		0.2 U			0.4					15
6/23/1992	XX	GW216B01J	71	2		0.2 U			0.2 U					20
8/17/1992	XX	GW216B02I	83	3		0.2 U			0.2 U					10
1/26/1993	XX	GW216B03D	71	1 U		0.2 U			0.2 U					5
4/27/1993	XX	GW216B043	63	1 U		0.2 U			0.2 U					5 U
7/2/1993	XX	GW216B050	64	1 U		0.2 U			0.2 U					5 U
10/13/1993	XD	GW216B066	120	2		0.2 U			0.2 U					5 U
10/13/1993	XX	GW216X0084	120	2		0.2 U			0.2					5 U
1/11/1994	XX	GW216B070	110	1 U		0.2 U			0.2 U					5 U
1/11/1994	XD	GW216B07I	100	1 U		0.2 U			0.2 U					5 U
5/21/1996	XX	GW216B099	91	1 U		0.2 U			0.2 U					10
11/25/1996	XX	GW216B0A7	60	1.1		0.2 U			0.15 U					
3/25/1997	XX	MW-216B810-35514	76											
6/2/1997	XX	MW-216B811-35583	104	1 U										
9/9/1997	XX	MW-216B812-35682	106	0.6										
12/3/1997	XX	MW-216B813-35767	109	1 U										
3/25/1998	XD	MW-216B815-35955	89	1 U										
3/25/1998	XX	MW-216B814-35879	86	1 U										
9/8/1998	XX	MW-216B816-36046	120	1 U										

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
12/14/1998	XX	MW-216B817-36143	148		1 U									
3/30/1999	XX	MW-216B818-36249	118		1.3									
6/9/1999	XX	MW-216B819-36320	101		1.1									
9/14/1999	XX	MW-216B820-36417	103		1.4									
12/2/1999	XX	MW-216B821-36496	77		1.5									
3/28/2000	XX	MW-216B822-36613	130		1.1									
6/13/2000	XX	MW-216B823-36690	94		1 U									
9/13/2000	XX	MW-216B824-36782	100		1.2									
12/12/2000	XX	MW-216B825-36872	78		1 U									
3/14/2001	XX	MW-216B826-36964	89		1 U									
6/19/2001	XX	MW-216B827-37061	110		1 U									
9/11/2001	XX	MW-216B828-37145	81		1									
12/12/2001	XX	MW-216B829-37237	49		1.2									
3/14/2002	XX	MW-216B830-37329	88		1 U									
6/18/2002	XX	MW-216B831-37425	100		1.3									
9/19/2002	XX	MW-216B832-37518	87		1.4									
12/10/2002	XX	MW-216B833-37600	110		1 U									
3/26/2003	XX	MW-216B837706	76		1 U									
6/26/2003	XX	MW-216B837798	63		2.4									
9/18/2003	XX	MW-216B837882	97		1 U									
5/6/2004	XD	GWDP1X017	94		0.7 J		0.2 U	0.1 U	0.21	0.01				
5/6/2004	XX	GW216B013	90		0.8 J		0.2 U	0.1 U	0.16	0.01 U				
7/26/2004	XX	GW216B049	72		3.6		0.2 U	0.1 U	0.15 U	0.015				
10/26/2004	XX	GW216B064	68		1.6		0.2 U	0.1 U	0.48	0.014				
10/26/2004	XD	GWDP1X068	84		2.2		0.2 U	0.1 U	0.3 U	0.015				
5/10/2005	XX	GW216B125	55		1.8		0.2 U		0.3 U					
7/27/2005	XD	GWDP3X168	111		1.9		0.2 U	0.1 U	0.35					
7/27/2005	XX	GW216B15D	105		1.8		0.2 U	0.1 U	0.47					
9/22/2005	XX	GW216B168	67		5.8		0.2 U	0.1 U	0.3 U					
5/23/2006	XX	GW216B1D6	187		7.4		6.1		0.63					
7/25/2006	XX	GW216B1G3	88		6.5		0.2 U		1.2					
7/25/2006	XD	GWDP1X1G7	86		5.5		0.2 U		0.56					
9/12/2006	XX	GW216B11G	92		4.9		6.5		0.57					
5/15/2007	XX	GW216B223	81		5.6		0.34		0.5 U					
7/24/2007	XX	GW216B267	106		5		0.2 U		0.3 U					
7/24/2007	XD	GWDP1X26B	102		5.8		0.2 U		0.3 U					
9/10/2007	XX	GW216B28H	92		4		0.2 U		0.3 U					
5/20/2008	XX	GW216B2CB	157		3.2		0.2 U		0.3 U					
7/28/2008	XX	GW216B2FF	261		5.9		0.27		0.5 U					
7/28/2008	XD	GWDP1X2FJ	276		5.4		0.33		0.5 U					
10/28/2008	XX	GW216B215	139		6.3		0.21		0.51					
4/14/2009	XX	GW216B31D	113		3.4		0.2 U		0.5 U					
7/7/2009	XX	GW216B35H	DE		DE		DE		DE					
<b>MW-216BR</b>														
12/8/2009	XX	GW216B3G6	192		1.6 J		0.2 U		0.3 U					
4/27/2010	XX	GW216B31B	185		2.5		0.2 U		0.3 U					
7/20/2010	XX	GW216B41F	174		0.8 J		0.2 U		0.3 U					
10/19/2010	XX	GW216B44J	188		0.7 U		0.2 U		0.3 U					
4/26/2011	XX	GW216B490	224		0.9 J		0.2 U		0.3 U					

SUMMARY REPORT  
 Inorganics (part 2 of 2)

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)		Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L			mg/L	mg/L							
7/19/2011	XX	GW216B4CI	229	1.1 J	1.1 J	4 U	0.2 U	0.2 U	0.3 U						
10/25/2011	XX	GW216B4GD	242	1.9 J	1.9 J	4 U	0.2 U	0.2 U	0.36						
4/24/2012	XX	GW216B513	245	2 U	2 U	4 U	0.2 U	0.2 U	0.3 U						
7/24/2012	XX	GW216B562	238	2 U	2 U	4 U	0.2 U	0.2 U	0.43						
10/23/2012	XX	GW216B5CD	231	2 U	2 U	4 U	0.2 U	0.2 U	0.3 U						
<b>MW-223A</b>															
11/12/1990	XX	MW-223AX33189	110	1 U	1 U	F	0.2 U	0.2 U	0.2	F	F			7	
2/19/1991	XX	MW-223AXX32988	F	F	F	F	F	F	F	F	F			F	
6/3/1991	XX	MW-223AXX33392	90	1 U	1 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U			5	
9/16/1991	XX	MW-223AXX33497	96	1 U	1 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U			5 U	
12/17/1991	XX	GW223A008	F	F	F	F	F	F	F	F	F			F	
3/2/1992	XX	GW223A016	F	F	F	F	F	F	F	F	F			F	
6/23/1992	XX	GW223A020	80	1 U	1 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U			5 U	
8/17/1992	XX	GW223A02J	88	1	1	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U			5 U	
1/26/1993	XX	GW223A03E	F	F	F	F	F	F	F	F	F			F	
4/27/1993	XX	GW223A044	81	1 U	1 U	0.2 U	0.2 U	0.2 U	0.8	0.8	0.8			5 U	
7/21/1993	XD	GW223A056	74	1 U	1 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U			5 U	
7/21/1993	XX	GW223A05B	84	1 U	1 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U			5 U	
10/12/1993	XX	GW223X065	67	1	1	0.2 U	0.2 U	0.2 U	0.5	0.5	0.5			5	
1/11/1994	XX	GW223A072	F	F	F	F	F	F	F	F	F			F	
5/21/1996	XX	GW223A09B	105	1 U	1 U	0.2 U	0.2 U	0.2 U	0.15 U	0.15 U	0.15 U			5 U	
11/25/1996	XX	GW223A0A8	83	1 U	1 U										
3/24/1997	XX	MW-223A811-35513	F	F	F	F	F	F	F	F	F			F	
6/3/1997	XX	MW-223A812-35584	113	1 U	1 U										
9/10/1997	XX	MW-223A813-35683	108	0.5 U	0.5 U										
12/4/1997	XX	MW-223A814-35768	109	1 U	1 U										
6/11/1998	XX	MW-223A816-35957	98	1 U	1 U										
9/9/1998	XX	MW-223A817-36047	113	1 U	1 U										
12/15/1998	XX	MW-223A818-36144	151	1 U	1 U										
3/30/1999	XX	MW-223A819-36249	44	1.2	1.2										
6/9/1999	XX	MW-223A820-36320	127	1.7 U	1.7 U										
9/14/1999	XX	MW-223A821-36417	118	0.6	0.6										
12/2/1999	XX	MW-223A822-36496	120	1.2 U	1.2 U										
3/28/2000	XX	MW-223A823-36613	130	1 U	1 U										
6/13/2000	XX	MW-223A824-36690	130	1 U	1 U										
9/13/2000	XX	MW-223A825-36782	130	1 U	1 U										
12/12/2000	XX	MW-223A826-36872	93	1 U	1 U										
6/19/2001	XX	MW-223A827-37061	120	1.01	1.01										
9/11/2001	XX	MW-223A828-37145	100	1.2	1.2										
12/11/2001	XX	MW-223A829-37236	120	1 U	1 U										
3/14/2002	XX	MW-223A830-37329	91	1 U	1 U										
6/18/2002	XX	MW-223A831-37425	130	1 U	1 U										
9/19/2002	XX	MW-223A832-37518	97	1 U	1 U										
12/10/2002	XX	MW-223A833-37600	140	1 U	1 U										
3/25/2003	XX	MW-223AN3705	110	1 U	1 U										
3/25/2003	XD	MW-223AD3705	81	1 U	1 U										
6/26/2003	XX	MW-223AN3798	110	1.2	1.2										
9/18/2003	XX	MW-223AN37892	120	1 U	1 U										
5/5/2004	XX	GW223A014	112	0.5 U	0.5 U	4 U	0.2 U	0.1 U	0.15 U	0.01 U	0.01 U				

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

Page 16 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
7/28/2004	XD	GWDP1X04D	113	0.5 U		4 U	0.2 U	0.1 U	0.15 U	0.01 U				
7/28/2004	XX	GW223A04A	120	0.5 J		4 U	0.2 U	0.1 U	0.15 U	0.01 U				
10/25/2004	XX	GW223A085	118	1.4 J		4 U	0.2 U	0.1 U	0.49	0.01 U				
5/10/2005	XD	GWDP3X130	114	0.5 U		4 U	0.2 U		0.3 U					
5/10/2005	XX	GW223A126	112	0.5 J		4 U	0.2 U		0.3 U					
7/26/2005	XX	GW223A19E	117	0.5 U		4 U	0.2 U	0.1 U	0.3 U					
9/21/2005	XX	GW223A18C	123	3.4		4 U	0.2 U	0.1 U	0.3 U					
5/24/2006	XD	GWDP1X1DA	126	1.2 J		4 U	0.2 U		0.59					
5/24/2006	XX	GW223A1D7	136	1.9		4 U	0.2 U		0.34					
7/26/2006	XD	GWDP5X1I3	133	1.3 J		4 U	0.2 U		0.34					
7/26/2006	XX	GW223A1G4	128	2		4 U	0.2 U		0.45					
9/13/2006	XD	GWDP5X20G	90	0.6 J		4 U	0.2 U		0.36					
9/13/2006	XX	GW223A1IH	99	2.2		4 U	0.2 U		0.3 U					
5/15/2007	XD	GWDP1X2Z7	117	1.1 J		4 U	0.31		0.5 U					
5/15/2007	XX	GW223A2Z4	110	3.2		4 U	0.25		0.5 U					
7/24/2007	XD	GWDP5X287	127	1.7		4 U	0.2 U		0.3 U					
7/24/2007	XX	GW223A288	36	2.6		4 U	0.2 U		0.3 U					
9/11/2007	XX	GW223A28I	128	0.8 J		4 U	0.2 U		0.5 U					
5/20/2008	XX	GW223A2CC	125	1.3 J		4 U	0.2 U		0.3 U					
5/20/2008	XD	GWDP1X2CF	121	1.4 J		4 U	0.2 U		0.3 U					
7/30/2008	XX	GW223A2FG	146	0.7 U		4 U	0.2 U		1.3					
7/30/2008	XD	GWDP5X2HF	121	0.7 J		4 U	0.2 U		0.5 U					
10/28/2008	XX	GW223A2I6	137	0.7 U		4 U	0.2 U		0.5 U					
4/14/2009	XD	GWDP1X3IH	226	1.2 J		4 U	0.2 U		0.5 U					
4/14/2009	XX	GW223A3IE	229	1.2 J		4 U	0.2 U		0.5 U					
7/7/2009	XX	GW223A35I	162	0.7 U		4 U	0.2 U		0.5 U					
10/27/2009	XX	GW223A3DD	165	0.7 U		4 U	0.2 U		0.3 U					
10/27/2009	XD	GWDP4X3ED	171	0.9 J		4 U	0.2 U		0.3 U					
4/27/2010	XD	GWDP1X3IF	169	1.4 J		4 U	0.2 U		0.3 U					
4/27/2010	XX	GW223A3IC	189	2.1		4 U	0.2 U		0.3 U					
7/20/2010	XX	GW223A41G	176	0.7 U		4 U	0.2 U		0.56					
10/19/2010	XD	GWDP1X463	214	0.7 U		4 U	0.2 U		0.35					
10/19/2010	XX	GW223A490	229	0.7 U		4 U	0.2 U		0.3 U					
4/26/2011	XX	GW223A48I	224	0.7 U		4 U	0.2 U		0.3 U					
7/19/2011	XD	GWDP1X484	230	0.7 U		4 U	0.2 U		0.3 U					
7/19/2011	XX	GW223A4CJ	241	0.7 U		4 U	0.2 U		0.3 U					
10/25/2011	XD	GWDP3X4H8	235	0.7 U		4 U	0.2 U		0.3 U					
10/25/2011	XX	GW223A4GE	231	0.7 U		4 U	0.2 U		0.3 U					
4/24/2012	XD	GWDP1X517	231	2 U		4 U	0.2 U		0.3 U					
4/24/2012	XX	GW223A514	244	2 U		4 U	0.2 U		0.3 U					
7/24/2012	XX	GW223A563	229	2 U		4 U	0.2 U		0.31					
10/23/2012	XX	GW223A5CE	262	2 U		4 U	0.2 U		0.31					
10/23/2012	XD	GWDP3X5D8	266	2 U		4 U	0.2 U		0.3 U					

**MW-223B**

11/12/1990	XX	MW-223BXX33189	280	1 U		0.2 U			0.5				17	
2/19/1991	XX	MW-223BXX33288	F	F		F			F				F	
6/3/1991	XX	MW-223BXX33392	86	1 U		0.2 U			0.2 U				5	
9/16/1991	XX	MW-223BXX33487	330	1.5		0.2 U			0.29				5 U	
12/17/1991	XX	GW223B009	F	F		F			F				F	

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

Page 17 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignin (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO <sub>3</sub> )	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
3/2/1992	XX	GW223B017	F	F	F	F	F	F	F	F	F	F	F	F
6/23/1992	XX	GW223B022	88	1 U	1 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	15	15
8/17/1992	XX	GW223B030	74	8	8	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	5	5
1/26/1993	XX	GW223B03F	F	F	F	F	F	F	F	F	F	F	F	F
4/27/1993	XX	GW223B045	120	1 U	1 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	10	10
7/21/1993	XX	GW223B05C	73	1	1	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	5	5
10/12/1993	XX	GW223B067	67	1 U	1 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	30	30
1/11/1994	XX	GW223B073	F	F	F	F	F	F	F	F	F	F	F	F
5/21/1996	XX	GW223B09C	102	1.1	1.1	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	15	15
11/25/1996	XX	GW223B0A9	76	1.2	1.2									
3/24/1997	XX	MW-223B812-35513	F	F	F									
6/3/1997	XX	MW-223B813-35584	112	1 U	1 U									
9/10/1997	XX	MW-223B814-35683	99	0.5 U	0.5 U									
12/4/1997	XX	MW-223B815-35768	113	1 U	1 U									
6/8/1998	XX	MW-223B817-35954	92	1 U	1 U									
9/9/1998	XX	MW-223B818-36047	102	1 U	1 U									
12/15/1998	XX	MW-223B819-36144	134	1 U	1 U									
3/30/1999	XX	MW-223B820-36249	128	1.5	1.5									
6/9/1999	XX	MW-223B821-36320	104	1.7 U	1.7 U									
9/14/1999	XX	MW-223B822-36417	109	1.7 U	1.7 U									
12/2/1999	XX	MW-223B823-36496	87	1.2 U	1.2 U									
3/28/2000	XX	MW-223B824-36613	120	2.7	2.7									
6/13/2000	XX	MW-223B825-36690	110	1.7	1.7									
9/13/2000	XX	MW-223B826-36782	110	1 U	1 U									
12/12/2000	XX	MW-223B827-36872	90	1 U	1 U									
6/19/2001	XX	MW-223B828-37061	110	1 U	1 U									
9/11/2001	XX	MW-223B829-37145	97	2.6	2.6									
12/11/2001	XX	MW-223B830-37236	110	2.6	2.6									
3/14/2002	XX	MW-223B831-37329	80	1 U	1 U									
6/18/2002	XX	MW-223B832-37425	120	1 U	1 U									
9/19/2002	XX	MW-223B833-37518	100	1 U	1 U									
12/10/2002	XX	MW-223B834-37600	110	1 U	1 U									
3/25/2003	XX	MW-223B837-05	81	1 U	1 U									
6/26/2003	XX	MW-223B837-98	93	1	1									
9/18/2003	XX	MW-223B837-882	97	1.4	1.4									
5/5/2004	XX	GW223B00A	109	0.5 J	0.5 J									
7/27/2004	XX	GW223B03I	114	0.5 U	0.5 U									
10/25/2004	XX	GW223B07E	127	3.3	3.3	0.2 U	0.2 U	0.1 U	0.1 U	0.01 U	101	0.002 U		
5/10/2005	XX	GW223B13F	120	5.7	5.7	0.2 U	0.2 U	0.3 U	0.3 U		92	0.002 U		
7/26/2005	XX	GW223B173	127	0.5 U	0.5 U	0.2 U	0.2 U	0.1 U	0.1 U					
9/21/2005	XX	GW223B1A1	129	1.3 J	1.3 J	0.2 U	0.2 U	0.1 U	0.1 U					
5/24/2006	XX	GW223B1EG	137	1.6	1.6	0.2 U	0.2 U	0.34	0.34					
7/26/2006	XX	GW223B1HD	142	1.7	1.7	0.2 U	0.2 U	0.53	0.53					
9/13/2006	XX	GW223B206	93	2.2	2.2	0.2 U	0.2 U	0.33	0.33					
5/15/2007	XX	GW223B23D	117	3.3	3.3	0.37	0.37	0.5 U	0.5 U					
7/24/2007	XX	GW223B27H	147	2.7	2.7	0.2 U	0.2 U	0.3 U	0.3 U					
9/11/2007	XX	GW223B2A7	141	0.5 J	0.5 J	0.2 U	0.2 U	2.5 U	2.5 U					
5/20/2008	XX	GW223B2E1	150	2.2	2.2	0.2 U	0.2 U	0.3 U	0.3 U					
7/30/2008	XX	GW223B2H5	158	0.7 U	0.7 U	0.2 U	0.2 U	0.5 U	0.5 U					

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
10/28/2008	XX	GW223B2JF	163	0.8 J	4 U	0.2 U			0.5 U					
4/14/2009	XX	GW223B333	145	3.4	4 U	0.2 U			0.5 U					
7/17/2009	XX	GW223B377	176	0.7 U	4 U	0.2 U			0.5 U					
7/17/2009	XD	GWDP4X36I	171	0.7 U	4 U	0.2 U			0.5 U					
10/27/2009	XX	GW223B3F2	166	0.8 J	4 U	0.2 U			0.3 U					
4/27/2010	XX	GW223B401	185	0.8 J	4 U	0.2 U			0.3 U					
7/20/2010	XD	GWDF1X41J	173	2.7	4 U	0.2 U			1.7					
7/20/2010	XX	GW223B435	173	2.6	4 U	0.2 U			1.5					
10/19/2010	XX	GW223B469	195	0.8 J	4 U	0.2 U			0.33					
4/26/2011	XX	GW223B44A	185	0.7 U	4 U	0.2 U			0.3 U					
7/19/2011	XD	GWDP3X4DD	189	1.9 J	4 U	0.31			1.2					
7/19/2011	XX	GW223B4E8	198	1.9 J	4 U	0.2 U			1.1					
10/25/2011	XX	GW223B4I3	199	1.8 J	4	0.27			1					
4/24/2012	XX	GW223B52D	190	2 U	4 U	0.2 U			0.57					
7/24/2012	XX	GW223B57C	205	2 U	4 U	0.2 U			0.79					
7/24/2012	XD	GWDP3X56H	191	2 U	4 U	0.2 U			0.45					
10/23/2012	XX	GW223B5E3	216	2 U	4 U	0.2 U			0.3 U					

**MW-227**

11/13/1990	XX	MW-227X03190	210	3.3	F	0.2			0.3	F				500
2/19/1991	XX	MW-227X03288	F	F	F	F			F	F				F
6/3/1991	XX	MW-227X03392	160	1.5	XX	0.35			0.32					5
9/16/1991	XX	MW-227X03487	120	14	XX	0.2 U			0.29					5 U
12/17/1991	XX	GW227X00A	120	1 U	XX	0.2 U			0.2 U					20
3/2/1992	XX	GW227X018	F	F	F	F			F	F				F
6/23/1992	XX	GW227X023	160	1 U	XX	0.2 U			1					10
8/17/1992	XX	GW227X031	140	42	XX	0.2 U			0.2 U					5
1/26/1993	XX	GW227X03G	F	F	F	F			F	F				F
4/27/1993	XX	GW227X047	130	3	XX	0.2 U			0.4					10
7/21/1993	XX	GW227X05E	120	4	XX	0.2 U			0.2 U					5 U
10/12/1993	XX	GW227X068	140	9	XX	0.2 U			0.3					30
1/11/1994	XX	GW227X074	F	F	F	F			F	F				F
5/21/1996	XX	GW227X09D	117	1.6	XX	0.2 U			0.15 U					45
11/25/1996	XX	GW227X0AA	95	1.4	XX									
3/24/1997	XX	MW-227813-35513	F	F	XX									
6/3/1997	XX	MW-227814-35584	137	1 U	XX									
9/9/1997	XX	MW-227815-35682	104	0.9	XX									
12/4/1997	XX	MW-227816-35768	102	1 U	XX									
3/25/1998	XX	MW-227817-35879	99	1 U	XX									
6/8/1998	XX	MW-227818-35954	113	1 U	XX									
9/9/1998	XX	MW-227819-36047	131	1 U	XX									
12/15/1998	XX	MW-227820-36144	147	1 U	XX									
3/29/1999	XX	MW-227821-36248	104	1.1	XX									
6/8/1999	XX	MW-227822-36319	112	1.7 U	XX									
9/13/1999	XX	MW-227823-36416	140	0.5	XX									
12/1/1999	XX	MW-227824-36495	109	1.2 U	XX									
3/27/2000	XX	MW-227825-36612	120	1 U	XX									
6/12/2000	XX	MW-227826-36689	110	1 U	XX									
9/12/2000	XX	MW-227827-36781	140	1 U	XX									
12/11/2000	XX	MW-227828-36871	80	1 U	XX									

**SUMMARY REPORT**  
Inorganics (part 2 of 2)

SEVIEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Total Dissolved Solids	Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	ug/L	Colonies/100 mL	CU
3/12/2001	XX	MW-227828-8682	110	1 U									
6/18/2001	XX	MW-227830-37080	100	1 U									
9/10/2001	XX	MW-227831-37144	90	1 U									
12/12/2001	XX	MW-227832-37237	84	1 U									
3/14/2002	XX	MW-227833-37329	85	1 U									
6/17/2002	XX	MW-227834-37424	78	1 U									
9/18/2002	XX	MW-227835-37517	83	1 U									
12/9/2002	XX	MW-227836-37599	89	1 U									
3/25/2003	XX	MW-227837-705	74	1 U									
6/25/2003	XX	MW-227837-797	59	1.1									
9/18/2003	XX	MW-227837-882	100	1 U									
5/5/2004	XX	GW227X015	98	0.5 U	4 U	0.2 U	0.1 U	0.15 U	0.01 U				
7/26/2004	XX	GW227X048	95	0.5 U	4 U	0.2 U	0.1 U	0.15	0.01 U				
10/26/2004	XX	GW227X066	100	2.4	4 U	0.2 U	0.1 U	0.3 U	0.012				
5/9/2005	XX	GW227X127	113	0.5 J	4 U	0.2 U	0.1 U	0.3 U					
7/27/2005	XX	GW227X15F	113	0.7 J	4 U	0.2 U	0.1 U	0.3 U					
9/21/2005	XX	GW227X18D	108	1.3 J	4 U	0.2 U	0.1 U	0.3 U					
5/24/2006	XX	GW227X1D8	116	2.2	4 U	0.2 U		0.42					
7/26/2006	XX	GW227X1G5	115	1.5	4 U	0.2 U		0.37					
9/13/2006	XX	GW227X1I1	74	0.5 J	4 U	0.2 U		0.55					
5/15/2007	XX	GW227X225	95	2.2	4 U	0.45		0.5 U					
7/24/2007	XX	GW227X269	120	3.7	4 U	0.2 U		0.3 U					
9/11/2007	XX	GW227X28J	112	1.1 J	4 U	0.2 U		0.5 U					
5/20/2008	XX	GW227X2CD	104	2.9	4	0.2 U		0.3 U					
7/30/2008	XX	GW227X2FH	116	1.2 J	4 U	0.2 U		0.5 U					
10/27/2008	XX	GW227X2I7	98	1.6 J	4 U	0.2 U		0.5 U					
4/14/2009	XX	GW227X31F	122	2.8	4 U	0.2 U		0.5 U					
7/7/2009	XX	GW227X35J	111	0.7 U	4 U	0.2 U		0.5 U					
10/27/2009	XX	GW227X3DE	105	1.7 J	4 U	0.2 U		0.3 U					
4/27/2010	XX	GW227X3ID	99	6.9	4 U	0.2 U		0.3 U					
7/20/2010	XX	GW227X41H	100	0.7 U	4 U	0.2 U		0.3 U					
10/19/2010	XX	GW227X451	115	0.7 U	4 U	0.2 U		0.3 U					
4/26/2011	XX	GW227X492	114	0.7 U	4 U	0.2 U		0.3 U					
7/19/2011	XX	GW227X4D0	115	0.7 U	4 U	0.2 U		0.3 U					
10/25/2011	XX	GW227X4GF	107	0.7 U	4 U	0.2 U		0.3 U					
4/24/2012	XX	GW227X515	108	2 U	4 U	0.2 U		0.3 U					
7/24/2012	XX	GW227X564	109	2 U	4 U	0.2 U		0.3 U					
10/23/2012	XX	GW227X5CF	222	2 U	4 U	0.2 U		0.31					
<b>MW-301</b>													
11/25/1996	XD	GWDF1X0AC	80	1 U									
11/25/1996	XX	GW301X0B0	83	1 U									
3/24/1997	XX	MW-301815-35513	F	F									
6/3/1997	XX	MW-301816-35584	116	1 U									
9/9/1997	XX	MW-301817-35682	97	0.9									
12/3/1997	XX	MW-301818-35767	92	1 U									
3/23/1998	XX	MW-301819-35877	106	1 U									
6/8/1998	XX	MW-301820-35954	83	1 U									
9/9/1998	XX	MW-301821-36047	112	1 U									
12/14/1998	XX	MW-301822-36143	124	1 U									

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

Page 20 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO <sub>3</sub> )	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
3/29/1999	XX	MW-301823-36248	97	1										
6/8/1999	XX	MW-301824-36319	120	1.7 U										
9/13/1999	XX	MW-301825-36416	111	0.6										
12/1/1999	XX	MW-301826-36495	99	1.2 U										
3/27/2000	XX	MW-301827-36612	100	1 U										
6/12/2000	XX	MW-301828-36689	94	1 U										
9/12/2000	XX	MW-301829-36781	130	1 U										
6/18/2001	XX	MW-301830-37080	100	1 U										
9/10/2001	XX	MW-301831-37144	87	1 U										
12/11/2001	XX	MW-301832-37236	96	1 U										
3/13/2002	XX	MW-301833-37328	88	1 U										
6/17/2002	XX	MW-301834-37424	78	1 U										
9/18/2002	XX	MW-301835-37517	79	1 U										
3/25/2003	XX	MW-301837-37705	70	1.3										
6/25/2003	XX	MW-301839-37781	66	1 U										
9/17/2003	XD	MW-301837-37781	77	1 U										
9/17/2003	XX	MW-301837-37781	78	1 U										
5/5/2004	XD	GWDP301J	96	0.5 J	4 U	0.2 U	0.1 U	0.15 U	0.01 U					
5/5/2004	XX	GW301X016	100	0.5 J	4 U	0.2 U	0.1 U	0.31 U	0.01 U					
7/26/2004	XX	GW301X04C	101	0.5 U	4 U	0.2 U	0.1 U	0.15 U	0.01 U					
10/25/2004	XX	GW301X067	117	2.1	4 U	0.2 U	0.1 U	0.3 U	0.01 U					
5/9/2005	XX	GW301X128	113	4.2	4 U	0.2 U		0.3 U						
8/1/2005	XX	GW301X15G	108	0.5 U	4 U	0.2 U	0.1 U	0.34						
9/22/2005	XX	GW301X18E	115	1.4 J	4 U	0.2 U	0.1 U	0.3 U						
5/22/2006	XX	GW301X1D9	122	1.9	5	0.2 U		0.39						
7/24/2006	XX	GW301X1G6	109	1.3 J	4 U	0.2 U		0.6						
9/11/2006	XX	GW301X11J	104	2.1	6	0.2 U		0.37						
5/14/2007	XX	GW301X228	124	1.3 J	4	0.2 U		0.5 U						
7/23/2007	XX	GW301X28A	110	1.7	18	0.2 U		0.3 U						
9/10/2007	XX	GW301X280	144	0.9 J	4 U	0.2 U		0.3 U						
5/19/2008	XX	GW301X2CE	114	2	4 U	0.2 U		0.5 U						
7/30/2008	XX	GW301X2FI	121	1.3 J	5	0.2 U		0.5 U						
10/28/2008	XX	GW301X2I8	125	0.7 U	4 U	0.21		0.5 U						
4/15/2009	XX	GW301X31G	160	5.7	4 U	0.2 U		0.5 U						
7/7/2009	XX	GW301X360	118	1.2 J	6	0.2 U		0.5 U						
10/26/2009	XX	GW301X3DF	123	0.7 U	7	0.2 U		0.3 U						
4/26/2010	XX	GW301X3IE	117	1.9 J	21	0.2 U		0.3 U						
7/19/2010	XX	GW301X41I	109	0.7 U	8	0.2 U		0.3 U						
10/19/2010	XX	GW301X452	133	0.7 U	4 U	0.2 U		0.3 U						
4/27/2011	XX	GW301X483	126	0.7 U	4 U	0.2 U		0.34						
7/20/2011	XX	GW301X4D1	118	0.7 U	4 U	0.2 U		0.41						
10/26/2011	XX	GW301X4GG	127	0.7 U	6	0.2 U		0.3 U						
4/25/2012	XX	GW301X516	123	2 U	13	0.2 U		0.3 U						
7/25/2012	XX	GW301X565	118	2 U	4 U	0.2 U		0.3 U						
10/24/2012	XX	GW301X5CG	130	2 U	20	0.2 U		0.3 U						
10/24/2012	XD	GWDP4X5DE	118	2 U	15	0.2 U		0.31						
<b>MW-302</b>														
6/23/1992	XX	GW302X027	100	3		0.2 U		0.7					5	
8/17/1992	XD	GW302X035	100	5		0.2 U		0.3					5	

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

Page 21 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO <sub>3</sub> )	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
8/17/1992	XX	GW-302X032	100	4			0.2 U		0.3					10
1/26/1993	XX	GW-302X03H	92	1 U			0.2	0.1 U	0.3		137	0.002 U		5
4/27/1993	XX	GW-302X04B	92	1 U			0.2 U		0.2 U					5 U
7/21/1993	XX	GW-302X05F	82	5			0.2 U		0.2					5
10/12/1993	XX	GW-302X069	92	4			0.2 U		0.2 U					5
1/11/1994	XX	GW-302X075	160	1 U			0.2 U		0.2					5
5/21/1996	XX	GW-302X08E												
11/26/1996	XX	GW-302X0AB	153	1 U										
3/26/1997	XX	MW-302827-35515	126	1 U										
6/3/1997	XX	MW-302828-35584	167	1 U										
9/10/1997	XX	MW-302829-35683	210	0.9										
12/4/1997	XX	MW-302830-35768	187	1 U										
3/25/1998	XX	MW-302831-35879	189	1 U										
6/8/1998	XX	MW-302832-35954	167	1 U										
9/9/1998	XX	MW-302833-36047	197	1 U										
12/15/1998	XX	MW-302834-36144	254	1.9										
3/30/1999	XX	MW-302835-36249	200	1.3										
6/9/1999	XX	MW-302836-36320	196	0.7										
9/13/1999	XX	MW-302837-36416	208	1.1										
12/1/1999	XX	MW-302838-36485	206	0.8										
3/27/2000	XX	MW-302839-36612	180	1.4										
6/13/2000	XX	MW-302840-36680	170	1 U										
9/12/2000	XX	MW-302841-36781	240	1.3										
12/11/2000	XX	MW-302842-36871	190	1 U										
3/12/2001	XX	MW-302843-36962	180	1 U										
6/18/2001	XX	MW-302844-37080	180	1.03										
9/10/2001	XX	MW-302845-37144	180	1 U										
12/11/2001	XX	MW-302846-37238	210	1 U										
3/13/2002	XX	MW-302847-37328	200	1 U										
6/17/2002	XX	MW-302848-37424	170	1.4										
9/18/2002	XX	MW-302849-37517	190	1 U										
12/9/2002	XX	MW-302850-37599	20	1 U										
3/25/2003	XX	MW-302851-37705	160	1.1										
6/25/2003	XX	MW-302852-37787	150	2										
9/17/2003	XX	MW-302853-37881	190	1.3										
5/6/2004	XX	GW-302X009	197	0.5 U				0.1 U	0.22		143	0.002 U		
7/27/2004	XX	GW-302XHD1	180	0.8 J				0.1 U	0.16		137	0.002 U		
10/25/2004	XX	GW-302X07C	188	1.5			0.2 U	0.1 U	0.52	0.01 U				
5/10/2005	XX	GW-302X13D	192	2.7			0.2 U		0.3 U					
7/27/2005	XX	GW-302X171	199	1.3 J			0.2 U	0.1 U	0.3 U					
9/19/2005	XX	GW-302X16J	227	2.3			0.2 U	0.1 U	0.3 U					
5/23/2006	XX	GW-302X1EE	208	3.3			0.2 U		0.85					
7/24/2006	XX	GW-302X1HB	261	1.7			0.2 U		0.37					
9/12/2006	XX	GW-302X204	258	1.1 J			0.2 U		0.49					
5/14/2007	XX	GW-302X23B	198	3.4			0.2 U		0.5 U					
7/25/2007	XX	GW-302X27F	190	1 J			0.2 U		0.3 U					
9/10/2007	XX	GW-302X2A5	DE	DE			DE		DE					
<b>MW-302R</b>														
5/20/2008	XX	GW-302X2DJ	148	2.1			0.2 U		0.3 U					

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO <sub>3</sub> )	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
7/29/2008	XX	GW302X2H3	176		1.2 J	4 U	0.2 U		0.5 U					
10/27/2008	XX	GW302X2JD	201		1.3 J	4 U	0.2 U		0.5 U					
4/13/2009	XX	GW302X331	145		3.1	4 U	0.2 U		0.5 U					
7/16/2009	XX	GW302X375	144		1.2 J	4 U	0.2 U		0.5 U					
10/27/2009	XX	GW302X3F0	306		1.5 J	4 U	0.2 U		0.3 U					
4/26/2010	XX	GW302X3JJ	78		1 J	4 U	0.2 U		0.3 U					
7/19/2010	XX	GW302X433	318		0.8 J	4 U	0.2 U		0.3 U					
10/18/2010	XX	GW302X467	327		0.9 J	4 U	0.2 U		0.3 U					
4/25/2011	XX	GW302X4A8	196		0.7 U	4 U	0.2 U		0.3 U					
7/18/2011	XX	GW302X4E6	239		0.7 J	4 U	0.2 U		0.3 U					
10/24/2011	XX	GW302X4H1	236		0.7 J	4 U	0.2 U		0.3 U					
4/23/2012	XX	GW302X52B	150		2 U	4 U	0.2 U		0.3 U					
7/23/2012	XX	GW302X57A	223		2 U	4 U	0.2 U		0.3					
10/22/2012	XX	GW302X5E1	287		2 U	4 U	0.2 U		0.64					
<b>MW-303</b>														
11/26/1996	XX	GW303X0B1	46		1 U									
3/26/1997	XX	MW-303826-35515	36		1 U									
6/2/1997	XX	MW-303829-35583	66		1 U									
9/8/1997	XX	MW-303830-35681	62		0.5 U									
12/3/1997	XX	MW-303831-35787	62		1 U									
3/25/1998	XX	MW-303832-35879	47		1 U									
6/9/1998	XX	MW-303833-35955	49		1 U									
9/8/1998	XX	MW-303834-36046	53		1 U									
12/14/1998	XX	MW-303835-36143	60		1 U									
3/29/1999	XX	MW-303836-36248	110		1.2									
6/8/1999	XX	MW-303837-36319	68		1.7 U									
9/13/1999	XX	MW-303838-36416	61		0.5									
12/1/1999	XX	MW-303839-36495	47		1.2 U									
3/27/2000	XX	MW-30394D-36612	56		1 U									
6/12/2000	XX	MW-303841-36689	42		1 U									
9/13/2000	XX	MW-303942-36782	52		1 U									
12/11/2000	XX	MW-303843-36871	19		1 U									
3/13/2001	XX	MW-303944-36963	37		1 U									
6/19/2001	XX	MW-303845-37081	57		1 U									
9/11/2001	XX	MW-303946-37145	34		1 U									
12/12/2001	XX	MW-303947-37237	56		1 U									
3/13/2002	XX	MW-303948-37328	32		1 U									
6/17/2002	XX	MW-303949-37424	23		1 U									
9/18/2002	XX	MW-303850-37517	15		1 U									
12/9/2002	XX	MW-303851-37599	38		1.2									
3/26/2003	XX	MW-30383N37706	17		1 U									
6/25/2003	XX	MW-30383N37797	11		1.3									
9/17/2003	XX	MW-30383N37891	25		1 U									
5/6/2004	XX	GW303X00C	62		0.5 U	4 U		0.1 U	0.15 U		23		0.002 U	
7/28/2004	XX	GW303X040	50		0.5 U	4 U		0.1 U	0.15 U		24		0.002 U	
10/26/2004	XX	GW303X07G	47		1.1 J	5		0.2 U	0.62	0.01 U				
10/26/2004	XD	GWDP3X06J	60		1.3 J	8		0.1 U	0.3 U	0.01 U				
5/11/2005	XX	GW303X13H	59		0.8 J	4 U		0.2 U	0.3 U					
8/1/2005	XX	GW303X175	40		0.5 U	4 U		0.1 U	0.3 U					

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

(MW-303)		Total Dissolved Solids	Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	ug/L	Colonies/100 mL	CU
8/1/2005	XD	45	0.7 J	4 U	0.2 U	0.1 U	0.3 U					
9/19/2005	XX	44	1.1 J	4 U	0.2 U	0.1 U	0.3 U					
5/23/2006	XX	68	1.4 J	4 U	0.2 U		0.3 U					
7/24/2006	XD	51	1.5	4 U	0.2 U		0.34					
7/24/2006	XX	47	1 J	4 U	0.2 U		0.37					
9/12/2006	XX	35	1 J	4 U	0.2 U		0.3 U					
5/14/2007	XX	67	1.8	4 U	0.2 U		0.66					
7/25/2007	XD	55	0.9 J	4 U	0.2 U		0.3 U					
7/25/2007	XX	49	1.3 J	4 U	0.2 U		0.3 U					
9/11/2007	XX	67	2.2	4 U	0.2 U		0.5 U					
9/11/2007	XD	57	2.2	4 U	0.2 U		0.5 U					
5/19/2008	XX	65	1.1 J	4 U	0.2 U		0.5 U					
7/29/2008	XD	67	1.4 J	4 U	0.2 U		0.5 U					
7/29/2008	XX	65	0.7 J	4 U	0.2 U		0.66					
10/27/2008	XX	81	1 J	4 U	0.2 U		0.5 U					
10/27/2008	XD	71	1 J	4 U	0.2 U		0.5 U					
4/13/2009	XX	120	1.8 J	4 U	0.2 U		1 U					
7/6/2009	XX	115	1.9 J	4 U	0.2 U		2 U					
7/6/2009	XD	115	2.1	4 U	0.2 U		1 U					
10/28/2009	XX	103	1.1 J	4 U	0.2 U		0.3 U					
4/26/2010	XX	108	1.7 J	4 U	0.2 U		0.3 U					
7/19/2010	XD	117	0.7 U	4 U	0.2 U		0.3 U					
10/18/2010	XX	111	0.7 U	6	0.2 U		0.51					
4/25/2011	XX	139	0.7 U	4 U	0.2 U		0.3 U					
7/18/2011	XD	138	0.7 J	4 U	0.2 U		0.36					
7/18/2011	XX	135	0.8 J	4 U	0.2 U		0.34					
10/24/2011	XX	132	0.8 J	4 U	0.2 U		0.3 U					
10/24/2011	XD	135	0.9 J	4 U	0.2 U		0.3 U					
4/23/2012	XX	162	2 U	5	0.2 U		0.3 U					
7/24/2012	XX	!	!	!	!		!					
<b>MW12-303R</b>												
10/23/2012	XX	143	2 U	4 U	0.2 U		0.3 U					
<b>MW-304A</b>												
7/29/2004	XX	130	0.5 U	4 U			0.15 U	0.01 U		0.002 U	TNTC	1 U
10/27/2004	XX	95	4	4 U			0.3 U	0.01 U		0.002 U	84	1 U
5/11/2005	XX	63	0.5 J	4 U	0.2 U		0.3 U					
7/28/2005	XX	61	0.7 J	4 U	0.2 U	0.1 U	0.3 U					
9/19/2005	XX	75	0.7 J	4 U	0.2 U	0.1 U	0.32					
5/24/2006	XX	92	1.2 J	4 U	0.2 U		0.44					
7/25/2006	XX	79	1.2 J	12	0.2 U		0.41					
9/12/2006	XX	70	0.9 J	4 U	0.2 U		0.3 U					
5/15/2007	XX	59	1.5	17	0.45		0.5 U					
7/24/2007	XX	91	3.3	4 U	0.2 U		0.3 U					
9/11/2007	XX	89	0.9 J	4 U	0.2 U		0.5 U					
5/20/2008	XX	55	2.3	4 U	0.2 U		0.3 U					
7/29/2008	XX	75	2	4 U	0.2 U		1 U					
10/27/2008	XX	93	1.1 J	4 U	0.2 U		0.5 U					

SUMMARY REPORT  
 Inorganics (part 2 of 2)

Date	Type	Sample ID	Total Dissolved Solids	Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	ug/L	Colonies/100 mL	CU
4/13/2009	XX	GW304A330	83	1.2 J	4 U	0.2 U		1 U					
7/16/2009	XX	GW304A374	68	0.7 U	4 U	0.2 U		2 U					
10/27/2009	XX	GW304A3EJ	83	1.8 J	4 U	0.2 U		0.3 U					
4/26/2010	XX	GW304A3J	54	0.7 U	4 U	0.2 U		0.3 U					
7/19/2010	XX	GW304A432	68	0.7 U	4 U	0.2 U		0.3 U					
10/18/2010	XX	GW304A466	70	0.7 U	259	0.2 U		0.3 U					
4/25/2011	XX	GW304A4A7	63	0.7 U	4 U	0.2 U		0.59					
7/18/2011	XX	GW304A4E5	72	0.7 U	4 U	0.2 U		0.3					
10/24/2011	XX	GW304A4I0	73	0.7 U	4 U	0.2 U		0.3 U					
4/23/2012	XX	GW304A52A	94	2 U	4 U	0.2 U		0.3 U					
7/23/2012	XX	GW304A579	95	2 U	4 U	0.2 U		0.3 U					
10/22/2012	XX	GW304A5E0	74	2 U	4 U	0.2 U		1.2					

MW-401A

7/29/2004	XX	GW401A059	87	0.5 U	4 U			0.3	0.01 U		0.002 U	TNTC	1 U
10/27/2004	XX	GW401A071	68	2	4 U			0.53	0.022		0.002 U	16	1 U
10/27/2004	XD	GWDP4X075	68	0.5 J	4			0.32	0.01 U		0.002 U	26	1 U
5/10/2005	XX	GW401A132	75	0.5 U	4 U	0.2 U		0.3 U					
7/28/2005	XX	GW401A16A	82	1 J	4 U	0.2 U	0.1 U	0.3 U					
7/28/2005	XD	GWDP4X16E	81	0.5 U	4 U	0.2 U	0.1 U	0.3 U					
9/21/2005	XX	GW401A198	80	2.1	4 U	0.2 U	0.1 U	0.3 U					
5/23/2006	XX	GW401A1E3	100	0.8 J	4 U	0.2 U		0.39					
7/25/2006	XX	GW401A1H0	79	1.1 J	4 U	0.2 U		0.43					
9/12/2006	XX	GW401A1J0	74	6.3	4 U	0.2 U		0.34					
5/14/2007	XX	GW401A230	89	6.1	4 U	0.2 U		0.5 U					
7/24/2007	XX	GW401A274	104	2.3	4 U	0.2 U		0.3 U					
9/11/2007	XX	GW401A29E	86	0.5 U	4 U	0.2 U		0.5 U					
5/20/2008	XX	GW401A2D8	116	3.3	4 U	0.2 U		0.49					
7/28/2008	XX	GW401A26C	95	2.1	4 U	0.41		0.5 U					
10/27/2008	XX	GW401A2J2	88	0.8 J	4 U	0.2 U		0.5 U					
4/13/2009	XX	GW401A32A	97	3.5	4 U	0.2 U		1 U					
7/17/2009	XX	GW401A36E	85	1.5 J	4 U	0.2 U		0.5 U					
10/28/2009	XX	GW401A3E9	91	1.1 J	4 U	0.2 U		0.3 U					
4/27/2010	XX	GW401A3J8	79	2.1	4 U	0.2 U		0.3 U					
7/20/2010	XX	GW401A42C	88	0.7 U	4 U	0.2 U		0.4					
10/20/2010	XX	GW401A45G	89	0.7 U	4 U	0.2 U		0.3 U					
4/25/2011	XX	GW401A48H	83	0.7 U	4 U	0.2 U		0.3 U					
7/18/2011	XX	GW401A4DF	89	0.7 U	4 U	0.2 U		0.3 U					
10/24/2011	XX	GW401A4HA	76	0.7 U	4 U	0.2 U		0.3 U					
4/23/2012	XX	GW401A520	89	2 U	4 U	0.2 U		0.3 U					
7/23/2012	XX	GW401A56J	97	2 U	4 U	0.2 U		0.36					
10/22/2012	XX	GW401A5DA	94	2 U	4 U	0.2 U		1.1					

MW-401B

7/29/2004	XD	GWDP4X05D	335	2.8	4 U			0.15 U	0.042		0.002 U	73	10
7/29/2004	XX	GW401B05A	346	3.3	4 U			0.24	0.034		0.002 U	103	10
10/27/2004	XX	GW401B072	409	4.6	11			0.38	0.048		0.002 U	25	100
5/10/2005	XD	GWDP4X136	327	3	35	3.6		0.3 U					
5/10/2005	XX	GW401B133	307	3.2	36	3.6		0.3 U					
7/27/2005	XX	GW401B16B	387	3.3	12	0.65	0.1 U	0.3 U					

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

Page 25 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
9/21/2005	XX	GW401B199	488	4.6	14	0.81	0.1 U	0.36						
9/21/2005	XD	GWDP4X19C	471	4.9	15	0.76	0.1 U	0.3 U						
5/23/2006	XX	GW401B1E4	312	2.7	4 U	0.2 U		0.48						
5/23/2006	XD	GWDP4X1E7	307	4	6	0.2 U		0.4						
7/25/2006	XX	GW401B1H1	305	3	4 U	0.2 U		0.68						
9/12/2006	XD	GWDP3X1J8	292	2.6	4 U	1.7		0.38						
9/12/2006	XX	GW401B1JE	295	4.4	4 U	2		0.45						
5/14/2007	XD	GWDP4X234	231	2.2	4	0.22		0.5 U						
5/14/2007	XX	GW401B231	233	3.4	5	0.2		0.5 U						
7/24/2007	XX	GW401B275	275	4.3	4 U	0.2 U		0.3 U						
9/11/2007	XD	GWDP4X291	299	2	4	0.28		0.5 U						
9/11/2007	XX	GW401B29F	292	3.3	5	0.2 U		0.5 U						
5/20/2008	XX	GW401B2D9	197	1.6 J	4 U	0.2 U		0.3 U						
5/20/2008	XD	GWDP4X2DC	193	1.5 J	4 U	0.2 U		0.3 U						
7/28/2008	XX	GW401B2GD	257	2.8	4 U	0.2 U		0.5 U						
10/27/2008	XD	GWDP4X2J6	250	3.8	4 U	0.2 U		0.5 U						
10/27/2008	XX	GW401B2J3	243	3.7	4 U	0.2 U		0.5 U						
4/13/2009	XD	GWDP4X32E	188	4.8	4 U	0.2 U		0.5 U						
4/13/2009	XX	GW401B32B	178	2.2	4 U	0.2 U		3.2						
7/7/2009	XX	GW401B36F	185	3.6	4 U	0.2 U		0.5 U						
10/28/2009	XD	GWDP3X3E7	222	1.8 J	4 U	0.2 U		0.3 U						
10/28/2009	XX	GW401B3EA	220	2.4	4 U	0.2 U		0.34						
4/27/2010	XX	GW401B3J9	142	1.3 J	4 U	0.2 U		0.3 U						
4/27/2010	XD	GWDP4X3JC	150	2.4	4 U	0.2 U		0.3 U						
7/20/2010	XX	GW401B42D	208	0.8 J	4 U	0.22		0.57						
7/20/2010	XD	GWDP3X42A	212	0.8 J	4 U	0.2 U		0.3 U						
10/20/2010	XX	GW401B49H	204	0.7 J	4 U	0.47		0.3 U						
10/20/2010	XD	GWDP4X460	209	0.7 J	4 U	0.25		0.3 U						
4/25/2011	XD	GWDP4X4A1	164	0.7 U	4 U	0.2 U		0.3 U						
4/25/2011	XX	GW401B49I	165	0.7 U	4 U	0.2 U		0.3 U						
7/18/2011	XX	GW401B4DG	184	0.7 J	4 U	0.2 U		0.45						
7/18/2011	XD	GWDP1X4D2	188	0.7 J	4 U	0.2 U		0.3 U						
10/24/2011	XX	GW401B44B	183	1.1 J	4 U	0.4 U		0.3 U						
4/23/2012	XX	GW401B521	173	2 U	4 U	0.2 U		0.3 U						
4/23/2012	XD	GWDP4X524	177	2 U	4 U	0.2 U		0.3 U						
7/23/2012	XX	GW401B570	181	2 U	4 U	0.2 U		0.3 U						
7/23/2012	XD	GWDP4X586	172	2 U	4 U	0.2 U		0.3 U						
10/22/2012	XX	GW401B5DB	201	2 U	4 U	0.2 U		0.94						

**MW-402 A**

7/29/2004	XX	GW402A05B	75	0.5 U	4 U			0.15 U		0.01 U		0.002 U	6	1 U
10/27/2004	XX	GW402A073	67	0.7 J	4 U			0.3 U		0.01 U		0.002 U	2	1 U
5/11/2005	XX	GW402A134	81	2	4 U	0.2 U		0.3						
8/1/2005	XX	GW402A16C	78	0.5 U	4 U	0.2 U	0.1 U	1						
9/21/2005	XX	GW402A19A	78	2.2	4 U	0.2 U	0.1 U	0.3 U						
5/23/2006	XX	GW402A1E5	89	2.2	4 U	0.2 U		0.3 U						
7/26/2006	XX	GW402A1H2	80	1.6	4 U	0.2 U		0.3 U						
9/12/2006	XX	GW402A1JF	66	1.6	4 U	0.2 U		0.82						
5/15/2007	XX	GW402A232	73	5	4 U	0.24		0.5 U						
7/25/2007	XX	GW402A276	76	1.3 J	4 U	0.2 U		0.3 U						

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Inorganics (part 2 of 2)

Page 26 of 34

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
9/12/2007	XX	GW402A29G	90	0.5 U		4 U	0.2 U		0.3 U					
5/20/2008	XX	GW402A2DA	76	1.9 J		4 U	0.2 U		0.3 U					
7/28/2008	XX	GW402A2GE	87	1.8 J		4 U	0.2 U		0.5 U					
10/27/2008	XX	GW402A2J4	83	1.4 J		4 U	0.2 U		0.5 U					
4/14/2009	XX	GW402A32C	94	8.1		4 U	0.2 U		0.5 U					
7/8/2009	XX	GW402A36G	77	0.7 U		4 U	0.2 U		0.5 U					
10/28/2009	XX	GW402A3EB	85	1.5 J		4 U	0.2 U		0.3 U					
4/27/2010	XX	GW402A3JA	58	1.6 J		4 U	0.2 U		0.3 U					
7/21/2010	XX	GW402A42E	87	0.7 U		4 U	0.2 U		0.34					
10/20/2010	XX	GW402A45I	89	0.7 U		4 U	0.2 U		0.3 U					
4/27/2011	XX	GW402A48J	78	0.7 U		4 U	0.2 U		0.3 U					
7/20/2011	XX	GW402A4DH	80	0.7 U		4 U	0.2 U		0.54					
10/26/2011	XX	GW402A4HC	86	0.7 U		4 U	0.2 U		0.3 U					
4/24/2012	XX	GW402A52Z	70	2 U		4 U	0.2 U		0.3 U					
7/25/2012	XX	GW402A57I	80	2 U		4 U	0.2 U		0.3 U					
10/24/2012	XX	GW402A5DC	83	2 U		4 U	0.2 U		0.31					

MW-402B

7/29/2004	XX	GW402B05C	96	0.5 U		4 U			0.21	0.01 U		0.002 U	216	1 U
10/27/2004	XX	GW402B074	82	2.8		5			0.4	0.01 U		0.002 U	5	1 U
5/11/2005	XX	GW402B135	101	0.9 J		4 U	0.2 U		0.4					
8/1/2005	XX	GW402B16D	88	1 J		4 U	0.2 U	0.1 U	0.3 U					
9/21/2005	XD	GWDFX196	94	2.2		4 U	0.2 U	0.1 U	0.3 U					
9/21/2005	XX	GW402B198	95	2.1		4 U	0.2 U	0.1 U	0.3 U					
5/23/2006	XX	GW402B1E8	116	0.8 J		4 U	0.2 U		0.45					
7/26/2006	XX	GW402B1H3	97	0.9 J		4 U	0.2 U		0.3 U					
9/12/2006	XX	GW402B1JG	84	0.5 J		4 U	0.2 U		0.3 U					
5/15/2007	XX	GW402B233	82	5.2		4 U	0.26		0.5 U					
7/25/2007	XX	GW402B277	90	1.6		4 U	0.2 U		0.3 U					
9/12/2007	XX	GW402B29H	101	0.7 J		4 U	0.2 U		0.3 U					
5/20/2008	XX	GW402B2DB	93	4.4		4 U	0.2 U		0.3 U					
7/28/2008	XX	GW402B2GF	124	0.8 J		4 U	0.2 U		0.5 U					
10/27/2008	XX	GW402B2J5	89	0.9 J		4 U	0.2 U		0.5 U					
4/14/2009	XX	GW402B32D	98	2.5		4 U	0.2 U		0.5 U					
7/8/2009	XX	GW402B36H	89	0.8 J		4 U	0.2 U		0.5 U					
10/28/2009	XX	GW402B3EC	93	1.7 J		4 U	0.2 U		0.3 U					
4/27/2010	XX	GW402B3JB	64	3.5		4 U	0.2 U		0.3 U					
7/21/2010	XX	GW402B42F	93	0.7 U		4 U	0.2 U		0.38					
10/20/2010	XX	GW402B45J	102	0.7 U		4 U	0.2 U		0.3 U					
4/27/2011	XX	GW402B4A0	92	0.7 U		4 U	0.2 U		0.3 U					
7/20/2011	XX	GW402B4DI	92	0.7 U		4 U	0.2 U		0.61					
10/26/2011	XX	GW402B4HD	100	0.7 U		4 U	0.2 U		0.3 U					
4/24/2012	XX	GW402B523	88	2 U		4 U	0.2 U		0.3 U					
7/25/2012	XX	GW402B57Z	91	2 U		4 U	0.2 U		0.3 U					
10/24/2012	XX	GW402B5DD	97	2 U		4 U	0.2 U		0.3 U					

P-04-02

2/5/2004	XX	GWXXXX03E	275	10		8								168
2/11/2004	XX	GWXXXX03C	166	3.4		4 U								160
5/5/2004	XX	GWXXXX00E	151	0.8 J		4 U	0.2 U	0.1 U	0.22	0.01 U				



SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

REPORT PREPARED: 1/17/2013 13:57  
FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
10/20/2010	XX	GWXXX46E	119	0.7 U	4 U	0.2 U	0.3 U							
4/27/2011	XX	GWXXX4AF	104	0.7 U	4 U	0.2 U	0.3 U							
7/20/2011	XX	GWXXX4ED	112	0.7 U	4 U	0.2 U	0.36							
10/26/2011	XX	GWXXX4I8	122	0.8 J	4 U	0.2 U	0.7							
4/25/2012	XX	GWXXX52I	114	2 U	4 U	0.2 U	0.3 U							
7/25/2012	XX	GWXXX57H	95	2 U	4 U	0.2 U	0.3 U							
10/24/2012	XX	GWXXX5E8	111	2 U	4 U	0.2 U	0.3 U							
<b>PWS10-1</b>														
4/26/2010	XX	GWPS13J	148	9.9	4 U	2.3								
7/19/2010	XX	GWPS1423	154	8.3	786	1.4								
10/18/2010	XX	GWPS1457	176	7.5	12	1								
4/25/2011	XX	GWPS1498	154	7.5	4 U	1.4								
7/18/2011	XX	GWPS14DB	171	8.4	42	1.1								
10/24/2011	XX	GWPS14H1	134	19.7	16	5								
4/23/2012	XX	GWPS151B	132	10.5	8	1.2								
7/23/2012	XX	GWPS156A	104	13.7	32	3.4								
10/22/2012	XX	GWPS15D1	130	13.3	25	1.8								
<b>PWS10-2</b>														
4/26/2010	XX	GWPS23J0	59	8.2	7	1.4								
7/19/2010	XX	GWPS2424	81	9.2	182	2								
10/18/2010	XX	GWPS2458	88	14.7	4 U	2.6								
4/25/2011	XX	GWPS2489	60	7.3	4 U	1 U								
7/18/2011	XX	GWPS24D7	107	9.9	4 U	1.2								
10/24/2011	XX	GWPS24H2	76	10.2	78	1.7								
4/23/2012	XX	GWPS251C	79	11.5	4 U	1.9								
7/23/2012	XX	GWPS256B	90	13	4 U	5.1								
10/22/2012	XX	GWPS25D2	75	10.2	4	1 U								
<b>PWS10-3</b>														
4/26/2010	XX	GWPS33J1	113	2.1	5	0.45								
7/19/2010	XX	GWPS3425	124	10.4	36	1.9								
10/18/2010	XX	GWPS3459	103	19.3	34	4.6								
4/25/2011	XX	GWPS349A	105	4	4 U	1.1								
7/18/2011	XX	GWPS34DB	112	14.9	101	2.3								
10/24/2011	XX	GWPS34H3	95	13.4	10	3.7								
4/23/2012	XX	GWPS351D	66	7.5	60	1.1								
7/23/2012	XX	GWPS356C	89	13.8	18	3.1								
10/22/2012	XX	GWPS35D3	83	19	15	3.1								
<b>SW-1</b>														
11/13/1990	XD	SW-1XD33160	54	13		2.8	0.6						100	
11/13/1990	XX	SW-1XX33190	50	12		2.7	0.5						100	
2/19/1991	XX	SW-1XX33288	F	F	F	F	F					F	F	
6/4/1991	XX	SW-1XX33393	67	15		2.3	0.69						150	
9/16/1991	XX	SW-1XX33497	68	12		1.7	1						75	
12/18/1991	XX	SWXX1X00B	50	7.8		1.5	0.46						75	
3/2/1992	XX	SWXX1X019	F	F		F	F						F	
6/23/1992	XX	SWXX1X024	62	14		1.8	0.9						200	
8/17/1992	XX	SWXX1X033	73	10		1.4	1						150	

**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

(SW-1)	Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)		Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
				mg/L	mg/L			mg/L	mg/L							
1/26/1993	XX		SWXX1X03J	69	8			2.6			0.8				100	
4/27/1993	XX		SWXX1X049	38	11			0.2 U			0.4				50	
7/21/1993	XX		SWXX1X051	76	11			1.5			1.5				180	
10/12/1993	XX		SWXX1X06A	45	13			2.2			0.5				60	
1/11/1994	XX		SWXX1X076	86	10			2.3			0.8				100	
5/21/1996	XX		SWXX1X09F	64	12			2.3			0.48				106	
11/25/1996	XX		SWXX1X0AH	48	13			3							92	
3/26/1997	XX		SW-1816-35515	F	F			F							F	
6/4/1997	XX		SW-1817-35585	108	14			2.4							200	
9/11/1997	XX		SW-1818-35684	79	14.4			3							133	
12/8/1997	XX		SW-1819-35772	80	13.8			3.1							138	
3/25/1998	XX		SW-1820-35879	54	7.2			0.6							75	
6/9/1998	XX		SW-1821-35955	69	8.1			1.8							100	
9/10/1998	XX		SW-1822-36048	94	12.4			2.1							133	
12/15/1998	XX		SW-1823-36144	98	16.1			3							100	
3/30/1999	XX		SW-1824-36249	69	5.7			1.2							35	
6/9/1999	XX		SW-1825-36320	94	11.7			1.6							100	
9/15/1999	XX		SW-1826-36418	100	13			1.7							60	
12/2/1999	XX		SW-1827-36498	89	11.1			2							88	
3/28/2000	XX		SW-1828-36613	67	5.2			2.1							30	
6/13/2000	XX		SW-1829-36680	91	10			1.5							30	
9/13/2000	XX		SW-1830-36782	89	14			3.4							180	
6/19/2001	XX		SW-1831-37061	100	13			2.5							100	
9/11/2001	XX		SW-1832-37145	77	14			2.6							100	
12/12/2001	XX		SW-1833-37237	60	12			3							50	
3/14/2002	XX		SW-1834-37329	30	8.8			3.4							30	
6/18/2002	XX		SW-1835-37425	60	14			3.5							70	
9/19/2002	XX		SW-1836-37518	59	15			2.1							90	
6/26/2003	XX		SW-1N37798	130	34			3.3							150	
9/18/2003	XD		SW-1D37882	120	18			4.2							100	
9/18/2003	XX		SW-1N37882	110	20			3.7							100	
5/3/2004	XX		SWXX1X018	82	13.1		5	2.5	0.1 U							
7/27/2004	XX		SWXX1X04E	103	18.4		9	4.5	0.1 U							
10/26/2004	XX		SWXX1X069	76	14.3		4 U	3.4	0.1 U							
5/10/2005	XX		SWXX1X12A	61	10.1		4 U	2.2								
7/28/2005	XX		SWXX1X151	67	14.3		13	3.5	0.1 U							
9/20/2005	XX		SWXX1X18G	159	9.8		55	1.1	0.1 U							
5/24/2006	XX		SWXX1X1DB	184	10.2		22	0.94								
7/26/2006	XD		SWDP2X1GE	85	20.4		6	3								
7/26/2006	XX		SWXX1X1G8	90	20.6		17	2.5								
9/13/2006	XX		SWXX1X1U1	181	11.4		28	0.31								
5/15/2007	XD		SWDP2X2ZE	58	8.3		4 U	1.9								
5/15/2007	XX		SWXX1X228	59	7.9		4 U	2								
7/24/2007	XD		SWDP2X28I	98	17.3		4 U	2.7								
7/24/2007	XX		SWXX1X26C	93	16.6		4 U	2.4								
9/11/2007	XX		SWXX1X292	90	15.6		11	2.2								
5/21/2008	XX		SWXX1X2CG	71	12.5		14	2.1								
5/21/2008	XD		SWDP2X2D2	67	9.5		14	2.1								
7/29/2008	XX		SWXX1X2G0	I	I		I	I								
10/28/2008	XX		SWXX1X2IA	70	12.5		4 U	2.1								

SUMMARY REPORT  
 Inorganics (part 2 of 2)

Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
			mg/L	mg/L										
4/14/2009	XX	SWXX1X311	85	9.8	4 U	1.4								
7/7/2009	XX	SWXX1X362	85	15	4 U	3.9								
10/27/2009	XX	SWXX1X3DH	69	12.5	39	2.6								
4/28/2010	XX	SWXX1X3IG	61	9.1	4 U	2.5								
7/20/2010	XX	SWXX1X420	230	7.3	1490	1								
10/19/2010	XX	SWXX1X454	101	18.8	4 U	0.87								
4/26/2011	XX	SWXX1X495	70	8	5	1.7								
7/19/2011	XX	SWXX1X4D3	157	8.4	144	0.89								
10/25/2011	XX	SWXX1X4GI	64	13.4	11	3.8								
4/24/2012	XX	SWXX1X518	65	10.8	4 U	2.2								
7/24/2012	XX	SWXX1X567	89	13.8	15	4								
10/23/2012	XX	SWXX1X5CI	104	9.6	13	1.7								
<b>SW-2</b>														
11/13/1990	XX	SW-2XX33190	43	8.6		1.8		0.7						70
2/20/1991	XD	SW-2XD33289	71	17		2.3		7.5	1					75
2/20/1991	XX	SW-2XX33289	78	1 U		2.3		1.3	2					100
6/4/1991	XX	SW-2XX33393	62	14		2.9		0.68						100
9/17/1991	XX	SW-2XX33498	51	16		3.1		1.8						100
12/18/1991	XX	SWXX2X00C	46	8.4		1.8		0.49						100
3/2/1992	XD	SWXX2XHA0	70	9		2		2.5						90
3/2/1992	XX	SWXX2X01A	60	6		2		3.4						75
6/23/1992	XX	SWXX2X025	63	15		2.2		0.2 U						150
8/17/1992	XX	SWXX2X034	67	20		2.6		2.1						130
1/26/1993	XX	SWXX2X040	49	8		2.7		0.8						140
1/27/1993	XD	SWXX2XHA5	59	13		2.8		1.1						120
4/27/1993	XX	SWXX2X04A	40	8		2.3		0.8						70
7/21/1993	XX	SWXX2X052	71	21		2.6		0.5						140
10/13/1993	XX	SWXX2X06B	30	16		3		0.4						70
1/11/1994	XX	SWXX2X077	110	15		3.8		0.9						140
5/21/1996	XX	SWXX2X09G	66	14		3.5		0.62						125
11/25/1996	XD	SWDP2X0AG	52	13		3.8								96
11/25/1996	XX	SWXX2X0AI	49	14		3.7								96
3/26/1997	XX	SW-2818-35515	58	11		3								80
6/4/1997	XX	SW-2819-35585	96	15		2.8								150
9/11/1997	XX	SW-2820-35684	75	20.5		3.9								200
12/8/1997	XX	SW-2821-35772	91	18.5		4.7								200
3/25/1998	XX	SW-2822-35879	88	10.5		0.8								150
6/9/1998	XX	SW-2823-35955	62	10.8		3.3								125
9/10/1998	XX	SW-2824-36048	111	15.1		4.4								150
12/15/1998	XX	SW-2825-36144	67	18.9		3.8								138
3/30/1999	XX	SW-2826-36249	68	6.2		1.6								60
6/9/1999	XX	SW-2827-36320	75	13.2		2.3								150
9/15/1999	XX	SW-2828-36418	90	14.7		2								88
12/2/1999	XX	SW-2829-36496	65	14.7		3.1								150
3/28/2000	XX	SW-2830-36613	57	5.2		1.5								35
6/13/2000	XX	SW-2831-36690	75	11		3.5								50
9/13/2000	XX	SW-2832-36782	90	15		3.4								70
12/12/2000	XX	SW-2833-36872	2	6.2		1.6								20
6/19/2001	XX	SW-2834-37061	71	12		2.4								70





**SUMMARY REPORT**  
**Inorganics (part 2 of 2)**

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

(SW-3)	Date	Type	Sample ID	Total Dissolved Solids		Organic Carbon	Total Suspended Solids	Tannin & Lignins (Tannic Acid)	Sulfide	Total Kjeldahl Nitrogen	Total Organic Halides	Alkalinity (CaCO3)	Cyanide	Total Coliform	Apparent Color
				mg/L	mg/L										
5/15/2007	XX	SWXX322A		51	8.5	4 U	1.8								
7/24/2007	XX	SWXX326E		83	13.1	4 U	1.7								
9/11/2007	XX	SWXX3294		74	12.6	4 U	1.3								
5/21/2008	XX	SWXX32C1		66	10.9	7	1.8								
7/29/2008	XX	SWXX32G2		121	14.8	4 U	3.1								
10/28/2008	XX	SWXX32C2		76	12.9	4 U	1.9								
4/14/2009	XX	SWXX3320		63	9.2	4 U	1.6								
7/7/2009	XX	SWXX3364		80	16.6	4 U	2.9								
10/27/2009	XX	SWXX33D1		74	11.4	4 U	2.3								
4/28/2010	XX	SWXX33I1		50	8.5	4	2								
7/20/2010	XX	SWXX3422		86	8.9	16	1.2								
10/19/2010	XX	SWXX3456		97	17.2	4 U	4.1								
4/26/2011	XX	SWXX3497		57	7.3	4 U	1.4								
7/19/2011	XX	SWXX34D5		85	11.8	4 U	1.3								
10/25/2011	XX	SWXX34H0		72	12.9	4 U	2.5 U								
4/24/2012	XX	SWXX351A		58	11.3	4 U	2.2								
7/24/2012	XX	SWXX3569		79	11.1	4	2.5 U								
7/24/2012	XD	SWDP256D		76	11	4 U	2.5 U								
10/23/2012	XX	SWXX35D0		74	12.1	4 U	2.5 U								
<b>SW-DP1</b>															
5/3/2004	XX	SWDP1X01H		200	7.5	4 U	0.69	0.1 U							
7/27/2004	XX	SWDP1X053		262	13.3	4 U	1	0.1 U							
10/26/2004	XX	SWDP1X06H		155	3.5	4 U	0.36	0.1 U							
5/10/2005	XX	SWDP1X121		87	11.4	6	2								
7/28/2005	XX	SWDP1X166		83	4.7	14	0.55	0.1 U							
9/20/2005	XX	SWDP1X184		172	3.4	13	1.1	0.1 U							
5/24/2006	XX	SWDP1X1D1		162	4.5	5	0.2 U								
7/26/2006	XX	SWDP1X1G6		149	12.9	115	0.48								
9/13/2006	XX	SWDP1X1J9		95	4.4	4 U	0.2								
5/15/2007	XX	SWDP1X22G		115	4.2	4 U	0.53								
7/24/2007	XX	SWDP1X270		90	4.5	4 U	0.2 U								
9/11/2007	XX	SWDP1X29A		73	3.7	4 U	0.2 U								
5/21/2008	XX	SWDP1X2D4		102	3.6	4 U	0.2 U								
7/29/2008	XX	SWDP1X2G8		94	8.4	5	0.21								
10/28/2008	XX	SWDP1X2I1		139	3	13	0.2 U								
4/14/2009	XX	SWDP1X326		145	3.6	12	0.29								
7/7/2009	XX	SWDP1X36A		81	4.5	4 U	0.26								
10/27/2009	XX	SWDP1X3E5		83	3.5	6	0.47								
4/28/2010	XX	SWDP1X3J4		116	2.9	5	0.2 U								
7/20/2010	XX	SWDP1X428		68	3.7	4 U	0.2 U								
10/19/2010	XX	SWDP1X45C		102	2.2	4 U	0.3								
4/26/2011	XX	SWDP1X49D		85	2.3	6	0.5 U								
7/19/2011	XX	SWDP1X4DB		92	4.1	4 U	0.2 U								
10/25/2011	XX	SWDP1X4H6		51	3	5	0.3								
4/24/2012	XX	SWDP1X51G		90	2.4	65	1.2								
7/24/2012	XX	SWDP1X56F		97	3.3	6	0.4 U								
10/23/2012	XX	SWDP1X5D6		90	2.2	46	1 U								
<b>SW-DP6</b>															



SUMMARY REPORT  
 Metal (part 1 of 2)

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
1/30/2004	XX	GWDP4X039			0.001 U				105				5.1		24	4.5		
5/6/2004	XX	GWXXXX00D			0.004				55				1.26		23	3.4		
7/26/2004	XX	GWXXXX041			0.004				32				1.75	0.002 U	9.3	1.27		
10/26/2004	XX	GWXXXX07H			0.005				19				0.73		5.2	0.88		
5/9/2005	XX	GWXXXX13I			0.003 J			0.0002 U	26			0.01 U	0.6		8.3	1.04		
8/1/2005	XX	GWXXXX176			0.001 U			0.0002 U	32			0.001 U	0.67		9.2	1.24		
9/20/2005	XX	GWXXXX1A4			0.003 J			0.0002 J	38			0.001 J	0.5		10.5	1.31		
5/22/2006	XX	GWXXXX1EJ			0.001 J			0.0012	26			0.003	0.72		5.7	0.77		
7/24/2006	XX	GWXXXX1HG			0.001 U			0.0002 U	37			0.001 U	0.51		10.5	1.42		
9/11/2006	XX	GWXXXX209			0.004			0.0003 J	42			0.001 U	0.57		10.5	1.44		
5/14/2007	XX	GWXXXX23G			0.004			0.0008	34			0.007	0.94		9.7	1.67		
7/23/2007	XX	GWXXXX280			0.001 U			0.0005 J	37			0.001 U	0.65		10.5	2		
9/10/2007	XX	GWXXXX2AA			0.001 U			0.0006	42			0.002 J	0.88		10.5	1.75		
5/19/2008	XX	GWXXXX2E4			0.003 J			0.001 U	44.9			0.003 U	1.91		12	2.29		
7/29/2008	XX	GWXXXX2H8			0.002 U			0.0002 U	42.2			0.001 U	0.67		11	2.32		
10/27/2008	XX	GWXXXX2JI			0.002 U			0.0002 U	37.4			0.01 U	1.18		9.8	1.98		
4/13/2009	XX	GWXXXX336			0.002 J			0.0005 J	45.7			0.005	2.26		12.4	2.71		
7/6/2009	XX	GWXXXX37A			0.009			0.0002 J	46.5			0.001 J	1.32		12.4	2.33		
10/26/2009	XX	GWXXXX3F5			0.015			0.0008	38.6			0.003	1.02		9.9	1.96		
4/26/2010	XX	GWXXXX404			0.008			0.0002 J	28			0.001 U	0.69		7.2	1.79		
7/19/2010	XX	GWXXXX438			0.016			0.0002 U	31.9			0.001 U	0.61		8.7	1.38		
10/18/2010	XX	GWXXXX46C			0.009			0.0002 U	30.9			0.001 J	0.34		7.2	1.4		
4/25/2011	XX	GWXXXX4AD			0.012			0.0002 U	26.3			0.001 U	0.28		7.2	1.48		
7/18/2011	XX	GWXXXX4EB			0.016			0.0007	25.5			0.001 U	0.22		7.4	1.38		
10/24/2011	XX	GWXXXX4I6			0.002 U			0.0002 U	29.2			0.001 U	0.24		8	1.68		
4/25/2012	XX	GWXXXX52G			0.011			0.0006 U	29.2			0.003 U	0.55		7.7	1.85		
7/25/2012	XX	GWXXXX57F			0.011			0.0006 U	25.8			0.003 U	0.46		7.6	1.59		
10/24/2012	XX	GWXXXX5E6			0.006			0.0006 U	25.2			0.003 U	0.52		7.9	1.92		
<b>LF-COMP</b>																		
7/19/2011	XX	LFXXXX4F1			0.014			0.0002 U	44.3			0.001 U	0.02 U		10	0.02 U		
4/24/2012	XX	LFXXXX3B			0.008			0.0006 U	41.4			0.006	0.1		9.2	0.05 U		
<b>LF-UD-1</b>																		
7/28/2004	XX	LFUD1X05E			0.003 J				31				0.02 J	0.002 J	8.4	0.02 U		
10/27/2004	XX	LFUD1X076			0.002 J				25				0.02 U		7.4	0.02 U		
5/11/2005	XX	LFUD1X137			0.001 J			0.0002 U	29			0.01 J	0.03 J		8.1	0.02 U		
7/27/2005	XX	LFUD1X16F			0.002 J			0.0002 U	29			0.001 J	0.02 J		7.9	0.02 J		
9/21/2005	XX	LFUD1X19D			0.001 J			0.0002 U	32			0.003	0.02 J		7.9	0.02 U		
5/24/2006	XX	LFUD1X1E8			0.004			0.0004 J	30			0.001 U	0.02 J		8.5	0.02 U		
7/25/2006	XX	LFUD1X1H5			0.001 J			0.0002 U	29			0.002 J	0.02 J		8.5	0.02 U		
9/11/2006	XX	LFUD1X1JI			0.002 J			0.0006	33			0.001 U	0.3		9.5	0.02 J		
5/16/2007	XX	LFUD1X235			0.002 J			0.001	36			0.003	0.02 U		10.5	0.02 J		
7/25/2007	XX	LFUD1X279			0.001 J			0.0002 U	39			0.002 J	0.1		9.9	0.02 U		
9/12/2007	XX	LFUD1X29J			I			I	I			I	I		I	I		
5/20/2008	XX	LFUD1X2DD			0.005 J			0.001 U	40.4			0.003 U	0.02 J		10.4	0.02 U		
7/28/2008	XX	LFUD1X2GH			0.002 U			0.0002 U	41.8			0.001 U	0.02 J		9.6	0.02 U		
10/28/2008	XX	LFUD1X2J7			0.002 U			0.0002 U	45.1			0.01 U	0.02 U		10.6	0.02 U		
4/15/2009	XX	LFUD1X32F			0.002 U			0.0002 U	53.6			0.001 U	0.02 U		11.3	0.02 U		

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Metal (part 1 of 2)

Page 2 of 34  
 SEVVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
7/18/2009	XX	LFUD1X36J			H2			H2	H2			H2	H2		H2	H2		
10/27/2009	XX	LFUD1X3EE			H2			H2	H2			H2	H2		H2	H2		
4/27/2010	XX	LFUD1X3JD			0.007			0.0002 U	47			0.001 U	0.02 J		10.6	0.02 U		
7/20/2010	XX	LFUD1X42H			F6			F6	F6			F6	F6		F6	F6		
10/19/2010	XX	LFUD1X46I			F6			F6	F6			F6	F6		F6	F6		
4/26/2011	XX	LFUD1X4A2			0.014			0.0004 J	42.8			0.001 U	0.02 U		9.3	0.02 U		
7/19/2011	XX	LFUD1X4E0			0.014			0.0002 U	45.2			0.001 U	0.03 J		9.8	0.02 U		
10/25/2011	XX	LFUD1X4HF			0.002 U			0.0002 U	43.2			0.001 U	0.03 J		11.4	0.02 U		
4/24/2012	XX	LFUD1X625			H2			H2	H2			H2	H2		H2	H2		
7/24/2012	XX	LFUD1X674			0.007			0.0006 U	44.3			0.004	0.13		12.2	0.05 U		
10/23/2012	XX	LFUD1X6DF			F6			F6	F6			F6	F6		F6	F6		
<b>LF-UD-2</b>																		
7/28/2004	XX	LFUD2X05F			0.003 J				29				0.04 J	0.001 U	8	0.02 U		
10/27/2004	XX	LFUD2X077			0.006				25				0.02 U		7.2	0.02 J		
5/11/2005	XX	LFUD2X138			0.002 J			0.0002 U	20			0.01 U	0.04 J		6.1	0.02 U		
7/27/2005	XX	LFUD2X16G			0.001 J			0.0002 U	29			0.001 U	0.02 J		8.1	0.02 J		
9/21/2005	XX	LFUD2X10E			0.002 J			0.0002 U	30			0.003	0.02 J		7	0.02 U		
5/24/2006	XX	LFUD2X1E9			0.004			0.0005 J	23			0.001 U	0.05 J		6.6	0.02 U		
7/25/2006	XX	LFUD2X1H6			0.001 J			0.0002 J	26			0.001 J	0.02 J		7.1	0.02 U		
9/11/2006	XX	LFUD2X1JJ			0.003 J			0.0004 J	38			0.001 U	0.18		11	0.02 U		
5/16/2007	XX	LFUD2X236			0.004			0.0003 J	30			0.001 J	0.02 U		8.2	0.02 J		
7/25/2007	XX	LFUD2X27A			0.001 U			0.0002 U	30			0.001 J	0.05 J		8.1	0.02 U		
9/12/2007	XX	LFUD2X2A0			0.001 U			0.0002 U	35			0.001 U	0.02 U		8	0.02 J		
5/20/2008	XX	LFUD2X2DE			0.003 J			0.001 U	34.1			0.003 U	0.02 U		8.2	0.02 U		
7/28/2008	XX	LFUD2X2GI			0.002 U			0.0002 U	33.5			0.001 U	0.02 J		7.9	0.02 U		
10/29/2008	XX	LFUD2X2J8			0.002 U			0.0002 U	33.9			0.01 U	0.02 U		7.8	0.02 U		
4/15/2009	XX	LFUD2X32G			0.004 J			0.0002 U	38.8			0.001 U	0.02 U		8.8	0.02 U		
7/18/2009	XX	LFUD2X370			H2			H2	H2			H2	H2		H2	H2		
10/27/2009	XX	LFUD2X3EF			H2			H2	H2			H2	H2		H2	H2		
4/27/2010	XX	LFUD2X3JE			0.005			0.0002 U	44.8			0.001 U	0.03 J		9.8	0.02 U		
7/20/2010	XX	LFUD2X42I			0.013			0.0002 U	50.5			0.001 U	0.02 U		10.9	0.02 U		
10/19/2010	XX	LFUD2X462			0.01			0.0002 U	64.3			0.001 U	0.13		12.3	0.02 J		
4/26/2011	XX	LFUD2X4A3			0.009			0.0003 J	30.7			0.001 U	0.02 U		8	0.02 U		
7/19/2011	XX	LFUD2X4E1			0.014			0.0002 U	33.6			0.001 U	0.02 U		8.9	0.02 U		
10/25/2011	XX	LFUD2X4HG			0.002 U			0.0002 U	34.2			0.001 J	0.02 U		8.9	0.02 U		
4/24/2012	XX	LFUD2X626			H2			H2	H2			H2	H2		H2	H2		
7/24/2012	XX	LFUD2X675			0.005 U			0.0006 U	39			0.003 U	0.05 U		10.4	0.05 U		
10/23/2012	XX	LFUD2X6DG			0.01			0.0006 U	35.6			0.003 U	0.05 U		9.9	0.05 U		
<b>LF-UD-3A,B</b>																		
5/16/2007	XX	LFUD3X246			0.003 J			0.0004 J	60			0.002 J	0.02 U		11.5	0.02 U		
7/25/2007	XX	LFUD3X288			F6			F6	F6			F6	F6		F6	F6		
9/12/2007	XX	LFUD3X2AI			F6			F6	F6			F6	F6		F6	F6		
5/20/2008	XX	LFUD3X2EE			0.003 U			0.001 U	46.4			0.003 U	0.02 U		8.2	0.12		
7/28/2008	XX	LFUD3X2HG			D			D	D			D	D		D	D		
10/29/2008	XX	LFUD3X306			F6			F6	F6			F6	F6		F6	F6		
4/15/2009	XX	LFXXX33F			0.003 J			0.0002 U	69.9			0.001 U	0.02 U		12.5	0.02 U		
7/18/2009	XX	LFXXX37I			H2			H2	H2			H2	H2		H2	H2		
10/27/2009	XX	LFXXX3FC			H2			H2	H2			H2	H2		H2	H2		

**SUMMARY REPORT**  
**Metal (part 1 of 2)**

(LF-UD-3A,B)		Aluminum	Antimony	Arsenic	Barium	Beryllium	Cadmium	Calcium	Chromium	Cobalt	Copper	Iron	Lead	Magnesium	Manganese	Mercury	
Date	Type Sample ID	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	
4/27/2010	XX LFXXX40C			0.005			0.0002 U	57.4			0.001 U	0.02 U		10.7		0.02 U	
7/20/2010	XX LFXXX43G			F6			F6	F6			F6	F6		F6		F6	
10/19/2010	XX LFXXX46J			F6			F6	F6			F6	F6		F6		F6	
4/26/2011	XX LFXXX481			0.01			0.0004 J	47.2			0.001 U	0.02 U		8.8		0.06	
7/19/2011	XX LFXXX4EJ			H2			H2	H2			H2	H2		H2		H2	
10/25/2011	XX LFXXX4IC			F6			F6	F6			F6	F6		F6		F6	
4/24/2012	XX LFXXX534			H2			H2	H2			H2	H2		H2		H2	
7/24/2012	XX LFXXX581			F6			F6	F6			F6	F6		F6		F6	
10/23/2012	XX LFXXX5EC			F6			F6	F6			F6	F6		F6		F6	
<b>LF-UD-4</b>																	
4/15/2009	XX LFXXX34A			0.002 J			0.0002 U	51.9			0.001 U	0.02 U		11.8		0.02 U	
7/8/2009	XX LFXXX380			H2			H2	H2			H2	H2		H2		H2	
10/27/2009	XX LFXXX3FE			H2			H2	H2			H2	H2		H2		H2	
4/27/2010	XX LFXXX40E			F6			F6	F6			F6	F6		F6		F6	
7/20/2010	XX LFXXX43I			F6			F6	F6			F6	F6		F6		F6	
10/19/2010	XX LFXXX471			F6			F6	F6			F6	F6		F6		F6	
4/26/2011	XX LFXXX483			F12			F12	F12			F12	F12		F12		F12	
7/19/2011	XX LFXXX4HG2			H2			H2	H2			H2	H2		H2		H2	
10/25/2011	XX LFXXX4GA			F6			F6	F6			F6	F6		F6		F6	
4/24/2012	XX LFXXX536			H2			H2	H2			H2	H2		H2		H2	
7/24/2012	XX LFXXX582			0.007			0.0006 U	63.5			0.003 U	0.05 U		12.1		0.05 U	
10/23/2012	XX LFXXX5CA			0.011			0.0006 U	48.6			0.003 U	0.05 U		11.1		0.05 U	
<b>LF-UD-5</b>																	
4/27/2010	XX LFXXX40F			0.004 J			0.0002 U	46			0.001 U	0.02 U		9.6		0.02 U	
<b>LF-UD-5and6</b>																	
7/20/2010	XX LFXXX43J			0.007			0.0002 U	58.1			0.001 U	0.05		11.7		0.02 U	
10/19/2010	XX LFXXX472			0.007			0.0002 U	58.1			0.001 U	0.42		11.6		0.05	
4/26/2011	XX LFXXX484			0.017			0.0004 J	64.6			0.001 U	0.02 U		13.3		0.02 U	
7/19/2011	XX LFXXX4F2			0.012			0.0002 U	59.1			0.001 U	0.15		13.6		0.02 U	
10/25/2011	XX LFXXX4G7			0.008			0.0002 U	71.3			0.003	11.3		15.4		0.25	
4/24/2012	XX LFXXX537			0.008			0.0006 U	65.9			0.004	0.05		12.9		0.05 U	
7/24/2012	XX LFXXX584			0.01			0.0006 U	68.3			0.003	0.05 U		14.1		0.05 U	
10/23/2012	XX LFXXX5C7			0.014			0.0006 U	52.5			0.003 U	0.26		11.9		0.05	
<b>LF-UD-6</b>																	
4/26/2011	XX LFXXX486			0.02			0.0006	81.2			0.001 U	0.02 U		16.7		0.02 U	
7/19/2011	XX LFXXX4F4			0.003 J			0.0002 U	83.1			0.007	6.28		17.6		0.17	
10/25/2011	XX LFXXX4G9			0.006			0.0007	94.1			0.002 J	0.02 U		18.6		0.02 U	
4/24/2012	XX LFXXX539			0.007			0.0006 U	75.7			0.004	0.05 U		15.9		0.05 U	
7/24/2012	XX LFXXX586			0.011			0.0006 U	96.4			0.003	0.05 U		22.2		0.05 U	
10/23/2012	XX LFXXX5C9			0.025			0.0006 U	83.7			0.003 U	0.05 U		23.7		0.05 U	
<b>LF-UD-7</b>																	
4/24/2012	XX LFXXX53A			H2			H2	H2			H2	H2		H2		H2	
7/24/2012	XX LFXXX587			F6			F6	F6			F6	F6		F6		F6	
10/23/2012	XX LFXXX5EF			F6			F6	F6			F6	F6		F6		F6	
<b>LP-COMP</b>																	
10/27/2004	XX LFCOMP02			0.001 J				60				0.02 J		22		0.02 J	

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Metal (part 1 of 2)**

Page 4 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
<b>LP-LD-1</b>																		
7/28/2004	XX	LPLD1X051			0.006				100				0.2	0.001 U	21		0.02 J	
10/27/2004	XX	LPLD1X07A			0.001 J				55				0.41		9.3		0.03 J	
5/11/2005	XX	LPLD1X13B			0.004			0.0002 U	6.6			0.01 U	0.47		1.1		0.02 J	
7/27/2005	XX	LPLD1X16J			0.001 U			0.0002 U	65			0.002 J	0.03 J		6.9		0.06	
9/21/2005	XX	LPLD1X19H			0.005			0.0002 U	75			0.004	0.44		28		0.28	
5/24/2006	XX	LPLD1X1EC			0.001 J			0.0002 U	27			0.001 J	0.19		4.6		0.02 U	
7/25/2006	XX	LPLD1X1H9			0.005			0.0002 U	75			0.001 J	0.15		12		0.02 J	
9/11/2006	XX	LPLD1X202			0.005			0.0015	105			0.004	0.16		16		0.02 J	
5/16/2007	XX	LPLD1X239			0.003 J			0.0009	80			0.003	0.18		21		0.03 J	
7/25/2007	XX	LPLD1X27D			0.001 U			0.0002 U	115			0.001 U	0.17		15		0.25	
9/12/2007	XX	LPLD1X2A3			0.001 U			0.0002 J	140			0.001 U	4.7		16		1.56	
5/20/2008	XX	LPLD1X2DH			0.003 U			0.001 U	14.5			0.003 U	0.08		1.3		0.02 U	
7/28/2008	XX	LPLD1X2H1			0.002 U			0.0002 U	19.4			0.002 J	0.05		1.6		0.06	
10/29/2008	XX	LPLD1X2JB			0.002 U			0.0002 U	35.4			0.01 U	0.05		2.8		0.02 U	
4/15/2009	XX	LPLD1X32J			0.002 J			0.0002 U	94.6			0.001 U	0.02 J		14.8		0.05	
7/8/2009	XX	LPLD1X373			0.003 J			0.0002 U	14.6			0.001 J	0.39		2		0.04 J	
10/27/2009	XX	LPLD1X3EI			0.002 J			0.0006	17.9			0.001 U	0.02 U		1.2		0.02 U	

Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
<b>LP-UD-1</b>																		
7/28/2004	XX	LPUd1X05G			D				D				D	D	D		D	
10/27/2004	XX	LPUd1X078			H2				H2				H2	D	H2		H2	
5/11/2005	XX	LPUd1X139			D			D	D			D	D	D	D		D	
7/27/2005	XX	LPUd1X16H			D			D	D			D	D	D	D		D	
9/21/2005	XX	LPUd1X19F			D			D	D			D	D	D	D		D	
5/24/2006	XX	LPUd1X1EA			D			D	D			D	D	D	D		D	
7/26/2006	XX	LPUd1X1H7			F6			F6	F6			F6	F6	F6	F6		F6	
9/11/2006	XX	LPUd1X200			D			D	D			D	D	D	D		D	
5/16/2007	XX	LPUd1X237			F6			F6	F6			F6	F6	F6	F6		F6	
7/25/2007	XX	LPUd1X27B			F6			F6	F6			F6	F6	F6	F6		F6	
9/12/2007	XX	LPUd1X2A1			F6			F6	F6			F6	F6	F6	F6		F6	
5/20/2008	XX	LPUd1X2DF			F6			F6	F6			F6	F6	F6	F6		F6	
7/28/2008	XX	LPUd1X2GJ			D			D	D			D	D	D	D		D	
10/29/2008	XX	LPUd1X2J9			F6			F6	F6			F6	F6	F6	F6		F6	
4/15/2009	XX	LPUd1X32H			F6			F6	F6			F6	F6	F6	F6		F6	
7/8/2009	XX	LPUd1X371			F6			F6	F6			F6	F6	F6	F6		F6	
10/27/2009	XX	LPUd1X3EG			F6			F6	F6			F6	F6	F6	F6		F6	
4/27/2010	XX	LPUd1X3JF			F6			F6	F6			F6	F6	F6	F6		F6	
7/20/2010	XX	LPUd1X42J			F6			F6	F6			F6	F6	F6	F6		F6	
10/19/2010	XX	LPUd1X463			F6			F6	F6			F6	F6	F6	F6		F6	
4/26/2011	XX	LPUd1X4A4			F6			F6	F6			F6	F6	F6	F6		F6	
7/19/2011	XX	LPUd1X4E2			F6			F6	F6			F6	F6	F6	F6		F6	
10/25/2011	XX	LPUd1X4HH			F6			F6	F6			F6	F6	F6	F6		F6	
4/24/2012	XX	LPUd1X527			F6			F6	F6			F6	F6	F6	F6		F6	
7/24/2012	XX	LPUd1X576			F6			F6	F6			F6	F6	F6	F6		F6	
10/23/2012	XX	LPUd1X5DH			F6			F6	F6			F6	F6	F6	F6		F6	

SUMMARY REPORT  
 Metal (part 1 of 2)

Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
5/11/2005	XX	LPUD213A			0.002 J			0.0002 U	36			0.01 J	0.04 J		12.5	0.02 U		
7/27/2005	XX	LPUD216I			0.002 J			0.0002 U	40			0.001 U	0.04 J		12.5	0.02 J		
9/21/2005	XX	LPUD219G			0.002 J			0.0002 U	42			0.003	0.02 J		12	0.02 U		
5/24/2006	XX	LPUD21EB			0.003 J			0.0002 J	34			0.003	0.13		10.5	0.05		
7/25/2006	XX	LPUD21H8			0.002 J			0.0002 U	33			0.001 J	0.04 J		10.5	0.02 U		
9/11/2006	XX	LPUD2201			0.006			0.0016	31			0.001 U	0.02 J		8.1	0.02 U		
5/16/2007	XX	LPUD2238			0.002 J			0.0005 J	37			0.002 J	0.07		12.5	0.02 J		
7/25/2007	XX	LPUD227C			0.001 J			0.0002 J	34			0.001 J	0.06		10.5	0.02 U		
9/12/2007	XX	LPUD22A2			0.001 U			0.0002 U	38			0.001 J	0.02 U		10.5	0.02 U		
5/20/2008	XX	LPUD22DG			0.003 J			0.001 U	36.9			0.003 U	0.02 U		10.9	0.02 U		
1/28/2008	XX	LPUD22H0			0.002 U			0.0002 U	33.5			0.001 U	0.02 J		9.2	0.02 U		
10/29/2008	XX	LPUD22JA			0.002 U			0.0002 U	34.4			0.01 U	0.02 U		9.9	0.02 U		
4/15/2009	XX	LPUD22X21			0.002 U			0.0002 U	36.8			0.001 U	0.02 U		10.2	0.02 U		
7/8/2009	XX	LPUD22X72			0.005			0.0003 J	38.1			0.001 J	0.07		10.1	0.02 U		
10/27/2009	XX	LPUD22X8H			0.003 J			0.0007	28.8			0.001 J	0.02 U		7.7	0.03 J		
4/27/2010	XX	LPUD22XJG			0.004 J			0.0002 U	37.8			0.001 U	0.05		10.9	0.02 U		
7/20/2010	XX	LPUD22X30			0.011			0.0002 U	37			0.001 U	0.06		10.3	0.02 U		
10/19/2010	XX	LPUD22X46			0.005			0.0002 U	34.5			0.001 U	0.02 U		9.5	0.02 U		
4/26/2011	XX	LPUD22X45			0.008			0.0003 J	32.6			0.001 U	0.02 U		10.6	0.02 U		
7/19/2011	XX	LPUD22X4E3			0.002 J			0.0002 U	31.5			0.008	2.86		10.2	0.36		
10/25/2011	XX	LPUD22X4H1			0.002 U			0.0002 U	33.1			0.006	0.88		10.7	0.08		
4/24/2012	XX	LPUD22X528			0.006			0.0006 U	29.9			0.005	0.11		9.7	0.05 U		
7/24/2012	XX	LPUD22X677			0.008			0.0006 U	40.5			0.003	0.05 U		11.7	0.05 U		
10/23/2012	XX	LPUD22X6D1			0.012			0.0006 U	29.9			0.003 U	0.05 U		10	0.05 U		
<b>LT-C4L</b>																		
4/15/2009	XX	LT4LX325	0.55	0.065	0.093	1.3	0.001 U	0.006	1759	0.072	0.02 J	0.036	42.8	0.024	442	8.5	0.0002 U	
7/7/2009	XX	LT4LX368			0.112			0.001 U	1387			0.009	43.3		514	5		
10/28/2009	XX	LT4LX3E4			0.075			0.0015	687			0.022	26.3		386	2.77		
4/28/2010	XX	LT4LX3J3	0.429	0.005	0.107	1.873	0.0002 U	0.001	565	0.065	0.014	0.004	20.9	0.068	351	2.18	0.0002 U	
7/20/2010	XX	LT4LX427			0.099			0.0009	520			0.007	11.9		378	2.08		
10/19/2010	XX	LT4LX45B			0.113			0.004	658			0.01 J	16.8		415	1.8		
4/27/2011	XX	LT4LX49C	0.201	0.018	0.085	1.469	0.0002 U	0.0032	344	0.024	0.012	0.011	9.61	0.002 J	236	2.45	0.0002 U	
7/19/2011	XX	LT4LX4DA			0.121			0.012	469			0.005 U	12.7		372	2.3		
10/26/2011	XX	LT4LX4H5			0.059			0.0099	305			0.008	19.7		205	2.24		
4/24/2012	XX	LT4LX51F	0.25	0.025 U	0.07	0.915	0.003 U	0.005	482	0.025	0.05 U	0.015 U	63	0.015 U	179	23.6	0.0005 U	
7/24/2012	XX	LT4LX56E			0.11			0.003 U	845			0.056	82		466	26		
10/23/2012	XX	LT4LX5D5			0.177			0.004	934			0.024	45.3		433	14		
<b>MW04-102</b>																		
1/18/2005	XX	GW102X10C	0.2 U	0.002 U	0.001 U	0.1 U	0.0002 U	0.0002 J	25	0.002 U	0.003 U	0.001 J	0.1	0.002 U	6.6	0.08	0.0002 U	
3/21/2005	XX	GW102X144	0.2 U	0.003 J	0.001 U	0.1 U	0.0002 U	0.0008	25	0.002 U	0.003 U	0.001 U	0.02 J	0.002 J	6.4	0.02 U	0.0002 U	
7/25/2005	XX	GW102X171	0.2 U	0.002 U	0.003 J	0.1 U	0.0002 U	0.0002 J	29	0.002 J	0.003 U	0.001 U	0.1	0.002 U	7.4	0.09	0.0002 U	
9/20/2005	XX	GW102X1A9	0.2 U	0.002 J	0.002 J	0.1 U	0.0002 U	0.0002 U	27	0.002 U	0.003 U	0.001 J	0.03 J	0.002 U	6.7	0.02 U	0.0002 U	
5/23/2006	XX	GW102X1F4			0.001 U			0.0008	25			0.001 U	0.04 J		6.7	0.02 U		
7/25/2006	XX	GW102X110			0.005			0.0002 U	25			0.002 J	0.02 U		7.1	0.02 U		
9/12/2006	XX	GW102X20D			0.002 J			0.0002 U	28			0.001 U	0.13		7.3	0.02 U		
5/15/2007	XX	GW102X240			0.004			0.001	25			0.004	0.06		7.2	0.03 J		
7/24/2007	XX	GW102X284			0.001 U			0.0002 J	24			0.002 J	0.05 J		8	0.02 J		
9/11/2007	XX	GW102X2AE			0.001 U			0.0004 J	27			0.001 J	0.04 J		6.9	0.02 J		

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Metal (part 1 of 2)

Page 6 of 34  
 SEVLEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
5/20/2008	XX	GW102X2E8			0.003 J			0.001 U	27			0.003 U	0.02 U		7.2		0.02 U	
7/29/2008	XX	GW102X2HC			0.002 U			0.0002 U	25.5			0.001 U	0.05		6.7		0.02 U	
10/27/2008	XX	GW102X302			0.002 U			0.0002 U	24.1			0.01 U	0.04 J		6.5		0.02 U	
4/14/2009	XX	GW102X339			0.002 U			0.0002 U	28.1			0.001 U	0.02 J		7.5		0.02 U	
7/17/2009	XX	GW102X37D			0.002 U			0.0005 J	27.6			0.003	0.02 J		6.9		0.02 U	
10/27/2009	XX	GW102X3F8			0.004 J			0.0002 U	26.7			0.001 U	0.02 U		7		0.02 U	
4/27/2010	XX	GW102X407			0.004 J			0.0002 U	27.1			0.001 U	0.02 J		7		0.02 U	
7/21/2010	XX	GW102X43B			0.006			0.0002 U	26.1			0.001 U	0.02 U		7		0.02 U	
10/19/2010	XX	GW102X46F			0.003 J			0.0002 U	27.1			0.001 U	0.02 U		6.8		0.02 U	
4/25/2011	XX	GW102X4AG			0.005			0.0002 U	26.3			0.001 U	0.02 J		7.5		0.02 U	
7/19/2011	XX	GW102X4EE			0.002 U			0.0002 U	26.8			0.001 U	0.02 U		7.2		0.02 U	
10/25/2011	XX	GW102X4I9			0.004 J			0.0002 U	25.4			0.001 U	0.02 U		7.5		0.02 U	
4/24/2012	XX	GW102X52J			0.005			0.0006 U	23.5			0.003 U	0.05 U		7.8		0.05 U	
7/24/2012	XX	GW102X57I			0.005 U			0.0006 U	25			0.003 U	0.05 U		7.6		0.05 U	
10/22/2012	XX	GW102X5E9			0.005 U			0.0006	31.2			0.003 U	0.05 U		8.1		0.05 U	
<b>MW04-105</b>																		
1/17/2005	XX	GW105X10F	0.2 U	0.002 U	0.001 U	0.1 U	0.0002 U	0.0004 J	54	0.002 U	0.003 U	0.005	0.11	0.002 U	18	0.98	0.0002 U	
3/21/2005	XX	GW105X147	0.2 U	0.004 J	0.001 U	0.1 U	0.0002 U	0.0002 U	75	0.002 U	0.003 U	0.001 U	0.02 J	0.002 U	27	0.19	0.0002 J	
7/25/2005	XX	GW105X181	0.2 J	0.002 U	0.003 J	0.1 U	0.0002 U	0.0002 U	65	0.002 U	0.003 U	0.002 J	0.05 J	0.002 U	26	0.35	0.0002 U	
9/20/2005	XX	GW105X1AC	0.2 U	0.002 U	0.002 J	0.1 U	0.0002 U	0.0002 U	60	0.002 U	0.003 U	0.002 J	0.06	0.002 U	30	0.25	0.0002 U	
5/23/2006	XX	GW105X1F7			0.001 U			0.0004 J	36			0.001 U	0.05 J		13.5	0.42		
7/25/2006	XD	GWDF3X1G1			0.002 J			0.0002 U	38			0.003	0.08		13	0.34		
7/25/2006	XX	GW105X111			0.003 J			0.0002 U	42			0.002 U	0.07		16	0.34		
9/12/2006	XX	GW105X20E			0.001 U			0.0002 U	48			0.001 U	0.06		17	0.14		
5/14/2007	XX	GW105X241			0.003 J			0.0009	36			0.002 J	0.05 J		13.5	0.2		
5/14/2007	XD	GWDF3X221			0.002 J			0.0009	35			0.001 J	0.05 J		13.5	0.2		
7/24/2007	XD	GWDF3X272			0.001 J			0.0003 J	60			0.001 U	0.04 J		15.5	0.03 J		
7/24/2007	XX	GW105X285			0.002 J			0.0003 J	60			0.001 U	0.04 J		15	0.04 J		
9/10/2007	XX	GW105X2AF			0.001 U			0.0002 J	75			0.001 J	0.03 J		17	0.03 J		
5/19/2008	XD	GWDF3X2D6			0.005 J			0.001 U	49.2			0.003 U	0.06		17.1	0.02 J		
5/19/2008	XX	GW105X2E9			0.004 J			0.001 U	49.9			0.003 U	0.06		17.8	0.03 J		
7/29/2008	XD	GWDF3X25A			0.002 U			0.0002 U	41.7			0.001 U	0.1		14.9	0.09		
7/29/2008	XX	GW105X2HD			0.002 U			0.0002 U	42.9			0.002 J	0.1		15.4	0.06		
10/27/2008	XD	GWDF1X305			0.002 U			0.0003 J	38.3			0.01 U	0.05		13	0.04 J		
10/27/2008	XX	GW105X303			0.002 U			0.0002 U	41.1			0.01 U	0.04 J		14.8	0.06		
4/15/2009	XX	GW105X33A			0.002 U			0.0002 U	31.4			0.001 U	0.05		10.3	0.02 U		
4/15/2009	XD	GWDF3X328			0.002 U			0.0002 U	29.8			0.001 U	0.04 J		9.6	0.02 J		
7/17/2009	XX	GW105X37E			0.004 J			0.0003 J	36.5			0.002 J	0.07		12.1	0.04 J		
7/17/2009	XD	GWDF1X361			0.002 J			0.0002 U	34.7			0.001 U	0.07		11.8	0.05		
10/26/2009	XX	GW105X3F9			0.014			0.0021	35.2			0.001 U	0.02 U		11.6	0.03 J		
10/26/2009	XD	GWDF1X3D6			0.005			0.0019	32.1			0.001 U	0.04 J		10.7	0.03 J		
4/27/2010	XX	GW105X408			0.005			0.0003 J	30.1			0.001 U	0.02 U		9.9	0.02 U		
4/27/2010	XD	GWDF3X3J6			0.007			0.0002 U	28.2			0.001 U	0.02 U		9.8	0.02 U		
7/19/2010	XX	GW105X43C			0.013			0.0002 U	31.2			0.001 U	0.02 U		10.6	0.02 U		
10/18/2010	XD	GWDF3X45E			0.014			0.0002 U	33.6			0.001 U	0.12		12.4	0.04 J		
10/18/2010	XX	GW105X46G			0.013			0.0002 U	32.8			0.001 U	0.02 J		11.6	0.08		
4/26/2011	XD	GWDF3X49F			0.012			0.0002 U	27.4			0.001 U	0.02 J		9.7	0.02 U		
4/26/2011	XX	GW105X44H			0.01			0.0002 U	27.2			0.001 U	0.03 J		10	0.02 U		
7/18/2011	XX	GW105X4EF			0.006			0.0008	28.3			0.001 U	0.02 U		10.9	0.02 J		

SUMMARY REPORT  
 Metal (part 1 of 2)

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW04-105)	Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
XX	10/25/2011	XX	GW105X4IA			0.002 U			0.0002 U	22.7			0.001 U	0.02 U		8.4	0.05		
XD	10/25/2011	XD	GWDP1X4SH			0.002 U			0.0002 U	26.3			0.001 U	0.03 J		9.8	0.03 J		
XX	4/23/2012	XD	GWDF3X511			0.005 U			0.0006 U	21.9			0.003 U	0.05 U		9	0.05 U		
XX	4/23/2012	XX	GW105X530			0.005 U			0.0006 U	23.7			0.003 U	0.05 U		9.1	0.05 U		
XX	7/24/2012	XX	GW105X57J			0.005 U			0.0006 U	27			0.003 U	0.05 U		11.3	0.08		
XX	10/22/2012	XX	GW105X5EA			0.007			0.0006 U	27			0.003 U	0.05 U		9.2	0.59		
XD	10/22/2012	XD	GWDF1X5CH			0.006			0.0006 U	22.4			0.003 U	0.05 U		8.7	0.53		
<b>MW04-109</b>																			
XX	1/19/2005	XX	GW109X10I	0.2 U	0.002 U	0.001 U	0.1 U	0.0002 U	0.0002 U	54	0.002 U	0.003 U	0.002 J	0.02 J	0.002 U	17.5	0.22	0.0002 U	
XD	1/19/2005	XD	GWDP1X110	0.2 U	0.002 U	0.001 U	0.1 U	0.0002 U	0.0002 U	52	0.002 U	0.003 U	0.002 J	0.02 J	0.002 U	17	0.21	0.0002 U	
XX	3/23/2005	XX	GW109X14A	0.2 U	0.002 U	0.003 J	0.1 U	0.0002 U	0.0004 J	50	0.002 U	0.003 U	0.001 U	0.02 J	0.002 U	16.5	0.08	0.0002 U	
XX	7/26/2005	XX	GW109X184	0.2 U	0.002 U	0.002 J	0.1 U	0.0002 J	0.0002 U	42	0.002 U	0.004 J	0.001 J	0.04 J	0.002 J	15.5	0.11	0.0002 U	
XD	7/26/2005	XD	GWDF5X186	0.2 U	0.002 U	0.002 J	0.1 J	0.0002 J	0.0002 U	41	0.002 U	0.004 J	0.001 U	0.04 J	0.002 J	15	0.1	0.0002 U	
XX	9/20/2005	XX	GW109X1AF	0.2 U	0.002 U	0.003 J	0.1 U	0.0002 U	0.0002 U	46	0.002 U	0.003 U	0.001 U	0.03 J	0.002 U	16.5	0.07	0.0002 U	
XD	9/20/2005	XD	GWDF5X1AH	0.2 U	0.002 U	0.002 U	0.1 U	0.0002 U	0.0002 U	45	0.002 U	0.003 U	0.001 U	0.03 J	0.002 U	18	0.07	0.0002 U	
XX	5/23/2006	XX	GW109X1FA			0.003 J			0.0002 U	47			0.007	0.06		16.5	0.06		
XD	5/23/2006	XD	GWDP3X1E1			0.002 J			0.0002 U	48			0.007	0.07		16	0.05		
XX	7/25/2006	XX	GW109X1I2			0.006			0.0002 U	40			0.002 J	0.02 J		14	0.05		
XD	9/12/2006	XD	GWDP1X1J0			0.001 U			0.0003 J	42			0.001 U	0.05 J		13.5	0.06		
XX	9/12/2006	XX	GW109X20F			0.001 U			0.0002 U	42			0.001 U	0.06		14	0.06		
XX	5/15/2007	XX	GW109X242			0.003 J			0.0002 J	40			0.001 J	0.06		14	0.07		
XX	7/24/2007	XX	GW109X286			0.001 U			0.0002 J	32			0.002 J	0.03 J		16.5	0.04 J		
XD	9/10/2007	XD	GWDP5X2AH			0.001 U			0.0002 J	39			0.001 U	0.05 J		10.5	0.05		
XX	9/10/2007	XX	GW109X2AG			0.001 U			0.0004 J	38			0.001 U	0.06		10.5	0.04 J		
XX	5/19/2008	XX	GW109X2EA			0.003 J			0.001 U	81.2			0.003 U	0.06		25.4	0.11		
XX	7/29/2008	XX	GW109X2HE			0.002 U			0.0002 U	70.5			0.001 U	0.03 J		21.4	0.13		
XX	10/28/2008	XX	GW109X304			0.002 U			0.0002 J	62.7			0.01 U	0.03 J		19.3	0.21		
XX	4/15/2009	XX	GW109X33B			0.003 J			0.0002 U	76.3			0.001 U	0.06		19.3	0.2		
XX	7/17/2009	XX	GW109X37F			DE			DE	DE			DE	DE		DE	DE		
<b>MW04-109R</b>																			
XX	12/8/2009	XX	GW109X3GF			0.033			0.0006	77.2			0.001 J	0.03 J		14.3	0.15		
XX	4/27/2010	XX	GW109X409			0.008			0.0002 U	54.9			0.001 U	0.02 U		12.4	0.03 J		
XX	7/20/2010	XX	GW109X43D			0.023			0.0002 U	64.2			0.001 U	0.02 U		12.7	0.04 J		
XX	10/19/2010	XX	GW109X46H			0.014			0.0002 U	69.1			0.001 U	0.02 U		13.6	0.04 J		
XX	4/26/2011	XX	GW109X4AI			0.014			0.0002 U	62.7			0.001 U	0.02 U		11.8	0.02 J		
XX	7/19/2011	XX	GW109X4EG			0.01			0.0002 U	55.7			0.001 U	0.02 U		10.7	0.03 J		
XX	10/25/2011	XX	GW109X4IB			0.002 U			0.0006	57.7			0.001 U	0.02 U		11	0.03 J		
XX	4/24/2012	XX	GW109X531			0.008			0.0006 U	50.3			0.003 U	0.05 U		10.1	0.05 U		
XX	7/24/2012	XX	GW109X580			0.009			0.0006 U	52.8			0.003 U	0.05 U		10.9	0.05 U		
XX	10/23/2012	XX	GW109X5EB			0.017			0.0006 U	54			0.003 U	0.05 U		11	0.06		
<b>MW09-901</b>																			
XX	12/8/2009	XX	GW901X3GH			0.013			0.0003 J	29.6			0.001 J	0.18		7.1	0.39		
XX	4/27/2010	XX	GW901X3J7			0.005			0.0002 U	27.4			0.001 U	0.03 J		6.9	0.1		
XX	7/20/2010	XX	GW901X42B			0.01			0.0002 U	28.5			0.001 U	0.05		7.1	0.04 J		
XX	10/19/2010	XX	GW901X45F			0.008			0.0002 U	29.4			0.001 U	0.02 U		8	0.09		
XX	4/26/2011	XX	GW901X49G			0.007			0.0002 U	23.3			0.001 U	0.02 U		6.1	0.02 U		
XX	7/19/2011	XX	GW901X4DE			0.002 J			0.0002 U	21.3			0.001 U	0.02 U		5.9	0.02 U		
XX	10/25/2011	XX	GW901X4H9			0.002 U			0.0002 U	21			0.001 U	0.02 U		6.1	0.02 U		

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Metal (part 1 of 2)

Page 8 of 34  
 SEVLEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Aluminum	Antimony	Arsenic	Barium	Beryllium	Cadmium	Calcium	Chromium	Cobalt	Copper	Iron	Lead	Magnesium	Manganese	Mercury	
			mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
4/24/2012	XX	GW901X51J			0.005			0.0006 U	18.8			0.003 U	0.05 U		5.4		0.05 U	
7/24/2012	XX	GW901X56I			0.005			0.0006	21.2			0.003	0.05 U		6		0.05 U	
10/23/2012	XX	GW901X5D9			0.008			0.0006 U	19.9			0.003 U	0.05 U		6		0.05 U	
<b>MW11-207R</b>																		
7/20/2011	XX	GW207X4CH			0.008			0.0005 J	8.2			0.001 U	0.02 U		2.6		0.02 U	
10/24/2011	XX	GW207X4GC			0.004 J			0.0002 U	8.5			0.001 U	0.02 U		2.9		0.02 U	
4/23/2012	XX	GW207X512			0.005 U			0.0006 U	7.9			0.003 U	0.05 U		2.9		0.05 U	
7/23/2012	XX	GW207X561			0.005 U			0.0006 U	8.3			0.003 U	0.05 U		2.7		0.05 U	
10/22/2012	XX	GW207X5CC			0.005 U			0.0006 U	9.3			0.003 U	0.05 U		3.3		0.05 U	
<b>MW-204</b>																		
11/13/1990	XX	MW-20433190						0.005 U	31	0.01 U		0.02 U	2.4		7.4		1.2	
2/20/1991	XX	MW-20433289	F	F	F	F		F	F	F		F	F	F		F	F	
6/3/1991	XX	MW-20433392						0.005 U	2.7	0.01 U		0.02 U	0.46		6.7		0.61	
9/16/1991	XX	MW-20433487						0.005 U	22	0.01 U		0.02 U	0.071		5.7		0.24	
12/17/1991	XX	GW204X001						0.005 U	19	0.01 U		0.02 U	0.059		5.4		0.13	
3/2/1992	XX	GW204X001	F	F	F	F		F	F	F		F	F	F		F	F	
6/23/1992	XX	GW204X01E						0.005 U	25	0.01 U		0.02 U	0.12		5.7		0.2	
8/17/1992	XX	GW204X02C						0.005 U	20	0.01 U		0.02 U	0.08		5.1		0.12	
1/26/1993	XX	GW204X038						0.005 U	18	0.01 U		0.02 U	0.06		4.4		0.057	
4/27/1993	XX	GW204X04C						0.005 U	14	0.01 U		0.02 U	0.03		4.3		0.005 U	
7/21/1993	XX	GW204X054						0.005 U	17	0.01 U		0.02 U	0.03		4.7		0.012	
10/12/1993	XX	GW204X05I						0.005 U	27	0.01 U		0.02 U	0.04		5.6		0.14	
1/11/1994	XX	GW204X06E						0.005 U	20	0.01 U		0.02 U	0.33		5.1		0.007	
5/21/1996	XX	GW204X093						0.0005 U	20	0.002 U		0.01 U	0.35		5.1		0.002	
11/25/1996	XX	GW204X0A2											0.008				0.002	
3/25/1997	XX	MW-204806-35514											0.017				0.023	
6/3/1997	XX	MW-204809-35584							18.1				0.05 U		4.5		0.02 U	
9/9/1997	XX	MW-204810-35682							18				0.05 U		5		0.02	
12/3/1997	XX	MW-204811-35767							18				0.05 U		5.6		0.02 U	
3/23/1998	XX	MW-204812-35877							17				0.16		6.6		0.02 U	
6/8/1998	XX	MW-204813-35954							19				0.14		6		0.02 U	
9/9/1998	XX	MW-204814-36047							20				0.05		6.5		0.02 U	
12/14/1998	XX	MW-204815-36143							20				0.05 U		5		0.02	
3/29/1999	XX	MW-204816-36248							19				0.05 U		3.9		0.01	
6/8/1999	XX	MW-204817-36319							18				0.04		5.2		0.05 U	
9/13/1999	XX	MW-204818-36416							17				0.06 U		4.6		0.05 U	
12/1/1999	XX	MW-204819-36495							22				0.02		6.1		0.05 U	
3/27/2000	XX	MW-204820-36612											0.11				0.01	
6/12/2000	XX	MW-204821-36689											0.019				0.01 U	
9/12/2000	XX	MW-204822-36781							21				0.033		6.1		0.021	
12/11/2000	XX	MW-204823-36871							21				0.049		5.9		0.022	
3/12/2001	XX	MW-204824-36982							23				0.038		6		0.03	
6/18/2001	XX	MW-204825-37060							24				0.1		6.8		0.022	
9/10/2001	XX	MW-204826-37144							24				0.068		6.4		0.052	
12/11/2001	XX	MW-204827-37236							24				0.079		6.4		0.044	
3/13/2002	XX	MW-204828-37328							30				0.11		8.5		0.047	
6/17/2002	XX	MW-204829-37424							39				0.24		12		0.087	
9/18/2002	XX	MW-204830-37517											0.29				0.16	

**SUMMARY REPORT**  
**Metal (part 1 of 2)**

Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L
12/9/2002	XX	MW-204831-37599											0.11			0.032	
3/25/2003	XX	MW-204N37905							38				0.038		10	0.027	
6/25/2003	XX	MW-204N37797							36				0.012		11	0.058	
9/17/2003	XX	MW-204N37881							34				0.056		9.3	0.038	
1/29/2004	XX	GW204X03A			0.001 U				32				0.02 J		9.4	0.02 J	
5/4/2004	XX	GW204X008	0.2 U	0.002 U	0.004	0.1 J	0.0002 U	0.0002 J	27	0.002 U	0.003 U	0.009	0.05 J	0.002 U	8.5	0.02 J	0.0002 U
7/27/2004	XX	GW204X03G	0.2 U	0.002 U	0.004	0.1 U	0.0005 J	0.0002 U	24	0.002 U	0.003 U	0.001 J	0.06	0.002 U	8.6	0.02 U	0.0002 U
10/25/2004	XX	GW204X07D			0.004				25				0.02 J		9.3	0.02 U	
5/9/2005	XX	GW204X13E			0.005			0.0002 U	20			0.01 U	0.04 J		7.3	0.02 J	
8/1/2005	XX	GW204X172			0.001 J			0.0002 U	26			0.002 J	0.04 J		8.7	0.02 J	
9/20/2005	XX	GW204X1A0			0.001 U			0.0002 J	35			0.004	0.05 J		10.5	0.02 U	
5/23/2006	XX	GW204X1EF			0.001 U			0.0002 U	22			0.004	0.05 J		7.2	0.02 U	
7/24/2006	XX	GW204X1HC			0.001 U			0.0002 U	22			0.001 U	0.03 J		7	0.02 J	
9/11/2006	XX	GW204X205			0.001 J			0.0002 J	22			0.001 U	0.03 J		7.6	0.02 J	
5/14/2007	XX	GW204X23C			0.002 J			0.0005 J	21			0.01	0.03 J		7.1	0.02 J	
7/23/2007	XX	GW204X27G			0.001 U			0.0002 U	23			0.001 U	0.05 J		8	0.02 U	
9/10/2007	XX	GW204X2A6			0.001 U			0.0002 U	30			0.002 J	0.02 J		9.2	0.02 J	
5/21/2008	XX	GW204X2E0			0.003 J			0.001 U	25.8			0.003 U	0.03 J		7.8	0.02 U	
7/30/2008	XX	GW204X2H4			0.002 U			0.0002 U	23.1			0.001 U	0.08		6.8	0.02 U	
10/28/2008	XX	GW204X2JE			0.002 U			0.0002 U	25.1			0.01 U	0.04 J		7.6	0.02 U	
4/13/2009	XX	GW204X332			0.002 U			0.0002 U	23.2			0.001 U	0.03 J		7.3	0.02 U	
7/6/2009	XX	GW204X376			0.005			0.0002 U	21.4			0.001 U	0.04 J		6.1	0.02 U	
10/26/2009	XX	GW204X3F1			0.009			0.0003 J	24.8			0.001 U	0.02 U		7.1	0.02 U	
4/28/2010	XX	GW204X400			0.003 J			0.0002 U	20.2			0.001 U	0.02 J		5.9	0.02 U	
7/19/2010	XX	GW204X434			0.006			0.0002 U	21.1			0.001 U	0.02 U		6.1	0.02 U	
10/19/2010	XX	GW204X468			0.004 J			0.0002 U	20.6			0.001 U	0.02 U		6	0.02 U	
4/26/2011	XX	GW204X4A9			0.009			0.0002 U	19.5			0.001 U	0.02 U		6.3	0.02 U	
7/19/2011	XX	GW204X4E7			0.01			0.0006	20			0.001 U	0.02 U		5.9	0.02 J	
10/26/2011	XX	GW204X4I2			0.002 U			0.0002 U	19.8			0.001 U	0.02 U		5.6	0.02 U	
4/24/2012	XX	GW204X52C			0.005			0.0006 U	16.7			0.003 U	0.05 U		5.6	0.05 U	
7/23/2012	XX	GW204X57B			0.005 U			0.0006 U	18.4			0.003 U	0.25		5.7	0.05 U	
10/24/2012	XX	GW204X5E2			0.005			0.0006 U	17.9			0.003 U	0.05		6.4	0.05 U	

**MW-207**

11/13/1990	XX	MW-20733190						0.005 U	15	0.01 U		0.02 U	0.28		10	1	
2/19/1991	XX	MW-20733288						0.005 U	13	0.01 U		0.02 U	0.11		8.4	0.32	
6/4/1991	XX	MW-20733393						0.005 U	16	0.01 U		0.02 U	2.6		11	1.9	
9/17/1991	XX	MW-20733498						0.005 U	9.9	0.01 U		0.02 U	0.77		6.9	0.85	
12/18/1991	XX	GW207X002						0.005 U	11	0.01 U		0.02 U	0.091		7.6	0.37	
3/2/1992	XX	GW207X00J	F	F	F	F	F	F	F	F	F	F	F	F	F	F	F
6/23/1992	XX	GW207X01F						0.005 U	13	0.01 U		0.02 U	0.05		8.1	0.13	
8/23/1992	XD	GW207X028						0.005 U	14	0.01 U		0.02 U	0.12		8.4	0.14	
8/17/1992	XX	GW207X02D						0.005 U	13	0.01 U		0.02 U	0.17		7.2	0.044	
1/26/1993	XX	GW207X039						0.005 U	11	0.01 U		0.02 U	0.17		6.3	0.085	
4/27/1993	XX	GW207X04D						0.005 U	11	0.01 U		0.02 U	0.26		5.8	0.031	
7/22/1993	XX	GW207X055						0.005 U	13	0.01 U		0.02 U	0.16		6.4	0.024	
10/13/1993	XX	GW207X060						0.005 U	15	0.01 U		0.02 U	0.14		6.5	0.71	
1/11/1994	XX	GW207X06G						0.005 U	13	0.01 U		0.02 U	0.03		7.2	0.065	
5/21/1996	XX	GW207X085						0.0005 U	12	0.002 U		0.01 U	0.05		6.6	0.029	
5/21/1996	XD	GWDP1X09A						0.0005 U	12	0.002 U		0.01	0.05		6.9	0.034	

FOR: Juniper Ridge Landfill

SUMMARY REPORT

Metal (part 1 of 2)

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

(MW-207)	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
Date	Type	Sample ID														
11/26/1996	XX	GW207X044									1.83					2.2
3/24/1997	XX	MW-207825-35513									0.12					0.72
6/2/1997	XX	MW-207826-35583					16				0.57		7.6			1.27
9/8/1997	XX	MW-207827-35681					18				1.05		11			1.45
12/3/1997	XX	MW-207828-35767					12				0.75		6.7			0.81
3/23/1998	XX	MW-207829-35877					12				0.39		5.9			0.48
6/8/1998	XX	MW-207830-35954					14				0.55		6.1			0.78
9/8/1998	XX	MW-207831-36046					13				0.68		7			0.95
12/14/1998	XX	MW-207832-36143					14				0.22		4.7			0.46
3/29/1999	XX	MW-207833-36248					13				0.2		3.1			0.37
6/8/1999	XX	MW-207834-36319					12				0.27		4.8			0.76
9/13/1999	XX	MW-207835-36416					9.8				0.67		3.3			1.04
12/1/1999	XX	MW-207836-36495					12				0.34		4.4			0.56
3/27/2000	XX	MW-207837-36612					4.2				4.2		3.3			3.3
6/12/2000	XX	MW-207838-36689					7.2				7.2		2.8			2.8
9/12/2000	XX	MW-207839-36781					15				6.1		6.2			1.8
12/11/2000	XX	MW-207840-36871					14				3.6		5.5			1.7
3/13/2001	XX	MW-207841-36963					13				6.5		5.2			1.4
6/18/2001	XX	MW-207842-37060					11				3.4		4			1.2
9/10/2001	XX	MW-207843-37144					12				3.2		3.8			1.1
12/11/2001	XX	MW-207844-37236					13				2.4		4.5			1.2
3/13/2002	XX	MW-207845-37328					10				0.69		3.6			0.81
6/17/2002	XX	MW-207846-37424					11				0.85		3.9			0.89
9/18/2002	XX	MW-207847-37517									0.69					0.84
12/9/2002	XX	MW-207848-37599									0.68					0.74
3/26/2003	XX	MW-207N37708					12				0.11		3.9			0.18
6/25/2003	XX	MW-207N37797					13				0.17		4.3			0.61
9/17/2003	XX	MW-207N37881					11				0.58		3.7			0.98
5/5/2004	XX	GW207X011	0.002 J				13				0.29		4.9			1.16
7/28/2004	XX	GW207X048	0.007				12				1.55	0.002 U	5.3			1.37
10/25/2004	XX	GW207X063	0.009				16				1.58		6.1			1.53
5/12/2005	XX	GW207X124	0.001 J				13			0.01 U	2.2		5.4			1.44
8/1/2005	XX	GW207X15C	0.004				15			0.002 U	2.2		5.6			1.34
9/19/2005	XD	GWDP1X18F	0.009				17			0.002 J	1.98		5.4			1.36
9/19/2005	XX	GW207X18A	0.009				17			0.003 J	2		5.4			1.38
5/22/2006	XX	GW207X1D5	0.01				14			0.001 U	2.6		5.3			1.28
7/25/2006	XX	GW207X1G2	0.011				16			0.002 J	2.3		6			1.38
9/11/2006	XX	GW207X1IF	0.01				19			0.001 U	2.1		6.7			1.34
5/14/2007	XX	GW207X222	0.002 J				20			0.005 J	0.34		6.9			0.46
7/25/2007	XX	GW207X266	0.001 J				22			0.002 J	3		7.9			1.82
9/10/2007	XX	GW207X28G	0.003 J				31			0.001 J	4.7		9.1			2
5/19/2008	XX	GW207X2CA	0.003 U				31.6			0.003 U	1.05		8.9			0.47
7/29/2008	XX	GW207X2FE	0.002 U				29.6			0.001 U	1.73		7.9			1.9
10/28/2008	XX	GW207X2I4	0.003 J				35.2			0.01 U	5.51		9.4			2.24
4/13/2009	XX	GW207X31C	0.007				34			0.001 U	7.48		9.6			3.47
7/6/2009	XX	GW207X35G	0.021				39.3			0.001 U	11.6		9.5			3.42
10/26/2009	XX	GW207X3DB	0.046				43.7			0.001 J	17.6		14.1			4.02
4/26/2010	XX	GW207X3IA	0.012				46.5			0.001 U	12.2		19.5			4.33
7/19/2010	XX	GW207X41E	0.011				14.9			0.001 J	2.26		5.2			1.26
10/18/2010	XX	GW207X44I	0.041				55.4			0.001 U	23.2		19.1			5.48

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Metal (part 1 of 2)

Page 11 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
4/25/2011	XX	GW207X48J			0.043			0.0002 U	47.6			0.001 U	19.8		20.3	5.79		
<b>MW-206</b>																		
4/27/1993	XX	GW206X04I						0.005 U	17	0.01 U		0.02 U	0.22		3.8		0.005 U	
4/27/1993	XD	GW206X04E						0.005 U	17	0.01 U		0.02 U	0.3		4		0.007	
7/21/1993	XX	GW206X05A						0.005 U	17	0.01 U		0.02 U	0.29		4.3		0.006	
10/13/1993	XX	GW206X05J						0.005 U	16	0.01 U		0.02 U	0.12		3.8		0.005	
1/11/1994	XX	GW206X06F						0.005 U	17	0.01 U		0.02 U	0.22		4.3		0.005	
5/21/1996	XX	GW206X094						0.0005 U	15	0.002		0.01 U	0.25		4.5		0.003	
11/26/1996	XX	GW206X0A3										0.029					0.003	
3/25/1997	XX	MW-206824-35514										0.018					0.024	
6/2/1997	XX	MW-206825-35583							14.9			0.05 U			3.7		0.02 U	
9/8/1997	XX	MW-206826-35681							19			0.05			4.3		0.02	
12/3/1997	XX	MW-206827-35767							14			0.05			4.8		0.02	
3/23/1998	XX	MW-206828-35877							15			0.05			5		0.02 U	
6/8/1998	XX	MW-206829-35954							14			0.05 U			4.6		0.02 U	
9/8/1998	XX	MW-206830-36046							15			0.05 U			5.5		0.02 U	
12/14/1998	XX	MW-206831-36143							16			0.05 U			3.9		0.02 U	
3/29/1999	XX	MW-206832-36248							14			0.05 U			2.7		0.05 U	
6/8/1999	XX	MW-206833-36319							15			0.02			4.2		0.05 U	
9/15/1999	XX	MW-206834-36418							14			0.03			3.7		0.05 U	
12/1/1999	XX	MW-206835-36495							17			0.02			4.5		0.05 U	
3/27/2000	XX	MW-206836-36612										0.02			0.01 U		0.01 U	
6/12/2000	XX	MW-206837-36689										0.02			0.01 U		0.01 U	
9/13/2000	XX	MW-206838-36782							17			0.012			4.6		0.01 U	
12/11/2000	XX	MW-206839-36871							17			0.32			4.6		0.029	
3/13/2001	XX	MW-206840-36963							16			0.81			4.5		0.1	
6/18/2001	XX	MW-206841-37060							17			0.091			4.6		0.03	
9/10/2001	XX	MW-206842-37144							18			0.083			4.4		0.037	
12/12/2001	XX	MW-206843-37237							14			0.44			4		0.012	
3/13/2002	XX	MW-206844-37328							18			0.095			5		0.024	
6/17/2002	XX	MW-206845-37424							18			0.027			4.9		0.02	
9/18/2002	XX	MW-206846-37517										0.05					0.025	
12/9/2002	XX	MW-206847-37599										0.83					0.068	
3/26/2003	XX	MW-206848-37706							16			0.046			4.3		0.01 U	
6/25/2003	XX	MW-206849-37811							17			0.31			4.6		0.029	
9/17/2003	XX	MW-206850-37917							14			0.24			3.7		0.042	
5/6/2004	XX	GW206X010			0.004				16			0.08			4.6		0.02 J	
7/28/2004	XX	GW206X047			0.006				13					0.002 U	4.7		0.02 U	
10/26/2004	XX	GW206X082							15			0.3			4.5		0.02 J	
5/11/2005	XX	GW206X123			0.005			0.0005 J	14			0.01 U			4.3		0.02 U	
7/28/2005	XX	GW206X158			0.005			0.0002 U	15			0.001 U			4.6		0.03 J	
9/19/2005	XX	GW206X189			0.007			0.0002 U	15			0.002 J			4.8		0.02 J	
5/24/2006	XX	GW206X1D4			0.007			0.0008	13			0.001 J			4.4		0.02 U	
7/25/2006	XX	GW206X1G1			0.008			0.0002 U	14			0.001 J			4.6		0.02 U	
9/12/2006	XX	GW206X1E			0.001 J			0.0002 U	14			0.001 U			4.5		0.02 U	
5/14/2007	XX	GW206X221			0.006			0.0006	16			0.011			4.6		0.02 J	
7/25/2007	XX	GW206X265			0.004			0.0006	14			0.001 U			4.6		0.02 U	
9/11/2007	XX	GW206X28F			0.001 J			0.0009	16			0.001 U			4.4		0.02 U	
5/20/2008	XX	GW206X2C9			0.006 J			0.001 U	16			0.003 U			4.6		0.02 U	

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Metal (part 1 of 2)**

Page 12 of 34

SEVVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-206)	Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
XX	7/29/2008	XX	GW206X2FD			0.003 J			0.0002 U	15.3			0.001 J	0.08		4.5		0.02 U	
XX	10/27/2008	XX	GW206X2I3			0.003 J			0.0002 U	14.5			0.01 U	0.05		4.2		0.02 U	
XX	4/13/2009	XX	GW206X31B			0.004 J			0.0003 J	16.8			0.001 U	0.02 U		5.1		0.02 U	
XX	7/6/2009	XX	GW206X35F			0.007			0.0002 U	16.1			0.001 U	0.02 J		4.7		0.02 U	
XX	10/28/2009	XX	GW206X3DA			0.009			0.0002 U	17			0.001 U	0.02 U		4.7		0.02 U	
XX	4/26/2010	XX	GW206X3I9			0.005			0.0002 U	14.5			0.001 U	0.02 U		4		0.02 U	
XX	7/19/2010	XX	GW206X41D			0.01			0.0005 J	14.8			0.001 U	0.02 U		4.3		0.02 U	
XX	10/18/2010	XX	GW206X44H			0.015			0.0002 U	27.2			0.001 J	1.2		6.9		0.32	
XX	4/25/2011	XX	GW206X48I			0.009			0.0002 U	16.4			0.001 U	0.32		5.1		0.02 J	
XX	7/18/2011	XX	GW206X4CG			0.005			0.0011	16.3			0.004	0.91		4.9		0.04 J	
XX	10/24/2011	XX	GW206X4GB			0.005			0.0002 U	15.9			0.001 U	0.18		5		0.02 U	
XX	4/23/2012	XX	GW206X511			0.006			0.0006 U	15.2			0.003 U	0.29		5.2		0.05 U	
XD	7/23/2012	XD	GWDP4X573			0.005			0.0006 U	14.7			0.003 U	0.24		4.6		0.05 U	
XX	7/23/2012	XX	GW206X560			0.006			0.0006 U	14.8			0.003 U	0.13		4.6		0.05 U	
XX	10/22/2012	XX	GW206X5CB			0.01			0.0006 U	17.6			0.003 U	0.33		5.3		0.05 U	
<b>MW-212</b>																			
XX	11/13/1990	XX	MW-21233190	I	I	I	I	I	I	I	I	I	I	I	I	I	I	I	I
XX	2/19/1991	XX	MW-21233288						0.005 U	23	0.01 U		0.022	0.073		2.8		0.085	
XX	6/3/1991	XX	MW-21233392						0.005 U	14	0.01 U		0.02 U	0.051		2		0.08	
XX	9/16/1991	XX	MW-21233497						I	I	I	I	I	I	I	I	I	I	I
XX	12/17/1991	XX	GW212X004						0.005 U	10	0.01 U		0.02 U	0.057		1.7		0.027	
XX	3/2/1992	XX	GW212X011	I	I	I	I	I	I	I	I	I	I	I	I	I	I	I	I
XX	6/23/1992	XX	GW212X01H	D	D	D	D	D	D	D	D	D	D	D	D	D	D	D	D
XX	1/26/1993	XX	GW212X03B						D	D	D	D	D	D	D	D	D	D	D
XX	4/27/1993	XX	GW212X04G						0.006	23	0.01 U		0.02 U	0.05		3.5		0.024	
XX	7/21/1993	XX	GW212X058						D	D	D	D	D	D	D	D	D	D	D
XX	10/12/1993	XX	GW212X062						D	D	D	D	D	D	D	D	D	D	D
XX	1/11/1994	XX	GW212X06I						0.005 U	13	0.01 U		0.02 U	0.03 U		2		0.007	
XX	5/21/1996	XX	GW212X097						0.0005	6.1	0.002 U		0.01 U	0.05 U		1.47		0.003	
XX	11/26/1996	XX	GW212X0A5											D				D	
XX	3/24/1997	XX	MW-212526-35513						F	F	F	F	F	F	F	F	F	F	F
XX	6/2/1997	XX	MW-212827-35583						4.1	4.1			0.05 U	0.05 U		1		0.02 U	
XX	3/23/1998	XX	MW-212830-35877						6.7	6.7			0.05 U	0.05 U		1.7		0.02 U	
XX	6/8/1998	XX	MW-212831-35864						4.9	4.9			0.05 U	0.05 U		1.44		0.02 U	
XX	3/29/1999	XX	MW-212834-36248						6.1	6.1			0.01	0.01		0.65		0.05 U	
XX	6/8/1999	XX	MW-212835-36319						4.8	4.8			0.03	0.03		1.35		0.05 U	
XX	12/1/1999	XX	MW-212837-36495						6.1	6.1			0.06 U	0.06 U		1.6		0.05 U	
XX	3/27/2000	XX	MW-212838-36612										0.035	0.035				0.01 U	
XX	6/12/2000	XX	MW-212839-36689											0.16				0.06	
XX	3/13/2002	XX	MW-212840-37328						3.2	3.2			0.13	0.13		0		0.11	
XX	6/17/2002	XX	MW-212841-37424						4.8	4.8			0.2	0.2		1.4		0.032	
XX	3/26/2003	XX	MW-212837706						5.9	5.9			0.079	0.079		1.7		0.017	
XX	6/25/2003	XX	MW-212N37797						5.2	5.2			0.054	0.054		1.4		0.022	
XX	5/5/2004	XX	GW212X00B	0.2 U	0.005	0.008	0.1 U	0.002 U	0.0002 J	3.8	0.002 U	0.003 U	0.001 J	0.11	0.004 J	1.09	0.02 J	0.0002 U	
XX	7/27/2004	XX	GW212X03J	D	D	D	D	D	D	D	D	D	D	D	D	D	D	D	D
XX	10/27/2004	XX	GW212X07F						D	D	D	D	D	D	D	D	D	D	D
XX	5/12/2005	XX	GW212X13G						0.0002 J	3			0.01 U	0.34		0.91		0.03 J	
XX	8/1/2005	XX	GW212X174						0.0002 U	2.1			0.002 J	0.15		1		0.02 U	
XX	9/20/2005	XX	GW212X1A2						I	I	I	I	I	I	I	I	I	I	I

**SUMMARY REPORT**  
**Metal (part 1 of 2)**

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

(MW-212)	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
Date	Type	Sample ID														
5/22/2006	XX	GW212X1EH				0.0002 U	2.1			0.001 U	0.16		0.85		0.02 U	
7/25/2006	XX	GW212X1HE	0.002 J			0.0002 U	2.5			0.001 J	0.13		0.97		0.02 J	
9/11/2006	XX	GW212X207	I			I	I			I	I		I		I	
5/14/2007	XX	GW212X23E	0.001 J			0.0002 J	3.5			0.006	0.16		1.25		0.02 U	
7/24/2007	XX	GW212X27I	D			D	D			D	D		D		D	
9/10/2007	XX	GW212X2A8	D			D	D			D	D		D		D	
5/19/2008	XX	GW212X2E2	0.003 U			0.001 U	7			0.003 U	0.06		2		0.02 U	
7/29/2008	XX	GW212X2H6	D			D	D			D	D		D		D	
10/28/2008	XX	GW212X2JG	D			D	D			D	D		D		D	
4/13/2009	XX	GW212X334	0.002 U			0.0002 J	10.9			0.001 U	0.03 J		2.8		0.02 U	
7/6/2009	XX	GW212X378	0.006			0.0002 J	11.4			0.002 J	1.77		3		0.16	
10/26/2009	XX	GW212X3F3	D			D	D			D	D		D		D	
4/26/2010	XX	GW212X402	0.003 J			0.0002 U	18.8			0.001 U	0.06		4.6		0.02 U	
7/19/2010	XX	GW212X436	D			D	D			D	D		D		D	
10/18/2010	XX	GW212X46A	D			D	D			D	D		D		D	
4/25/2011	XX	GW212X4AB	0.009			0.0002 J	8.6			0.001 U	0.07		2.1		0.02 U	
7/18/2011	XX	GW212X4E9	D			D	D			D	D		D		D	
10/24/2011	XX	GW212X4H4	D			D	D			D	D		D		D	
4/23/2012	XX	GW212X52E	D			D	D			D	D		D		D	
7/23/2012	XX	GW212X57D	D			D	D			D	D		D		D	
10/22/2012	XX	GW212X5E4	D			D	D			D	D		D		D	

MW-216B	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
11/12/1990	XX	MW-216B33189				0.005 U	18	0.01 U		0.02 U	0.12		5.8		0.11	
2/19/1991	XX	MW-216B33288				0.005 U	12	0.01 U		0.02 U	0.091		4		0.056	
6/4/1991	XD	MW-216B33393				0.005 U	12	0.01 U		0.02 U	0.03 U		4		0.072	
6/4/1991	XX	MW-216B33393				0.005 U	11	0.01 U		0.02 U	0.03 U		3.9		0.075	
9/16/1991	XX	MW-216B33497				0.005 U	13	0.01 U		0.02 U	0.051		4.5		0.044	
9/16/1991	XD	MW-216B33497				0.005 U	14	0.016 U		0.02	0.013		4.5		0.047	
12/17/1991	XD	GW216B00F				0.005 U	8.7	0.01 U		0.02 U	0.03 U		2.9		0.068	
12/17/1991	XX	GW216B007				0.005 U	8.8	0.01 U		0.02 U	0.03 U		3		0.071	
3/2/1992	XX	GW216B014				0.005 U	9	0.01 U		0.02 U	0.05		3.1		0.055	
6/23/1992	XX	GW216B01J				0.005 U	10	0.01 U		0.02 U	0.03		3.3		0.065	
8/17/1992	XX	GW216B02I				0.005 U	11	0.01		0.02 U	0.14		3.4		0.039	
1/26/1993	XX	GW216B03D				0.005 U	14	0.01 U		0.02 U	0.03		4.5		0.005 U	
4/27/1993	XX	GW216B043				0.005 U	12	0.01 U		0.02 U	0.06		3.5		0.005	
7/21/1993	XX	GW216B050				0.005 U	12	0.01 U		0.02 U	0.04		4.1		0.006	
10/13/1993	XX	GW216X064				0.005 U	17	0.01 U		0.02 U	0.07		4.7		0.008	
10/13/1993	XD	GW216B066				0.005 U	17	0.01 U		0.02 U	0.09		4.8		0.009	
1/11/1994	XX	GW216B070				0.005 U	16	0.01 U		0.02 U	0.03 U		5.2		0.005 U	
1/11/1994	XD	GW216B07I				0.005 U	16	0.01 U		0.02 U	0.03 U		5.1		0.005 U	
5/21/1996	XX	GW216B099				0.0005 U	13	0.002 U		0.01	0.05 U		4.9		0.001	
11/25/1996	XX	GW216B0A7									0.005				0.045	
3/25/1997	XX	MW-216B810-35514									0.022				0.027	
6/2/1997	XX	MW-216B811-35583					13.6				0.05 U		4.6		0.02 U	
9/9/1997	XX	MW-216B812-35682					14				0.05 U		4.8		0.05	
12/3/1997	XX	MW-216B813-35767					12				0.52		5.6		0.04	
3/25/1998	XX	MW-216B814-35679									0.05 U				0.02 U	
3/25/1998	XD	MW-216B815-35955					15				0.05 U		5.3		0.02 U	
9/8/1998	XX	MW-216B816-36046					16				0.05 U		6.5		0.02 U	

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Metal (part 1 of 2)**

Page 14 of 34  
 SEVLEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-216B)	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
Date	Type	Sample ID														
12/14/1998	XX	MW-216B817-36143					18				0.05 U			5.5		0.02 U
3/30/1999	XX	MW-216B816-36249					17				0.01			4.3		0.05 U
6/9/1999	XX	MW-216B819-36320					12				0.05 U			4.3		0.05
9/14/1999	XX	MW-216B820-36417					13				0.06 U			3.6		0.05 U
12/2/1999	XX	MW-216B821-36496					8.5				0.06			3.4		0.1
3/28/2000	XX	MW-216B822-36613									0.022					0.095
6/13/2000	XX	MW-216B823-36690					18				0.011			6.4		0.12
9/13/2000	XX	MW-216B824-36782					12				0.03			4.5		0.074
12/12/2000	XX	MW-216B825-36872					16				0.028			5.4		0.061
3/14/2001	XX	MW-216B826-36964									0.024					0.01 U
6/19/2001	XX	MW-216B827-37061					19				0.44			6.7		0.027
9/11/2001	XX	MW-216B828-37145					16				0.062			5.2		0.029
12/12/2001	XX	MW-216B829-37237					11				0.066			4.2		0.067
3/14/2002	XX	MW-216B830-37329									0.03					0.01 U
6/18/2002	XX	MW-216B831-37425					18				0.032			6.8		0.087
9/19/2002	XX	MW-216B832-37518					14				0.35			5.5		0.025
12/10/2002	XX	MW-216B833-37600									0.065					0.03
3/26/2003	XX	MW-216B837706					20				0.01 U			6.7		0.01 U
6/26/2003	XX	MW-216B837798					15				0.019			5.2		0.1
9/18/2003	XX	MW-216B837882					15				0.016			4.9		0.019
5/6/2004	XD	GWDP1X017	0.002 J				14				0.05 J			5		0.03 J
5/6/2004	XX	GW216B013	0.002 J				14				0.06			5.1		0.03 J
7/26/2004	XX	GW216B049	0.006				8.1				0.03 J	0.002 U		4.8		0.06
10/26/2004	XX	GW216B004	0.005				4.5				0.03 J			3.2		0.1
10/26/2004	XD	GWDP1X068	0.004				4.4				0.02 J			3.1		0.1
5/10/2005	XX	GW216B125	0.001 J			0.0002 U	4.9			0.01 J	0.08			3.2		0.05
7/27/2005	XD	GWDP3X168	0.001 U			0.0002 U	14			0.001 U	0.02 J			7.1		0.1
7/27/2005	XX	GW216B15D	0.002 J			0.0002 U	15			0.001 U	0.02 J			7		0.09
9/22/2005	XX	GW216B18B	0.001 U			0.0002 U	6.2			0.002 J	0.04 J			3.2		0.12
5/23/2006	XX	GW216B1D6	0.011			0.0002 U	14			0.001 J	20			6.2		2.6
7/25/2006	XD	GWDP1X1G7	0.011			0.0006	6.4			0.002 J	13.5			4.4		1.41
7/25/2006	XX	GW216B163	0.011			0.0008	6.3			0.002 U	13			4.5		1.42
9/12/2006	XX	GW216B11G	0.005			0.0002 U	4.3			0.001 U	11			3.8		1.09
5/15/2007	XX	GW216B223	0.004			0.0006	7.7			0.002 J	6.2			5.7		0.8
7/24/2007	XD	GWDP1X26B	0.001 J			0.0003 J	11			0.004	3.8			5.3		0.5
7/24/2007	XX	GW216B267	0.001 J			0.0003 J	10			0.004	3.8			5.2		0.49
9/10/2007	XX	GW216B28H	0.001 J			0.0002 J	12			0.001 J	1.53			4.9		0.45
5/20/2008	XX	GW216B2CB	0.007 J			0.001 J	20.9			0.003 U	1.49			8.8		0.89
7/28/2008	XD	GWDP1X2FJ	0.002 U			0.0002 U	34.4			0.001 U	3.21			13.8		1.01
7/28/2008	XX	GW216B2FF	0.002 U			0.0002 U	34.6			0.001 U	2.95			13.8		1
10/28/2008	XX	GW216B2I5	0.002 J			0.0002 U	13.9			0.01 U	3.29			7.4		0.61
4/14/2009	XX	GW216B31D	0.002 J			0.0002 U	11.3			0.001 U	1.88			6		0.54
7/7/2009	XX	GW216B35H	DE			DE	DE			DE	DE			DE		DE
<b>MW-216BR</b>																
12/8/2009	XX	GW216B35G	0.015			0.0002 U	30.7			0.001 U	0.13			11		0.68
4/27/2010	XX	GW216B31B	0.007			0.0002 U	27			0.001 U	0.25			9.8		0.17
7/20/2010	XX	GW216B41F	0.011			0.0002 U	24			0.001 U	0.19			8.8		0.14
10/19/2010	XX	GW216B44J	0.008			0.0002 U	25.2			0.001 U	0.19			9.2		0.12
4/26/2011	XX	GW216B460	0.021			0.0002 U	35.8			0.001 U	0.25			14.4		0.1

**SUMMARY REPORT**  
**Metal (part 1 of 2)**

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

**(MW-216BR)**

**Date Type Sample ID**

Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L
7/19/2011	XX	GW216B4C1			0.016			0.0008	37.9	0.01 U		0.001 U	0.21		13.9	0.09	
10/25/2011	XX	GW216B4GD			0.004 J			0.0003 J	41.4	F		0.001 J	0.2	F	17.1	0.09	
4/24/2012	XX	GW216B513			0.012			0.0006 U	41.3	0.01 U		0.003 U	0.18		16.5	0.08	
7/24/2012	XX	GW216B562			0.012			0.0006 U	43.8	0.015		0.003	0.15		18.2	0.07	
10/23/2012	XX	GW216B5CD			0.016			0.0006 U	34.8	F		0.003 U	0.09		14.5	0.06	

**MW-223A**

11/12/1990	XX	MW-223A33189						0.005 U	28	0.01 U		0.02 U	0.03		3.2	0.005 U	
2/19/1991	XX	MW-223A33288	F	F	F	F	F	F	F	F	F	F	F	F	F	F	F
6/3/1991	XX	MW-223A33392						0.005 U	25	0.01 U		0.02 U	0.03 U		2.7	0.005 U	
9/16/1991	XX	MW-223A33497						0.005 U	23	0.015		0.02 U	0.059		2.8	0.005	
12/17/1991	XX	GW223A008	F	F	F	F	F	F	F	F	F	F	F	F	F	F	F
3/2/1992	XX	GW223A016	F	F	F	F	F	F	F	F	F	F	F	F	F	F	F
6/23/1992	XX	GW223A020						0.005 U	26	0.01 U		0.02 U	0.03 U		2.8	0.005 U	
8/17/1992	XX	GW223A02J						0.005 U	23	0.01 U		0.02 U	0.03 U		2.7	0.005 U	
1/26/1993	XX	GW223A03E						F	F	F		F	F		F	F	
4/27/1993	XX	GW223A044						0.005 U	27	0.01 U		0.02 U	0.03 U		2.8	0.005 U	
7/21/1993	XD	GW223A058						0.005 U	24	0.01 U		0.02 U	0.03 U		2.8	0.005 U	
7/21/1993	XX	GW223A05B						0.005 U	25	0.01 U		0.02 U	0.03 U		2.8	0.005 U	
10/12/1993	XX	GW223A065						0.005 U	24	0.01 U		0.02 U	0.06		2.4	0.005 U	
1/1/1994	XX	GW223A072						F	F	F		F	F		F	F	
5/21/1996	XX	GW223A08B						0.0005 U	24	0.002 U		0.01 U	0.05 U		2.8	0.001	
11/25/1996	XX	GW223A0A8										0.005	0.005			0.003	
3/24/1997	XX	MW-223A811-35513							F	F		F	F		F	F	
6/3/1997	XX	MW-223A812-35584							25			0.05 U	0.05 U		2.6	0.02 U	
9/10/1997	XX	MW-223A813-35683							24			0.05	0.05		2.7	0.11	
12/4/1997	XX	MW-223A814-35768							24			0.05 U	0.05 U		3.3	0.02 U	
6/1/1998	XX	MW-223A816-35957							26			0.05 U	0.05 U		3.2	0.02 U	
9/9/1998	XX	MW-223A817-36047							25			0.05 U	0.05 U		3.8	0.02 U	
12/15/1998	XX	MW-223A818-36144							27			0.05 U	0.05 U		2.6	0.02 U	
6/9/1999	XX	MW-223A820-36320							27			0.02	0.02		2.3	0.05 U	
9/14/1999	XX	MW-223A821-36417							28			0.02	0.02		3.1	0.01	
12/2/1999	XX	MW-223A822-36486							24			0.02	0.02		2.5	0.05 U	
3/28/2000	XX	MW-223A823-36613							28			0.02	0.02		3.1	0.02	
6/13/2000	XX	MW-223A824-36660							29			0.075	0.075		0.01 U	0.01 U	
9/13/2000	XX	MW-223A825-36782							29			0.081	0.081		3.4	0.01 U	
12/12/2000	XX	MW-223A826-36872							30			0.059	0.059		3.5	0.01 U	
6/19/2001	XX	MW-223A827-37061							30			0.039	0.039		3.4	0.01 U	
9/11/2001	XX	MW-223A828-37145							30			0.052	0.052		3.5	0.01 U	
12/11/2001	XX	MW-223A829-37236							33			0.06	0.06		3.8	0.017	
3/14/2002	XX	MW-223A830-37329							29			0.43	0.43		0.015	0.015	
6/18/2002	XX	MW-223A831-37425							34			0.08	0.08		3.4	0.01 U	
9/19/2002	XX	MW-223A832-37518							29			0.093	0.093		3.7	0.01 U	
12/10/2002	XX	MW-223A833-37600							34			120	120		4	4	
3/25/2003	XX	MW-223AN3705							31			0.087	0.087		3	0.01 U	
3/25/2003	XD	MW-223AD3705							30			0.017	0.017		3	0.01 U	
6/26/2003	XX	MW-223AN3798							31			0.11	0.11		3.1	0.01 U	
9/18/2003	XX	MW-223AN37882							26			0.12	0.12		2.7	0.01 U	
5/5/2004	XX	GW223A014			0.004				23			0.04 J	0.04 J		3.7	0.02 U	

**SUMMARY REPORT**  
**Metal (part 1 of 2)**

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

(MW-223A)		Aluminum	Antimony	Arsenic	Barium	Beryllium	Cadmium	Calcium	Chromium	Cobalt	Copper	Iron	Lead	Magnesium	Manganese	Mercury
Date		Type	Sample ID	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
7/28/2004	XX		GW223A04A					29				0.02 J	0.002 J	3.3		0.02 U
7/28/2004	XD		GWDP1X04D	0.001 U				30				0.03 J	0.002 U	3.3		0.02 U
10/25/2004	XX		GW223A065	0.001 U				27				0.06		3.3		0.02 J
5/10/2005	XX		GW223A126	0.002 J			0.0002 U	28			0.01 U	0.07		3.1		0.02 U
5/10/2005	XD		GWDP3X130	0.002 J			0.0002 U	29			0.01 U	0.06		3.2		0.02 U
7/26/2005	XX		GW223A15E	0.001 U			0.0002 U	28			0.002 J	0.05 J		3.3		0.02 U
9/21/2005	XX		GW223A18C	0.001 J			0.0002 U	29			0.003	0.02 J		3.1		0.02 U
5/24/2006	XD		GWDP1X1DA	0.01			0.0003 J	28			0.001 J	0.05 J		3		0.02 U
5/24/2006	XX		GW223A1D7	0.011			0.0002 J	28			0.002 J	0.05 J		3.1		0.02 U
7/26/2006	XD		GWDP5X113	0.003 J			0.0002 U	27			0.001 J	0.07		3.2		0.02 U
7/26/2006	XX		GW223A1G4	0.003 J			0.0002 U	28			0.001 J	0.07		3.3		0.02 U
9/13/2006	XD		GWDP5X20G	0.001 U			0.0005 J	31			0.001 U	0.05 J		3.3		0.02 U
9/13/2006	XX		GW223A1IH	0.001 J			0.0006	30			0.001 U	0.07		3.2		0.02 J
5/15/2007	XD		GWDP1X2Z7	0.002 J			0.0003 J	30			0.002 J	0.02 J		3.5		0.02 J
5/15/2007	XX		GW223A224	0.002 J			0.0003 J	29			0.004	0.03 J		3.5		0.02 J
7/24/2007	XD		GWDP5X287	0.001 J			0.0003 J	27			0.001 J	0.02 J		3.5		0.02 U
7/24/2007	XX		GW223A268	0.001 J			0.0005 J	32			0.001 U	0.03 J		3.2		0.02 J
9/11/2007	XX		GW223A281	0.001 U			0.0005 J	28			0.001 U	0.02 J		3.8		0.02 U
5/20/2008	XD		GWDP1X2CF	0.003 U			0.001 U	34.7			0.003 U	0.02 U		3.9		0.02 U
5/20/2008	XX		GW223A2CC	0.002 U			0.001 U	34.8			0.003 U	0.02 U		3.9		0.02 U
7/30/2008	XX		GW223A2FG	0.002 U			0.0002 U	30.6			0.001 U	0.02 J		3.3		0.02 U
7/30/2008	XD		GWDP5X2HF	0.002 U			0.0002 U	31.3			0.001 U	0.05		3.4		0.02 U
10/28/2008	XX		GW223A216	0.002 U			0.0002 U	33.3			0.01 U	0.03 J		3.7		0.02 U
4/14/2009	XD		GWDP1X31H	0.002 U			0.0002 U	64.2			0.001 U	0.02 U		8.5		0.02 U
4/14/2009	XX		GW223A31E	0.002 U			0.0002 U	64.2			0.001 U	0.02 U		8.2		0.02 U
7/7/2009	XX		GW223A35I	0.002 U			0.0002 U	60.9			0.001 J	0.08		4.7		0.02 U
10/27/2009	XD		GWDP4X3ED	0.003 J			0.0002 U	43.1			0.001 U	0.02 U		4.9		0.02 U
10/27/2009	XX		GW223A3DD	0.004 J			0.0002 U	44.1			0.001 U	0.02 U		4.8		0.02 U
4/27/2010	XD		GWDP1X31F	0.004 J			0.0002 U	43.9			0.001 U	0.02 J		5.1		0.02 U
4/27/2010	XX		GW223A31C	0.003 J			0.0002 U	46.8			0.001 U	0.02 U		5.2		0.02 U
7/20/2010	XX		GW223A41G	0.006			0.0002 U	48.6			0.001 U	0.02 U		5.2		0.02 U
10/19/2010	XX		GW223A450	0.006			0.0002 U	48.9			0.001 U	0.02 U		5.2		0.02 U
10/19/2010	XD		GWDP1X453	0.006			0.0002 U	48.7			0.001 U	0.02 U		5.4		0.02 U
4/26/2011	XD		GWDP1X484	0.012			0.0002 U	53.4			0.001 U	0.02 U		5.3		0.02 U
4/26/2011	XX		GW223A481	0.011			0.0002 J	53.3			0.001 U	0.02 U		6		0.02 U
7/19/2011	XX		GW223A4CJ	0.005			0.0002 U	58.4			0.001 U	0.02 U		6		0.02 U
10/25/2011	XD		GWDP3X4H8	0.002 U			0.0002 U	56.8			0.001 J	0.02 U		6.1		0.02 U
10/25/2011	XX		GW223A4GE	0.002 U			0.0002 U	55.9			0.001 U	0.02 U		6.6		0.02 U
4/24/2012	XD		GWDP1X517	0.006			0.0006 U	57.9			0.003 U	0.05 U		6.4		0.02 U
4/24/2012	XX		GW223A514	0.005			0.0006 U	54.4			0.003 U	0.05 U		6.5		0.05 U
7/24/2012	XX		GW223A563	0.005 U			0.0006 U	60.7			0.003	0.05 U		6.5		0.05 U
10/23/2012	XD		GWDP3X5D8	0.007			0.0006 U	57.4			0.003 U	0.05 U		7.2		0.05 U
10/23/2012	XX		GW223A5CE	0.008			0.0006 U	61.5			0.003 U	0.05 U		7.1		0.05 U

**MW-223B**

11/12/1990	XX		MW-223B33189					17	0.01 U		0.02 U	0.13		3.9		0.11
2/19/1991	XX	F	MW-223B33288	F	F	F	F	F	F	F	F	F	F	F	F	F
6/3/1991	XX		MW-223B33392					17	0.01 U		0.02 U	0.031		4.1		0.005 U
9/16/1991	XX		MW-223B33497					17	0.01 U		0.02 U	0.15		4.3		0.008
12/17/1991	XX	F	GW223B009	F	F	F	F	F	F	F	F	F	F	F	F	F

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Metal (part 1 of 2)**

Page 17 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

**(MW-223B)**

**Date Type Sample ID**

Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L
3/2/1992	XX	GW223B017	F	F	F	F	F	F	19	0.01 U		F	F	F	4.8	F	F
6/23/1992	XX	GW223B022						0.005 U	20	0.01 U		0.02 U	0.06	F	4.6	0.005 U	
8/17/1992	XX	GW223B030						0.005 U	20	0.01 U		F	0.06	F	4.6	0.015	
1/26/1993	XX	GW223B03F						F	F	F		F	F	F	F	F	
4/27/1993	XX	GW223B045						0.005 U	18	0.01 U		0.02 U	0.07		3.9	0.005 U	
7/21/1993	XX	GW223B05C						0.005 U	18	0.01 U		0.02 U	0.05		4.3	0.005	
10/12/1993	XX	GW223B067						0.005 U	18	0.01 U		0.02 U	0.03 U		3.7	0.01	
1/11/1994	XX	GW223B073						F	F	F		F	F	F	F	F	
5/21/1996	XX	GW223B09C						0.0005 U	17	0.002 U		0.01 U	0.05		3.9	0.001 U	
11/25/1996	XX	GW223B0A9											0.009			0.001 U	
3/24/1997	XX	MW-223B812-35513							F	F		F	F	F	F	F	
6/3/1997	XX	MW-223B813-35584						19.6	16	0.05 U		0.05 U	0.05 U		3.8	0.02 U	
9/10/1997	XX	MW-223B814-35683						16	18	0.05 U		0.34	0.05 U		4.2	0.02	
12/4/1997	XX	MW-223B815-35766						18	17	0.05 U		0.05 U	0.05 U		5.2	0.02 U	
6/8/1998	XX	MW-223B817-35954						17	20	0.05 U		0.05 U	0.05 U		4.3	0.02 U	
9/9/1998	XX	MW-223B818-36047						17	21	0.05 U		0.05 U	0.05 U		5.3	0.02 U	
12/15/1998	XX	MW-223B819-36144						21	19	0.05 U		0.05 U	0.02		4.1	0.02 U	
3/30/1999	XX	MW-223B820-36249						19	19	0.05 U		0.02	0.05		3.8	0.01	
6/9/1999	XX	MW-223B821-36320						19	20	0.05 U		0.05	0.11		4.1	0.01	
9/14/1999	XX	MW-223B822-36417						20	22	0.05 U		0.11	0.03		3.7	0.05 U	
12/2/1999	XX	MW-223B823-36496						22	24	0.03		0.03	0.17		4.7	0.05 U	
3/28/2000	XX	MW-223B824-36613							24	0.054		0.054	0.17		0.035	0.035	
6/13/2000	XX	MW-223B825-36690						24	22	0.054		0.054	0.054		5.7	0.033	
9/13/2000	XX	MW-223B826-36782						22	24	0.053		0.053	0.31		5.1	0.053	
12/12/2000	XX	MW-223B827-36872						24	25	0.053		0.053	0.13		5.4	0.015	
6/19/2001	XX	MW-223B828-37061						25	26	0.053		0.053	0.13		5.7	0.03	
9/11/2001	XX	MW-223B829-37145						26	27	0.052		0.052	0.52		5.5	0.063	
12/11/2001	XX	MW-223B830-37236						27	36	0.29		0.29	0.19		5.9	0.16	
3/14/2002	XX	MW-223B831-37229							27	0.077		0.077	0.07		8.2	0.033	
6/18/2002	XX	MW-223B832-37425						36	27	0.077		0.077	0.077		5.8	0.025	
9/19/2002	XX	MW-223B833-37518						27	28	0.055		0.055	0.55		6	0.026	
12/10/2002	XX	MW-223B834-37600						28	27	0.027		0.027	0.027		6	0.032	
3/25/2003	XX	MW-223B837705						27	27	0.049		0.049	0.049		5.5	0.034	
6/26/2003	XX	MW-223B837798						27	20	0.052		0.052	0.052		5.6	0.035	
6/26/2003	XD	MW-223BD37798						27	20	0.083		0.083	0.083		4.4	0.015	
9/18/2003	XX	MW-223BD37882						20	24	0.003 U		0.003 U	0.03 J		6.2	0.02 J	0.0002 U
5/5/2004	XX	GW223B00A	0.2 U	0.002 U	0.002 J	0.1 U	0.0002 U	0.0002 U	24	0.002 U	0.003 U	0.002 J	0.04 J	0.002 U	6.5	0.02 U	0.0002 U
7/27/2004	XX	GW223B031	0.2 U	0.002 U	0.002 J	0.1 U	0.0002 U	0.0002 U	25	0.002 J	0.003 U	0.002 J	0.14	0.002 J	6.4	0.02 U	
10/25/2004	XX	GW223B07E			0.002 J				25			0.01 U	0.07		6.3	0.02 U	
5/10/2005	XX	GW223B13F			0.003 J			0.0002 U	24			0.001 U	0.07		6.8	0.02 U	
7/26/2005	XX	GW223B173			0.001 U			0.0002 U	26			0.001 J	0.04 J		6.5	0.02 U	
9/21/2005	XX	GW223B1A1			0.001 J			0.0002 U	26			0.001 J	0.18		6.5	0.02 U	
5/24/2006	XX	GW223B1EG			0.009			0.0009	25			0.001 J	0.06		6.7	0.02 U	
7/26/2006	XX	GW223B1HD			0.003 J			0.0002 U	25			0.001 U	0.12		6.9	0.02 J	
9/13/2006	XX	GW223B206			0.001 J			0.0002 U	27			0.001 J	0.08		7.2	0.02 J	
5/15/2007	XX	GW223B23D			0.002 J			0.0002 J	27			0.002 J	0.03 J		7.3	0.02 U	
7/24/2007	XX	GW223B27H			0.001 U			0.0002 J	26			0.001 J	0.07		7	0.02 J	
9/11/2007	XX	GW223B2A7			0.001 U			0.0002 U	30			0.001 U	0.04 J		8.9	0.02 U	
5/20/2008	XX	GW223B2E1			0.003 U			0.001 U	35.2			0.003 U	0.02 J		7.8	0.02 U	
7/30/2008	XX	GW223B2H5			0.002 U			0.0002 U	32.9			0.001 U	0.02 J		7.8	0.02 U	

SUMMARY REPORT  
Metal (part 1 of 2)

SEVVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

(MW-223B)	Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
10/28/2008	XX		GW223B2JF			0.002 U			0.0002 U	35.8			0.01 U	0.03 J		8.7		0.02 U	
4/14/2009	XX		GW223B333			0.002 U			0.0002 U	33.5			0.001 U	0.14		8.5		0.02 U	
7/17/2009	XX		GW223B377			0.002 U			0.0002 U	37.8			0.001 U	0.02 J		9.4		0.02 U	
7/17/2009	XD		GWDP4X36I			0.002 U			0.0002 U	40			0.001 U	0.02 J		9.6		0.02 U	
10/27/2009	XX		GW223B3F2			0.005			0.001	41.9			0.001 U	0.02 U		9.7		0.02 U	
4/27/2010	XX		GW223B401			0.005			0.0002 U	39.3			0.001 U	0.35		9.1		0.02 U	
7/20/2010	XD		GWDF1X41J			0.011			0.0002 U	41.9			0.001 U	0.57		10		0.09	
7/20/2010	XX		GW223B435			0.011			0.0002 U	40.8			0.001 U	0.58		9.8		0.09	
10/19/2010	XX		GW223B469			0.007			0.0002 U	40.1			0.001 U	0.11		9.5		0.04 J	
4/26/2011	XX		GW223B4AA			0.013			0.0002 U	40.2			0.001 U	0.02 J		10.3		0.02 U	
7/19/2011	XD		GWDF3X4DD			0.006			0.0002 U	36.1			0.001 U	0.04 J		9.7		0.05	
7/19/2011	XX		GW223B4E8			0.005			0.0002 U	37.8			0.001 U	0.04 J		9.5		0.04 J	
10/25/2011	XX		GW223B4I3			0.002 U			0.0025	38.5			0.001 U	0.49		10.6		0.07	
4/24/2012	XX		GW223B52D			0.005 U			0.0006 U	37			0.003 U	0.24		9.8		0.05 U	
7/24/2012	XD		GWDF3X66H			0.005			0.0006 U	43.1			0.003 U	0.08		10.9		0.05 U	
7/24/2012	XX		GW223B57C			0.005 U			0.0006 U	40.5			0.003	0.1		11		0.05 U	
10/23/2012	XX		GW223B5E3			0.011			0.0006 U	39			0.003 U	0.09		10.7		0.05 U	
<b>MW-227</b>																			
11/13/1990	XX		MW-22733190						0.005 U	21	0.01 U		0.02 U	0.09		4.3		0.024	
2/19/1991	XX		MW-22733288	F		F	F		F	F	F		F	F	F	F		F	F
6/3/1991	XX		MW-22733392						0.005 U	22	0.01 U		0.02 U	0.03 U		4.8		0.009	
9/16/1991	XX		MW-22733487						0.005 U	22	0.01 U		0.02 U	0.25		5.3		0.1	
12/17/1991	XX		GW227X00A						0.005 U	21	0.01 U		0.02 U	0.03 U		4.9		0.011	
3/21/1992	XX		GW227X018	F		F	F		F	F	F		F	F	F	F		F	F
6/23/1992	XX		GW227X023						0.005 U	25	0.01 U		0.02 U	0.07		5.7		0.01	
8/17/1992	XX		GW227X031						0.005 U	20	0.01 U		0.02 U	0.1		4.8		0.039	
1/26/1993	XX		GW227X03G						F	F	F		F	F	F	F		F	F
4/27/1993	XX		GW227X047						0.005 U	25	0.01 U		0.02 U	0.14		5.2		0.008	
7/21/1993	XX		GW227X05E						0.005 U	24	0.01 U		0.02 U	0.03		5.5		0.01	
10/12/1993	XX		GW227X068						0.005 U	23	0.01 U		0.02 U	0.06		4.6		0.017	
1/11/1994	XX		GW227X074						F	F	F		F	F	F	F		F	F
5/21/1996	XX		GW227X08D						0.0005	20	0.002 U		0.01 U	0.11		5		0.004	
11/25/1996	XX		GW227X0AA											0.008				0.005	
3/24/1997	XX		MW-227813-35513						F	F	F		F	F	F	F		F	F
6/3/1997	XX		MW-227814-35584						22	22			0.05 U	0.05 U		4.1		0.02 U	
9/9/1997	XX		MW-227815-35682						21	21			0.05	0.05		5.6		0.02 U	
12/4/1997	XX		MW-227816-35788						22	22			0.45	0.45		5.8		0.03	
3/25/1998	XX		MW-227817-35879						22	22			0.05 U	0.05 U		5.6		0.02 U	
6/8/1998	XX		MW-227818-35954						20	20			0.65	0.65		5.2		0.03	
9/9/1998	XX		MW-227819-36047						22	22			0.05 U	0.05 U		5.9		0.02 U	
12/15/1998	XX		MW-227820-36144						25	25			0.05 U	0.05 U		4.6		0.02 U	
3/29/1999	XX		MW-227821-36248						21	21			0.08	0.08		4.4		0.05 U	
6/8/1999	XX		MW-227822-36319						20	20			0.01	0.01		4.6		0.05 U	
9/13/1999	XX		MW-227823-36416						19	19			0.06 U	0.06 U		4.1		0.05 U	
12/1/1999	XX		MW-227824-36495						23	23			0.06 U	0.06 U		5		0.05 U	
3/27/2000	XX		MW-227825-36612											0.17				0.01 U	
6/12/2000	XX		MW-227826-36689											0.076				0.01 U	
9/12/2000	XX		MW-227827-36781						24	24				0.5		5.4		0.02	
12/11/2000	XX		MW-227828-36871						23	23				0.024		5.1		0.01 U	

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Metal (part 1 of 2)**

Page 19 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-227)	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
Date	Type	Sample ID														
3/12/2001	XX	MW-227829-36962					23				0.019		5.1	0.01		
6/18/2001	XX	MW-227850-37080					23				0.062		5.2	0.01 U		
9/10/2001	XX	MW-227831-37144					25				0.1		5.2	0.17		
12/12/2001	XX	MW-227832-37237					22				0.043		5.3	0.01 U		
3/14/2002	XX	MW-227833-37329									0.025			0.01 U		
6/17/2002	XX	MW-227834-37424					24				0.018		5.5	0.01 U		
9/18/2002	XX	MW-227835-37517									0.038			0.018		
12/9/2002	XX	MW-227836-37599									0.061			0.01 U		
3/25/2003	XX	MW-227837-37705					24				0.068		5.1	0.01 U		
6/25/2003	XX	MW-227838-37797					24				0.09		5.4	0.01 U		
9/18/2003	XX	MW-227839-37882					16				0.015		3.6	0.01 U		
5/5/2004	XX	MW-227840-37975					20				0.03 J		5.1	0.02 J		
7/26/2004	XX	GW227X04B					21				0.03 J	0.002 U	5.3	0.02 U		
10/26/2004	XX	GW227X068					22				0.04 J		5.2	0.06		
5/9/2005	XX	GW227X127					20			0.01 U	0.08		5.1	0.02 U		
7/27/2005	XX	GW227X15F					22			0.002 U	0.02 J		5.3	0.05		
9/21/2005	XX	GW227X18D					22			0.002 U	0.05 J		5.1	0.06		
5/24/2006	XX	GW227X1D8					21			0.0007	0.07		5.1	0.02 U		
7/26/2006	XX	GW227X1G5					20			0.0002 U	0.04 J		5.2	0.02 U		
9/13/2006	XX	GW227X1I1					23			0.0002 U	0.06		5.3	0.02 J		
5/15/2007	XX	GW227X225					21			0.004	0.03 J		5.5	0.02 J		
7/24/2007	XX	GW227X269					21			0.004	0.02 J		5.5	0.02 U		
9/11/2007	XX	GW227X28J					22			0.002 U	0.05 J		5	0.02 J		
5/20/2008	XX	GW227X2CD					23			0.003 U	0.05		5.6	0.02 U		
7/30/2008	XX	GW227X2FH					20.4			0.0002 U	0.03 J		4.9	0.02 U		
10/27/2008	XX	GW227X2I7					20			0.01 U	0.03 J		4.9	0.02 U		
4/14/2009	XX	GW227X31F					24.3			0.0002 U	0.02 J		5.9	0.02 U		
7/7/2009	XX	GW227X35J					23.6			0.0002 U	0.02 J		5.1	0.02 U		
10/27/2009	XX	GW227X3DE					24.8			0.0007	0.02 U		5.6	0.02 U		
4/27/2010	XX	GW227X3ID					21.7			0.0002 U	0.05		5.1	0.02 U		
7/20/2010	XX	GW227X41H					21.2			0.0002 U	0.08		5.2	0.02 U		
10/19/2010	XX	GW227X451					21.9			0.0002 U	0.06		5.1	0.02 U		
4/26/2011	XX	GW227X492					21.4			0.0002 U	0.02 U		5.5	0.02 U		
7/19/2011	XX	GW227X4D0					21.4			0.0002 U	0.02 U		5.4	0.02 U		
10/25/2011	XX	GW227X4GF					20.5			0.0026	0.06		5.6	0.02 U		
4/24/2012	XX	GW227X515					19.9			0.0006 U	0.05 U		5.4	0.05 U		
7/24/2012	XX	GW227X564					22			0.0006 U	0.05 U		5.7	0.05 U		
10/23/2012	XX	GW227X5CF					22.4			0.0006 U	0.05 U		5.6	0.05 U		
<b>MW-301</b>																
11/25/1996	XD	GWDF1X0AC									0.01			0.001 U		
11/25/1996	XX	GW301X0B0									0.011			0.001		
3/24/1997	XX	MW-301815-35513					F			F	F			F		
6/3/1997	XX	MW-301816-35584					18.5				0.05 U		3.4	0.02 U		
9/9/1997	XX	MW-301817-35682					19				0.05 U		3.9	0.02		
12/3/1997	XX	MW-301818-35767					15				0.1		4.4	0.02 U		
3/23/1998	XX	MW-301819-35877					16				0.09		4.6	0.02 U		
6/8/1998	XX	MW-301820-35954					17				0.05 U		4.2	0.02 U		
9/9/1998	XX	MW-301821-36047					18				0.05 U		4.9	0.02 U		
12/14/1998	XX	MW-301822-36143					18				0.05 U		3.4	0.03		

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Metal (part 1 of 2)

Page 20 of 34  
 SEVVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-301)	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
Date	Type	Sample ID														
3/29/1999	XX	MW-301823-36248					17				0.02			2.5	0.01	
6/8/1999	XX	MW-301824-36319					16				0.03			3.5	0.05 U	
9/13/1999	XX	MW-301825-36416					15				0.02			3.1	0.05 U	
12/1/1999	XX	MW-301826-36485					19				0.06 U			4.2	0.05 U	
3/27/2000	XX	MW-301827-36612									0.013				0.01 U	
6/12/2000	XX	MW-301828-36689									0.016				0.01 U	
9/12/2000	XX	MW-301829-36781					19				0.039			4.4	0.01 U	
6/18/2001	XX	MW-301830-37080					19				0.058			4.4	0.01 U	
9/10/2001	XX	MW-301831-37144					21				0.045			4.4	0.01 U	
12/11/2001	XX	MW-301832-37236					19				0.026			4.3	0.01 U	
3/13/2002	XX	MW-301833-37328					21				0.13			4.9	0.01 U	
6/17/2002	XX	MW-301834-37424					19				0.016			4.5	0.01 U	
3/25/2003	XX	MW-301835-37517									0.053				0.019	
3/25/2003	XX	MW-301837705					20				0.041			4.3	0.01 U	
6/25/2003	XX	MW-30183797					19				0.044			4.5	0.01 U	
9/17/2003	XD	MW-301D37881					17				0.023			3.6	0.01 U	
9/17/2003	XX	MW-301N37881					18				0.021			3.9	0.01 U	
5/5/2004	XX	GW301X016	0.005				17				0.05 J			4.3	0.03 J	
5/5/2004	XD	GWDF3X01J	0.006				17				0.06 J			4.2	0.02 J	
7/26/2004	XX	GW301X04C	0.007				16				0.08	0.002 U		4.5	0.02 U	
10/25/2004	XX	GW301X067	0.006				16				0.02 J			4.4	0.02 U	
5/9/2005	XX	GW301X128	0.005			0.0002 U	15				0.07	0.01 U		4.3	0.03 J	
8/1/2005	XX	GW301X15G	0.003 J			0.0002 U	17				0.002 U			4.6	0.03 J	
9/22/2005	XX	GW301X18E	0.003 J			0.0002 U	17				0.003			4.4	0.05	
5/22/2006	XX	GW301X1D9	0.002 J			0.0005 J	15				0.001 U			4.4	0.03 J	
7/24/2006	XX	GW301X1G6	0.002 J			0.0002 U	17				0.001 U			4.5	0.03 J	
9/11/2006	XX	GW301X1U	0.003 J			0.0006	18				0.002 J			4.6	0.02 J	
5/14/2007	XX	GW301X226	0.006			0.0002 U	18				0.001 J			4.6	0.05	
7/23/2007	XX	GW301X26A	0.001 J			0.0002 U	16				1.59			4.5	0.02 U	
9/10/2007	XX	GW301X290	0.002 J			0.0002 J	20				0.14			4.3	0.02 J	
5/19/2008	XX	GW301X2CE	0.003 J			0.001 U	19.4				0.38			4.9	0.05	
7/30/2008	XX	GW301X2F1	0.002 U			0.0002 U	16.7				0.001 U			4.1	0.02 U	
10/28/2008	XX	GW301X2I8	0.003 J			0.0002 J	17.5				0.07			4.6	0.02 U	
4/15/2009	XX	GW301X31G	0.003 J			0.0002 U	31.4				0.15			5.7	0.02 U	
7/7/2009	XX	GW301X360	0.002 U			0.0002 J	20.8				0.01 U			4.9	0.02 J	
10/26/2009	XX	GW301X3DF	0.008			0.0002 J	19.3				0.001 J			4.6	0.02 J	
4/26/2010	XX	GW301X3IE	0.005			0.0002 U	16.9				0.001 U			3.9	0.03 J	
7/19/2010	XX	GW301X411	0.005			0.0002 J	19.4				0.001 U			4.7	0.02 J	
10/19/2010	XX	GW301X452	0.007			0.0002 U	17.9				0.001 U			4.4	0.02 J	
4/27/2011	XX	GW301X493	0.005			0.0004 J	18.1				0.001 U			4.5	0.02 J	
7/20/2011	XX	GW301X4D1	0.012			0.0002 U	18.5				0.001 U			4.4	0.02 J	
10/26/2011	XX	GW301X4GG	0.002 U			0.0002 U	18.7				0.001 U			4.3	0.02 J	
4/25/2012	XX	GW301X516	0.009			0.0006 U	16.9				0.003 U			4.4	0.05 U	
7/25/2012	XX	GW301X565	0.006			0.0006 U	14.9				0.003 U			4.5	0.05 U	
10/24/2012	XX	GW301X6CG	0.006			0.0006 U	16.7				0.003 U			4.3	0.05 U	
10/24/2012	XD	GWDF4X5DE	0.008			0.0006 U	17.1				0.003 U			4.4	0.05 U	
<b>MW-302</b>																
6/23/1992	XX	GW302X027				0.005 U	26				0.03 U			1.4	0.049	
8/17/1992	XD	GW302X035				0.005 U	27				0.02 U			1.2	0.045	

SUMMARY REPORT  
 Metal (part 1 of 2)

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

(MW-302)	Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
XX	8/17/1992	XX	GW-302X032						0.005 U	27	0.01 U		0.02 U	0.08		1.3	0.055		
XX	1/26/1993	XX	GW-302X03H	0.2 U	0.002 U	0.001 J	0.1 J	0.0005 J	0.005 U	28	0.01 U	0.003 U	0.02 U	0.03 U	0.002 J	1.3	0.008	0.0002 U	
XX	4/27/1993	XX	GW-302X048						0.005 U	32	0.01 U		0.02 U	0.03 U		1.4	0.005 U		
XX	7/21/1993	XX	GW-302X05F						0.005 U	29	0.01 U		0.02 U	0.03 U		1.3	0.005 U		
XX	10/12/1993	XX	GW-302X069						0.005 U	29	0.01 U		0.02 U	0.03 U		1.2	0.007		
XX	1/11/1994	XX	GW-302X075						0.005 U	38	0.01 U		0.02 U	0.03 U		1.5	0.026		
XX	5/21/1996	XX	GW-302X08E																
XX	11/26/1996	XX	GW-302X0AB																
XX	3/26/1997	XX	GW-302827-35515							43				0.021		2	0.006		
XX	6/3/1997	XX	MW-302828-35584							45				0.035		2	0.022		
XX	9/10/1997	XX	MW-302829-35683							60				0.05 U		1.65	0.02 U		
XX	12/4/1997	XX	MW-302830-35768							70				0.05 U		2.5	0.02		
XX	3/25/1998	XX	MW-302831-35879							48				0.23		3.1	0.03		
XX	6/8/1998	XX	MW-302832-35954							50				0.36		2.4	0.02		
XX	9/9/1998	XX	MW-302833-36047							49				0.05 U		2.2	0.02 U		
XX	12/15/1998	XX	MW-302834-36144							65				0.05 U		3.2	0.02 U		
XX	3/30/1999	XX	MW-302835-36249							45				0.05 U		2.7	0.02 U		
XX	6/9/1999	XX	MW-302836-36320							50				0.02		2	0.01		
XX	9/13/1999	XX	MW-302837-36416							60				0.02		2.4	0.05 U		
XX	12/1/1999	XX	MW-302838-36495							66				0.02		2.5	0.05 U		
XX	3/27/2000	XX	MW-302839-36612							51				0.039		3.1	0.05 U		
XX	6/13/2000	XX	MW-302840-36690							69				0.068		2.7	0.01 U		
XX	9/12/2000	XX	MW-302841-36781							77				0.054		3.2	0.02		
XX	12/11/2000	XX	MW-302842-36871							57				0.015		3.6	0.01 U		
XX	6/18/2001	XX	MW-302843-36962							61				0.11		2.7	0.043		
XX	9/10/2001	XX	MW-302845-37144							68				0.05		3	0.015		
XX	12/11/2001	XX	MW-302846-37236							74				0.069		3.5	0.013		
XX	3/13/2002	XX	MW-302847-37328							56				0.043		3.8	0.01 U		
XX	6/17/2002	XX	MW-302848-37424							68				0.028		3.4	0.01 U		
XX	9/18/2002	XX	MW-302849-37517											0.018			0.01 U		
XX	12/9/2002	XX	MW-302850-37599							63				0.042			0.01 U		
XX	3/25/2003	XX	MW-302N37705							64				0.22		3.2	0.011		
XX	6/25/2003	XX	MW-302N37787							67				0.072		3.6	0.01 U		
XX	9/17/2003	XX	MW-302N37881							60				0.026		3.2	0.01 U		
XX	5/6/2004	XX	GW-302X009	0.2 J	0.002 J	0.003 J	0.1 U	0.0002 U	0.0002 J	55	0.002 U	0.003 U	0.001 J	0.15	0.002 U	2.6	0.03 J	0.0002 U	
XX	7/27/2004	XX	GW-302XHD1	0.2 U	0.002 U	0.001 J	0.1 J	0.0005 J	0.0002 U	60	0.002 U	0.003 U	0.022	0.05 J	0.002 J	2.8	0.02 U	0.0002 U	
XX	10/25/2004	XX	GW-302X07C			0.002 J				60				0.02 J		2.9	0.02 J		
XX	5/10/2005	XX	GW-302X13D			0.004			0.0002 U	55			0.01 U	0.53		2.6	0.02 U		
XX	7/27/2005	XX	GW-302X171			0.001 J			0.0002 U	48			0.001 U	0.09		2.7	0.03 J		
XX	9/19/2005	XX	GW-302X18J			0.001 J			0.0002 U	60			0.001 J	0.11		5	0.02 U		
XX	5/23/2006	XX	GW-302X1EE			0.002 J			0.0009	46			0.002 J	0.23		2.6	0.02 U		
XX	7/24/2006	XX	GW-302X1HB			0.001 U			0.0013	50			0.001 U	0.4		2.9	0.03 J		
XX	9/12/2006	XX	GW-302X204			0.001 U			0.0003 J	60			0.001 U	0.13		3	0.02 J		
XX	5/14/2007	XX	GW-302X23B			0.002 J			0.0002 U	50			0.001 J	0.26		4.4	0.02 J		
XX	7/25/2007	XX	GW-302X27F			0.001 U			0.0002 J	44			0.001 J	0.13		2.5	0.02 J		
XX	9/10/2007	XX	GW-302X2A5			DE			DE	DE			DE	DE		DE	DE		
<b>MW-302R</b>																			
XX	5/20/2008	XX	GW-302X2DJ			0.004 J			0.001 U	36.1			0.003 U	0.19		2.4	0.06		

SUMMARY REPORT  
 Metal (part 1 of 2)

(MW-302R)	Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
XX	7/29/2008	XX	GW-302X2H3			0.002 U			0.0002 U	34.9			0.001 U	0.11		2.4		0.02 U	
XX	10/27/2008	XX	GW-302X2JD			0.002 U			0.0002 U	39			0.01 U	0.04 J		2.9		0.02 J	
XX	4/13/2009	XX	GW-302X331			0.002 U			0.0002 U	24.1			0.001 U	0.02 U		1.9		0.02 U	
XX	7/16/2009	XX	GW-302X375			0.005			0.0002 U	26.7			0.001 U	0.04 J		1.9		0.02 U	
XX	10/27/2009	XX	GW-302X3F0			0.008			0.0002 U	60.4			0.001 U	0.02 J		4.9		0.02 J	
XX	4/26/2010	XX	GW-302X3JJ			0.002 J			0.0002 U	17.6			0.001 U	0.02 U		1.4		0.02 J	
XX	7/19/2010	XX	GW-302X433			0.014			0.0002 J	58			0.001 U	0.02 U		4.5		0.02 U	
XX	10/18/2010	XX	GW-302X467			0.008			0.0002 U	66.2			0.001 U	0.02 U		5.3		0.03 J	
XX	4/25/2011	XX	GW-302X4A8			0.009			0.0002 U	29.4			0.001 U	0.02 U		2.6		0.02 U	
XX	7/18/2011	XX	GW-302X4E6			0.009			0.0002 J	33.8			0.001 U	0.02 U		3.1		0.02 U	
XX	10/24/2011	XX	GW-302X4H1			0.002 U			0.0006	42.2			0.002 J	0.02 U		3.7		0.02 U	
XX	4/23/2012	XX	GW-302X52B			0.005 U			0.0006 U	26			0.003 U	0.05 U		2.3		0.05 U	
XX	7/23/2012	XX	GW-302X57A			0.005 U			0.0006 U	32.6			0.003 U	0.05 U		2.8		0.05 U	
XX	10/22/2012	XX	GW-302X5E1			0.009			0.0006 U	54.6			0.003 U	0.05 U		4.3		0.05 U	
<b>MW-303</b>																			
XX	11/26/1996	XX	GW-303X0B1											0.13				0.011	
XX	3/26/1997	XX	MW-303828-35515							3.7				0.033		1.5		0.025	
XX	6/2/1997	XX	MW-303828-35583							3.9				0.05 U		1.43		0.02 U	
XX	9/8/1997	XX	MW-303830-35681							4				0.05		1.2		0.03	
XX	12/3/1997	XX	MW-303831-35787							4.3				0.2		1.48		0.02	
XX	3/25/1998	XX	MW-303832-35879							4.2				0.1		2		0.02 U	
XX	6/9/1998	XX	MW-303833-35955							4.1				0.05 U		1.92		0.03	
XX	9/8/1998	XX	MW-303834-36046							4.8				0.05 U		1.6		0.02 U	
XX	12/14/1998	XX	MW-303835-36143							5.4				0.05 U		1.16		0.02 U	
XX	3/29/1999	XX	MW-303836-36248							4.4				0.02		0.61		0.01	
XX	6/8/1999	XX	MW-303837-36319							4.4				0.15		1.55		0.01	
XX	9/13/1999	XX	MW-303838-36416							3.7				0.06 U		0.97		0.05 U	
XX	12/11/1999	XX	MW-303839-36495							5.3				0.06 U		1.76		0.05 U	
XX	3/27/2000	XX	MW-303840-36612											0.34				0.01 U	
XX	6/12/2000	XX	MW-303841-36689											0.1				0.01 U	
XX	9/13/2000	XX	MW-303842-36782							4.7				0.038		1.9		0.01 U	
XX	12/11/2000	XX	MW-303843-36871							5.2				0.32		2.1		0.01	
XX	3/13/2001	XX	MW-303844-36963							5.6				0.88		2.3		0.03	
XX	6/19/2001	XX	MW-303845-37061							5				0.16		2		0.01 U	
XX	9/11/2001	XX	MW-303846-37145							7.1				0.065		2.4		0.01	
XX	12/12/2001	XX	MW-303847-37237							4.2				1		1.8		0.013	
XX	3/13/2002	XX	MW-303848-37328							5.7				0.11		2.4		0.01 U	
XX	6/17/2002	XX	MW-303849-37424							5.31				0.025		2.3		0.01 U	
XX	9/18/2002	XX	MW-303850-37517											0.018				0.01 U	
XX	12/9/2002	XX	MW-303851-37599							5.4				0.42		2		0.011	
XX	3/26/2003	XX	MW-303837706							5.2				0.11		2		0.01 U	
XX	6/25/2003	XX	MW-303837797							4.5				0.14		2		0.014	
XX	9/17/2003	XX	MW-303837881											0.054		1.6		0.01	
XX	5/6/2004	XX	GW-303X00C	0.2 U	0.002 J	0.003 J	0.1 U	0.0002 U	0.0002 J	4.7	0.002 U	0.003 U	0.001 U	0.03 J	0.002 U	2		0.02 J	0.0002 U
XX	7/28/2004	XX	GW-303X040	0.2 U	0.002 U	0.001 U	0.1 U	0.0002 U	0.0002 U	3.3	0.002 U	0.003 U	0.001 J	0.05 J	0.002 U	1.9		0.02 J	0.0002 U
XX	10/26/2004	XX	GW-303X07G							3.1				0.12		2		0.03 J	
XD	10/26/2004	XD	GWDP3X06J							3				0.09		2		0.02 J	
XX	5/11/2005	XX	GW-303X13H							2.8			0.01 U	0.05 J		1.84		0.02 U	
XX	8/1/2005	XX	GW-303X175							2.9			0.001 U	0.07		2		0.02 U	

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Metal (part 1 of 2)**

Page 23 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-303)	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
Date	Type	Sample ID														
8/1/2005	XD	GWDP1X15H				0.0002 J	3			0.001 U	0.08		2		0.02 U	
9/19/2005	XX	GW303X1A3				0.001 J	4.1			0.002 J	0.02 J		1.78		0.02 U	
5/23/2006	XX	GW303X1E1				0.001 U	5.1			0.002 J	0.02 J		2		0.02 U	
7/24/2006	XD	GWDP4X1H4				0.001 U	5.1			0.001 U	0.02 J		2		0.02 U	
7/24/2006	XX	GW303X1HF				0.001 U	4.9			0.001 U	0.02 J		2		0.02 U	
9/12/2006	XX	GW303X208				0.001 U	2.8			0.001 U	0.03 J		2		0.02 U	
5/14/2007	XX	GW303X23F				0.003 J	3.7			0.001 J	0.02 J		2.2		0.02 U	
7/25/2007	XD	GWDP4X278				0.001 U	6.6			0.002 J	0.04 J		2.2		0.02 U	
7/25/2007	XX	GW303X27J				0.001 U	6.8			0.001 J	0.04 J		2.1		0.02 U	
9/11/2007	XX	GW303X2A9				0.001 J	6			0.002 J	0.07		2.1		0.02 J	
9/11/2007	XD	GWDP1X281				0.001 U	5.9			0.002 J	0.08		2.1		0.02 J	
5/19/2008	XX	GW303X2E3				0.002 U	9.1			0.003 U	0.02 U		3.8		0.02 U	
7/29/2008	XD	GWDP4X2G6				0.001 U	9			0.001 J	0.02 U		3.9		0.02 U	
7/29/2008	XX	GW303X2H7				0.002 U	9.1			0.001 J	0.02 U		3.9		0.02 U	
10/27/2008	XX	GW303X2JH				0.002 U	10.1			0.01 U	0.02 J		4.4		0.02 U	
10/27/2008	XD	GWDP3X2J0				0.002 U	10.1			0.01 U	0.02 U		4.4		0.02 U	
4/13/2009	XX	GW303X335				0.002 U	15.8			0.001 U	0.02 U		8.1		0.02 U	
7/6/2009	XX	GW303X379				0.005	18.2			0.007	0.02 U		7.9		0.02 U	
7/6/2009	XD	GWDP3X38C				0.005	17.1			0.006	0.02 U		7.8		0.02 U	
10/28/2009	XX	GW303X3F4				0.007	16.4			0.001 J	0.06		7.5		0.02 U	
4/26/2010	XX	GW303X403				0.002 J	17.6			0.001 U	0.02 U		7.9		0.02 U	
7/19/2010	XD	GWDP4X42G				0.002 U	19.1			0.001 U	0.02 U		8.3		0.02 U	
7/19/2010	XX	GW303X437				0.007	19.7			0.001 J	0.02 U		8.2		0.02 U	
10/18/2010	XX	GW303X46B				0.006	20			0.004	0.05		7.4		0.03 J	
4/25/2011	XX	GW303X4AC				0.012	21.1			0.001 U	0.07		9.7		0.02 U	
7/18/2011	XD	GWDP4X4DJ				0.02	18.8			0.001 U	0.03 J		9.2		0.02 J	
7/18/2011	XX	GW303X4EA				0.017	18.7			0.001 U	0.04 J		9.2		0.02 J	
10/24/2011	XX	GW303X4I5				0.002 U	23.3			0.001 U	0.02 U		10.9		0.02 U	
10/24/2011	XD	GWDP4X4HE				0.002 U	22.9			0.001 U	0.02 U		10.2		0.02 U	
4/23/2012	XX	GW303X52F				0.005 U	25.2			0.003 U	0.07		12.1		0.05 U	
7/24/2012	XX	GW303X57E				!	!			!	!		!		!	!
<b>MW12-303R</b>																
10/23/2012	XX	GW303X5EG				0.005 U	16.6			0.003 U	0.1		7.8		0.32	
<b>MW-304A</b>																
7/29/2004	XX	GW304AH00	0.2 U	0.003 J	0.002 J	0.0002 U	16	0.002 U		0.003	0.03 J	0.009	4.8	0.14	0.0002 U	
10/27/2004	XX	GW304A07B	0.2 U	0.002 U	0.001 U	0.0002 U	19	0.002 U		0.002 J	0.02 J	0.002 U	5.1	0.2	0.0002 U	
5/11/2005	XX	GW304A13C				0.002 J	6.2			0.01 U	0.08		2.3		0.02 U	
7/28/2005	XX	GW304A170				0.001 U	10			0.0002 U	0.02 J		2.5		0.03 J	
9/19/2005	XX	GW304A19I				0.001 J	13			0.001 U	0.04 J		3.3		0.03 J	
5/24/2006	XX	GW304A1ED				0.001 J	11			0.008	0.1		4.3		0.02 U	
7/25/2006	XX	GW304A1HA				0.001 J	12			0.002 J	0.09		4.8		0.02 J	
9/12/2006	XX	GW304A203				0.001 U	13			0.001 U	0.07		3.8		0.02 J	
5/15/2007	XX	GW304A23A				0.003 J	6.7			0.009	0.08		2.3		0.03 J	
7/24/2007	XX	GW304A27E				0.001 U	12			0.001 U	0.02 J		4.3		0.02 U	
9/11/2007	XX	GW304A244				0.001 U	14			0.001 U	0.02 J		3.5		0.02 U	
5/20/2008	XX	GW304A2DI				0.003 J	10.7			0.003 U	0.05		2.9		0.02 U	
7/29/2008	XX	GW304A2H2				0.002 U	12.9			0.001 U	0.03 J		3.5		0.02 U	
10/27/2008	XX	GW304A2JC				0.002 U	13.6			0.01 U	0.04 J		3.7		0.02 U	

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Metal (part 1 of 2)**

Page 24 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-304A)	Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
4/13/2009	XX		GW304A330			0.002 U			0.0002 J	13.8			0.001 U	0.03 J		4		0.02 U	
7/6/2009	XX		GW304A374			0.003 J			0.0002 U	12.9			0.001 U	0.03 J		3		0.02 U	
10/27/2009	XX		GW304A3EJ			0.002 J			0.0006	14.7			0.001 U	0.02 U		3.7		0.02 U	
4/26/2010	XX		GW304A3JI			0.002 U			0.0002 U	9.5			0.001 U	0.02 U		2.4		0.02 U	
7/19/2010	XX		GW304A432			0.005			0.0002 U	13.8			0.001 U	0.02 U		3.3		0.02 U	
10/18/2010	XX		GW304A466			0.003 J			0.0002 U	14.5			0.004	0.26		3.4		0.09	
4/25/2011	XX		GW304A4A7			0.004 J			0.0002 U	10.4			0.001 U	0.02 U		3.1		0.02 U	
7/18/2011	XX		GW304A4E5			0.005			0.0007	9.7			0.001 U	0.02 U		2.9		0.02 U	
10/24/2011	XX		GW304A4I0			0.002 J			0.0005 J	12.9			0.001 U	0.02 U		3.6		0.02 U	
4/23/2012	XX		GW304A452A			0.006			0.0006 U	13.9			0.003 U	0.05 U		4		0.05 U	
7/23/2012	XX		GW304A4579			0.005 U			0.0006 U	14.3			0.003 U	0.05 U		3.8		0.05 U	
10/22/2012	XX		GW304A45E0			0.006			0.0006 U	11.7			0.003 U	0.05 U		3.5		0.05 U	
<b>MW-401A</b>																			
7/29/2004	XX		GW401A089	0.2 U	0.003 J	0.004	0.1 U	0.0003 J	0.0002 U	12	0.002 J		0.001 J	0.02 J	0.002 J	4.6		0.03 J	0.0002 U
10/27/2004	XX		GW401A071	0.2 U	0.002 U	0.007	0.1 U	0.0002 U	0.0002 U	13	0.002 U		0.001 J	0.07	0.002 U	3.7		0.03 J	0.0002 U
10/27/2004	XD		GWDP4X075	0.2 U	0.002 U	0.006	0.1 U	0.0002 U	0.0002 U	13	0.002 J		0.002 J	0.08	0.002 U	3.7		0.02 J	0.0002 U
5/10/2005	XX		GW401A132			0.004			0.0002 U	11			0.01 U	0.05 J		3.7		0.02 U	
7/28/2005	XX		GW401A16A			0.002 J			0.0002 J	13			0.001 J	0.05 J		4		0.03 J	
7/28/2005	XD		GWDP4X16E			0.003 J			0.0002 U	13			0.001 U	0.05 J		4.1		0.02 J	
9/21/2005	XX		GW401A188			0.005			0.0002 U	13			0.001 U	0.02 J		3.8		0.02 U	
5/23/2006	XX		GW401A1E3			0.009			0.0005 J	12			0.001 U	0.07		3.8		0.02 U	
7/25/2006	XX		GW401A1H0			0.005			0.0006	13			0.001 U	0.03 J		4		0.02 J	
9/12/2006	XX		GW401A1JD			0.001 U			0.0002 U	15			0.001 U	0.02 J		4.1		0.02 J	
5/14/2007	XX		GW401A230			0.005			0.0023	15			0.002 J	0.05 J		4.1		0.02 J	
7/24/2007	XX		GW401A274			0.001 J			0.0003 J	14			0.003	0.04 J		4.5		0.02 U	
9/11/2007	XX		GW401A28E			0.001 U			0.0002 U	14			0.001 J	0.02 J		3.8		0.02 U	
5/20/2008	XX		GW401A2D8			0.003 U			0.0002 U	15.3			0.003 U	0.02 U		4.3		0.02 U	
7/28/2008	XX		GW401A2GC			0.002 J			0.0002 U	13.7			0.001 U	0.02 U		3.8		0.02 U	
10/27/2008	XX		GW401A2J2			0.003 J			0.0002 U	14.1			0.01 U	0.02 U		4		0.02 U	
4/13/2009	XX		GW401A32A			0.004 J			0.0002 U	15.9			0.001 U	0.02 U		4.8		0.02 U	
10/28/2009	XX		GW401A38E			0.002 U			0.0002 U	15.4			0.001 U	0.02 U		4.3		0.02 U	
10/28/2009	XX		GW401A3E9			0.004 J			0.0005 J	14.5			0.001 U	0.02 U		3.9		0.02 U	
4/27/2010	XX		GW401A3J8			0.002 J			0.0002 U	14.5			0.001 U	0.02 U		4		0.02 U	
7/20/2010	XX		GW401A42C			0.006			0.0002 U	14.6			0.001 U	0.02 U		3.8		0.02 U	
10/20/2010	XX		GW401A45G			0.004 J			0.0002 U	15.8			0.001 U	0.02 U		3.8		0.02 U	
4/25/2011	XX		GW401A48H			0.005			0.0002 U	14.9			0.001 U	0.02 U		4.5		0.02 U	
7/18/2011	XX		GW401A4DF			0.009			0.0015	14.3			0.001 U	0.02 U		4		0.02 U	
10/24/2011	XX		GW401A4HA			0.005			0.0002 U	14.3			0.001 U	0.02 U		4.2		0.02 U	
4/23/2012	XX		GW401A520			0.007			0.0006 U	12.9			0.003 U	0.05 U		4.3		0.05 U	
7/23/2012	XX		GW401A56J			0.005 U			0.0006 U	12.1			0.003 U	0.05 U		3.9		0.05 U	
10/22/2012	XX		GW401A5DA			0.005 U			0.0006 U	13			0.003 U	0.05 U		4.4		0.05 U	
<b>MW-401B</b>																			
7/29/2004	XD		GWDP4X05D	0.2 U	0.003 J	0.003 J	0.1 U	0.0002 U	0.0002 U	70	0.002 U		0.001 J	1.22	0.002 J	21		2.9	0.0002 U
7/29/2004	XX		GW401B05A	0.2 U	0.002 J	0.004	0.1 U	0.0002 U	0.0002 U	70	0.002 U		0.001 J	1.18	0.002 J	21		2.9	0.0002 U
10/27/2004	XX		GW401B072	0.2 U	0.002 U	0.005	0.1 U	0.0002 U	0.0002 U	90	0.002 U		0.001 J	8.2	0.002 U	24		2.9	0.0002 U
5/10/2005	XD		GWDP4X136			0.004			0.0002 U	60			0.01 U	19.5		17.5		0.93	
5/10/2005	XX		GW401B133			0.004			0.0002 U	55			0.01 U	19		18		0.92	
7/27/2005	XX		GW401B16B			0.006			0.0002 U	75			0.001 J	10.5		23		0.8	

**SUMMARY REPORT**  
**Metal (part 1 of 2)**

Page 25 of 34  
 SEVVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

**(MW-401B)**

Date Type Sample ID

Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L
9/21/2005	XX	GW401B199			0.004			0.0002 U	100			0.002 J	9.6		36	0.69	
9/21/2005	XD	GWDP4X19C			0.005			0.0002 U	105			0.002 J	9.5		33	0.72	
5/23/2006	XX	GW401B1E4			0.008			0.0002 J	50			0.001 U	7.1		15	0.29	
5/23/2006	XD	GWDP4X1E7			0.01			0.0002 U	49			0.001 U	6.7		14.5	0.31	
7/25/2006	XX	GW401B1H1			0.006			0.0002 U	50			0.005	3.8		15.5	0.32	
9/12/2006	XD	GWDP3X1JB			0.004			0.0002 U	50			0.001 U	4.1		14.5	0.33	
9/12/2006	XX	GW401B1JE			0.005			0.0002 U	36			0.001 J	4		14	0.32	
5/14/2007	XD	GWDP4X234			0.01			0.0002 J	39			0.001 U	3.8		11.5	0.29	
7/24/2007	XX	GW401B275			0.002 J			0.0004 J	42			0.002 J	4		12	0.26	
9/11/2007	XD	GWDP4X29I			0.005			0.0002 J	49			0.001 U	4		13.5	0.25	
9/11/2007	XX	GW401B29F			0.006			0.0002 J	48			0.001 U	4.1		13.5	0.26	
5/20/2008	XX	GW401B2D9			0.009			0.001 U	39.8			0.003 U	2.05		11.6	0.22	
5/20/2008	XD	GWDP4X2DC			0.01			0.001 U	39.3			0.003 U	2.08		11.6	0.22	
7/28/2008	XX	GW401B2GD			0.008			0.0002 U	41.3			0.001 U	2.63		11.5	0.22	
10/27/2008	XD	GWDP4X2J6			0.005			0.0002 U	42.7			0.01 U	2.62		12.6	0.17	
10/27/2008	XX	GW401B2J3			0.005			0.0002 U	42			0.01 U	2.63		12.7	0.17	
4/13/2009	XD	GWDP4X32E			0.013			0.0002 U	30.3			0.001 U	0.89		9	0.12	
4/13/2009	XX	GW401B32B			0.014			0.0002 J	31.1			0.001 U	1.08		9.6	0.14	
7/7/2009	XX	GW401B36F			0.005			0.0002 U	37			0.001 U	1.23		10.6	0.19	
10/28/2009	XD	GWDP3X3E7			0.016			0.0004 J	39.6			0.001 U	2.21		10.9	0.2	
10/28/2009	XX	GW401B35A			0.016			0.0007	40.6			0.001 U	1.98		11.2	0.2	
4/27/2010	XX	GW401B3J9			0.012			0.0002 U	29			0.001 U	0.71		8	0.13	
4/27/2010	XD	GWDP4X3JC			0.013			0.0002 U	30.3			0.001 U	0.71		8.5	0.13	
7/20/2010	XX	GW401B42D			0.023			0.0002 U	37.2			0.001 U	1.91		10.2	0.18	
7/20/2010	XD	GWDP3X42A			0.021			0.0002 U	40.4			0.001 U	1.92		11.2	0.19	
10/20/2010	XX	GW401B45H			0.011			0.0002 U	38.5			0.001 U	2.09		10.8	0.17	
10/20/2010	XD	GWDP4X460			0.012			0.0002 U	37.6			0.001 U	2.11		10.1	0.16	
4/25/2011	XD	GWDP4X4A1			0.019			0.0002 U	25.2			0.001 U	0.41		8.1	0.07	
4/25/2011	XX	GW401B49I			0.016			0.0002 U	25.9			0.001 U	0.4		8.3	0.07	
7/18/2011	XX	GW401B4DG			0.021			0.0019	26.8			0.001 U	0.54		8.9	0.15	
7/18/2011	XD	GWDP1X4D2			0.022			0.0022	27.2			0.001 U	0.54		8.8	0.15	
10/24/2011	XX	GW401B4HB			0.006			0.0002 U	33.7			0.001 U	1.1		10.1	0.16	
4/23/2012	XX	GW401B52I			0.017			0.0006 U	25.3			0.003 U	0.19		8.3	0.05	
4/23/2012	XD	GWDP4X524			0.015			0.0006 U	24.6			0.003 U	0.23		9	0.05	
7/23/2012	XX	GW401B570			0.011			0.0006 U	29.9			0.003 U	0.63		8.8	0.16	
7/23/2012	XD	GWDP1X566			0.014			0.0006 U	26.5			0.003 U	0.5		8.4	0.16	
10/22/2012	XX	GW401B5DB			0.016			0.0006 U	34.5			0.003 U	0.99		11	0.2	

**MW-402A**

7/29/2004	XX	GW402A05B	0.2 U	0.002 U	0.016	0.1 U	0.0004 J	0.0002 U	10	0.002 U		0.001 J	0.02 J	0.002 U	2.9	0.03 J	0.0002 U
10/27/2004	XX	GW402A073	0.2 U	0.002 U	0.016	0.1 U	0.0002 U	0.0002 U	10	0.002 U		0.001 J	0.02 J	0.002 U	3	0.02 U	0.0002 U
5/11/2005	XX	GW402A134			0.012			0.0002 U	7.7			0.01 U	0.08		2.7	0.02 U	
8/1/2005	XX	GW402A16C			0.015			0.0002 U	10			0.001 U	0.03 J		2.7	0.02 U	
9/21/2005	XX	GW402A19A			0.015			0.0002 U	10			0.003	0.03 J		2.7	0.02 U	
5/23/2006	XX	GW402A1E5			0.028			0.0002 U	8.9			0.001 U	0.02 J		2.7	0.02 U	
7/26/2006	XX	GW402A1H2			0.02			0.0002 U	9			0.001 U	0.02 J		2.8	0.02 J	
9/12/2006	XX	GW402A1JF			0.015			0.0002 U	10			0.001 U	0.02 J		2.9	0.02 J	
5/15/2007	XX	GW402A232			0.015			0.0002 U	10			0.001 J	0.03 J		3	0.02 J	
7/25/2007	XX	GW402A276			0.014			0.0002 J	10			0.001 U	0.05 J		2.9	0.02 U	

**SUMMARY REPORT**  
Metal (part 1 of 2)

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

(MW-402A)	Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L
XX	9/12/2007	XX	GW402A29G			0.013			0.0002 U	11			0.001 U	0.02 J		2.7		0.02 U
XX	5/20/2008	XX	GW402A2DA			0.016			0.001 U	12.2			0.003 U	0.02 U		3.2		0.02 U
XX	7/28/2008	XX	GW402A2GE			0.015			0.0002 U	10.6			0.001 U	0.02 U		2.6		0.02 U
XX	10/27/2008	XX	GW402A2JA			0.015			0.0002 U	10.8			0.001 U	0.02 U		2.9		0.02 U
XX	4/14/2009	XX	GW402A32C			0.016			0.0002 U	12.3			0.001 U	0.02 U		3.2		0.02 U
XX	7/8/2009	XX	GW402A36G			0.012			0.0002 U	11.4			0.001 U	0.02 U		2.8		0.02 U
XX	10/28/2009	XX	GW402A3EB			0.019			0.0003 J	12.3			0.001 U	0.02 U		3.1		0.02 U
XX	4/27/2010	XX	GW402A3JA			0.016			0.0002 U	11			0.001 U	0.02 U		2.8		0.02 U
XX	7/21/2010	XX	GW402A42E			0.017			0.0002 U	10.8			0.001 U	0.02 U		2.8		0.02 U
XX	10/20/2010	XX	GW402A45I			0.024			0.001	10.5			0.001 U	0.02 U		2.7		0.02 U
XX	4/27/2011	XX	GW402A48J			0.024			0.0017	10.7			0.001 U	0.02 U		2.8		0.02 U
XX	7/20/2011	XX	GW402A4DH			0.025			0.0025	11			0.003	0.02 U		2.8		0.02 U
XX	10/26/2011	XX	GW402A4HC			0.023			0.0006 U	10.7			0.003 U	0.05 U		2.9		0.05 U
XX	4/24/2012	XX	GW402A522			0.019			0.0006 U	11.3			0.003 U	0.05 U		2.9		0.05 U
XX	7/25/2012	XX	GW402A571			0.021			0.0006 U	11.3			0.003 U	0.05 U		2.9		0.05 U
XX	10/24/2012	XX	GW402A5DC			0.017			0.0006 U	11.1			0.003 U	0.05 U		3.1		0.05 U

**MW-402B**

XX	7/29/2004	XX	GW402B05C	0.2 U	0.002 U	0.014	0.1 U	0.0002 U	0.0002 U	16	0.002 U		0.001 J	0.03 J	0.002 U	5.5		0.04 J	0.0002 U
XX	10/27/2004	XX	GW402B074	0.2 U	0.002 U	0.015	0.1 U	0.0002 U	0.0002 U	15	0.002 U		0.001 J	0.02 U	0.002 U	4.8		0.03 J	0.0002 U
XX	5/11/2005	XX	GW402B135			0.014			0.0002 U	14			0.01 U	0.05 J		4.9		0.02 J	
XX	8/1/2005	XX	GW402B16D			0.014			0.0002 U	16			0.001 J	0.07		5.1		0.02 J	
XX	9/21/2005	XX	GW402B19B			0.014			0.0002 U	15			0.003	0.03 J		4.9		0.02 J	
XD	9/21/2005	XD	GWDF3X196			0.012			0.0002 U	15			0.004	0.02 J		4.9		0.02 J	
XX	5/23/2006	XX	GW402B1E6			0.02			0.0002 U	15			0.001 U	0.02 J		4.9		0.02 J	
XX	7/26/2006	XX	GW402B1H3			0.017			0.0002 U	15			0.001 U	0.02 J		5.2		0.02 J	
XX	9/12/2006	XX	GW402B1JG			0.016			0.0002 U	16			0.001 U	0.02 J		5.3		0.02 J	
XX	5/15/2007	XX	GW402B233			0.014			0.0002 U	14			0.001 J	0.02 J		5.2		0.04 J	
XX	7/25/2007	XX	GW402B277			0.013			0.0003 J	15			0.001 U	0.05 J		5.2		0.02 J	
XX	9/12/2007	XX	GW402B29H			0.01			0.0002 J	16			0.001 U	0.02 U		4.8		0.02 U	
XX	5/20/2008	XX	GW402B2DB			0.012			0.001 U	16.3			0.003 U	0.02 U		5.4		0.02 U	
XX	7/28/2008	XX	GW402B2GF			0.012			0.0002 U	14.5			0.001 U	0.02 J		4.7		0.02 J	
XX	10/27/2008	XX	GW402B2J5			0.014			0.0002 U	14.8			0.01 U	0.02 U		5.1		0.02 J	
XX	4/14/2009	XX	GW402B32D			0.015			0.0002 U	15.5			0.001 U	0.02 U		5.1		0.02 J	
XX	7/8/2009	XX	GW402B38H			0.013			0.0003 J	15.7			0.001 U	0.02 J		5.1		0.02 J	
XX	10/28/2009	XX	GW402B3EC			0.02			0.0005 J	16.9			0.001 U	0.03 J		5.5		0.02 J	
XX	4/27/2010	XX	GW402B3JB			0.017			0.0002 U	14.5			0.001 U	0.02 U		4.8		0.02 J	
XX	7/21/2010	XX	GW402B42F			0.018			0.0002 U	14.5			0.001 U	0.02 U		4.8		0.02 J	
XX	10/20/2010	XX	GW402B45J			0.018			0.0002 U	17.2			0.001 U	0.02 U		5.1		0.02 U	
XX	4/27/2011	XX	GW402B4A0			0.022			0.0006	14.2			0.001 U	0.02 U		4.8		0.02 J	
XX	7/20/2011	XX	GW402B4DI			0.023			0.0012	13.2			0.001 U	0.02 U		4.7		0.02 J	
XX	10/26/2011	XX	GW402B4HD			0.016			0.0007	15			0.001 U	0.02 U		4.8		0.02 U	
XX	4/24/2012	XX	GW402B523			0.018			0.001	13.6			0.003 U	0.05 U		4.9		0.05 U	
XX	7/25/2012	XX	GW402B572			0.017			0.0006 U	15			0.003 U	0.05 U		4.9		0.05 U	
XX	10/24/2012	XX	GW402B5DD			0.02			0.0006 U	13.9			0.003 U	0.05 U		5.1		0.05 U	

**P-04-02**

XX	2/5/2004	XX	GWXXX003E			0.009				11				1.32		4.7		0.09	
XX	2/11/2004	XX	GWXXX003C			0.004				15				0.64		4.8		0.1	
XX	5/5/2004	XX	GWXXX000E			0.004				21				0.04 J		6.3		0.12	

FOR: Juniper Ridge Landfill

SUMMARY REPORT

Metal (part 1 of 2)

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L
7/26/2004	XX	GWXXXX042			0.006				26				0.17	0.002 J	7.2	0.09	
10/25/2004	XX	GWXXXX071			0.006				25				0.18		7.1	0.12	
5/9/2005	XX	GWXXXX13J			0.004			0.0005 J	25			0.01 U	0.04 J		7.3	0.02 J	
7/27/2005	XX	GWXXXX177			0.005			0.0002 U	26			0.001 J	0.02 U		7.7	0.05	
9/22/2005	XX	GWXXXX1A5			0.004			0.0002 U	26			0.003	0.09		7.4	0.1	
5/22/2006	XX	GWXXXX1F0			0.005			0.0002 J	24			0.001 U	0.06		7.3	0.02 U	
7/24/2006	XX	GWXXXX1HH			0.001 J			0.0002 U	24			0.001 U	0.05 J		7.5	0.04 J	
9/11/2006	XX	GWXXXX20A			0.007			0.0002 J	26			0.003	0.09		7.8	0.02 U	
5/14/2007	XX	GWXXXX23H			0.005			0.0002 U	27			0.001 U	0.02 U		7.8	0.02 J	
7/23/2007	XX	GWXXXX281			0.001 U			0.0002 U	23			0.001 U	0.06		7.4	0.02 U	
9/10/2007	XX	GWXXXX2AB			0.002 J			0.0003 J	28			0.002 J	0.02 J		7.2	0.02 U	
5/21/2008	XX	GWXXXX2E5			0.006 J			0.001 U	25			0.004 J	0.07		7.6	0.02 U	
7/30/2008	XX	GWXXXX2H9			0.002 U			0.0002 U	23			0.001 U	0.03 J		6.9	0.02 U	
10/29/2008	XX	GWXXXX2JJ			0.003 J			0.0002 J	23.8			0.01 U	0.02 J		7.5	0.02 U	
4/13/2009	XX	GWXXXX337			0.004 J			0.0002 J	26.2			0.001 U	0.02 U		8.3	0.02 U	
7/6/2009	XX	GWXXXX37B			0.009			0.0006	25.9			0.001 J	0.07		7.5	0.02 U	
10/27/2009	XX	GWXXXX3F6			0.005			0.0002 U	25.5			0.001 U	0.02 J		7.7	0.02 U	
4/26/2010	XX	GWXXXX405			0.009			0.0002 U	22.6			0.002 J	0.02 U		6.5	0.02 U	
7/21/2010	XX	GWXXXX439			0.009			0.0002 U	23.6			0.001 U	0.02 U		7	0.02 U	
10/20/2010	XX	GWXXXX46D			0.009			0.0002 U	27			0.001 U	0.02 U		7.4	0.02 U	
4/27/2011	XX	GWXXXX4AE			0.01			0.0005 J	22.4			0.001 U	0.02 U		6.7	0.02 U	
7/20/2011	XX	GWXXXX4EC			0.012			0.0002 U	22.8			0.001 U	0.02 U		6.9	0.02 U	
10/26/2011	XX	GWXXXX4I7			—			—	—			—	—		—	—	
4/25/2012	XX	GWXXXX52H			0.007			0.0006 U	16.3			0.003	1.43		5.1	0.07	
4/25/2012	XX	GWXXXX588			0.005			0.0006 U	16			0.003 U	0.27		4.6	0.05 U	
7/25/2012	XX	GWXXXX5TG			0.005 U			0.0006 U	23.8			0.004	0.52		6.9	0.05	
10/24/2012	XX	GWXXXX5E7			0.005			0.0006 U	16.9			0.004	0.24		4.1	0.16	
<b>P-04-04</b>																	
2/5/2004	XX	GWXXXX03F			0.004				11				0.93		4.8	0.12	
2/11/2004	XX	GWXXXX03D			0.006				23				0.05 J		6.1	0.09	
5/6/2004	XX	GWXXXX00F			0.004				26				0.02 J		5.5	0.06	
7/26/2004	XX	GWXXXX043			0.002 J				27				0.06	0.002 J	6	0.02 J	
10/25/2004	XX	GWXXXX07J			0.004				26				0.03 J		5.7	0.02 U	
5/9/2005	XX	GWXXXX140			0.003 J			0.0002 U	24			0.01 U	0.04 J		5.5	0.02 U	
7/27/2005	XX	GWXXXX178			0.003 J			0.0002 U	24			0.001 U	0.04 J		5.8	0.02 U	
9/22/2005	XX	GWXXXX1A6			0.003 J			0.0002 U	23			0.003	0.04 J		5.4	0.02 J	
5/22/2006	XX	GWXXXX1F1			0.004			0.0004 J	21			0.001 U	0.07		5.4	0.02 U	
7/24/2006	XX	GWXXXX1HI			0.001 J			0.0002 U	22			0.001 U	0.02 J		5.5	0.02 J	
9/11/2006	XX	GWXXXX20B			0.009			0.0002 J	23			0.001 U	0.11		5.6	0.02 J	
5/14/2007	XX	GWXXXX23I			0.006			0.0002 U	24			0.015	0.02 J		5.6	0.02 U	
7/23/2007	XX	GWXXXX282			0.002 J			0.0002 U	20			0.001 U	0.05 J		5.2	0.02 U	
9/10/2007	XX	GWXXXX2AC			0.004			0.0002 J	24			0.001 J	0.02 J		5.1	0.02 U	
5/21/2008	XX	GWXXXX2E6			0.006 J			0.001 U	22.7			0.003 U	0.02 J		5.6	0.02 U	
7/30/2008	XX	GWXXXX2HA			0.002 J			0.0002 U	20.2			0.001 U	0.02 J		4.9	0.02 U	
10/29/2008	XX	GWXXXX300			0.005			0.0004 J	58.1			0.01 U	0.02 J		5.8	0.02 U	
4/13/2009	XX	GWXXXX338			0.005			0.0002 J	22.7			0.001 U	0.02 U		5.7	0.02 U	
7/6/2009	XX	GWXXXX37C			0.008			0.0002 J	22.9			0.001 U	0.02 U		5.3	0.02 U	
10/27/2009	XX	GWXXXX3F7			0.005			0.0002 U	22.2			0.001 U	0.02 U		5.4	0.02 U	
4/26/2010	XX	GWXXXX406			0.007			0.0002 U	20.5			0.001 U	0.02 U		4.8	0.02 U	

**SUMMARY REPORT**  
**Metal (part 1 of 2)**

(P-04-04)	Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
	7/21/2010	XX	GWXXXX43A			0.008			0.0002 U	21.4			0.001 U	0.02 U		5.3	0.02 U		
	10/20/2010	XX	GWXXXX46E			0.008			0.0002 U	24			0.001 U	0.02 U		5.5	0.02 U		
	4/27/2011	XX	GWXXXX4AF			0.011			0.0005 J	20.9			0.001 U	0.02 U		5	0.02 U		
	7/20/2011	XX	GWXXXX4ED			0.01			0.0002 U	20.8			0.001 U	0.02 U		5.1	0.02 U		
	10/26/2011	XX	GWXXXX4I8			0.002 U			0.0002 U	22			0.001 U	0.02 U		5.2	0.02 U		
	4/25/2012	XX	GWXXXX4S2I			0.008			0.0006 U	18.3			0.003 U	0.05 U		5.1	0.05 U		
	7/25/2012	XX	GWXXXX57H			0.005			0.0006 U	21.2			0.003 U	0.05 U		5.2	0.05 U		
	10/24/2012	XX	GWXXXX5E8			0.01			0.0006 U	19.9			0.003 U	0.05 U		5.8	0.05 U		
<b>PWS10-1</b>																			
	4/26/2010	XX	GW PWS131J			0.008			0.0002 U	17			0.001 U	2.25		4.5	0.18		
	7/19/2010	XX	GW PWS1423			0.015			0.0002 U	35.2			0.009	30.3		12.2	0.72		
	10/18/2010	XX	GW PWS1457			0.009			0.0002 U	34.6			0.001 U	0.63		9	0.05		
	4/25/2011	XX	GW PWS1498			0.013			0.0002 U	18.4			0.001 U	2.97		7.5	0.1		
	7/18/2011	XX	GW PWS14D6			0.007			0.0016	23.9			0.003	5.09		7.7	0.56		
	10/24/2011	XX	GW PWS14H1			0.002 U			0.0002 U	20.7			0.006	4.27		6.9	0.35		
	4/23/2012	XX	GW PWS151B			0.007			0.0006 U	16.3			0.003 U	0.48		5.1	0.07		
	7/23/2012	XX	GW PWS156A			0.005 U			0.0006 U	9.8			0.003 U	3.47		3.2	0.4		
	10/22/2012	XX	GW PWS15D1			0.006			0.0006 U	13.2			0.003 U	2.61		5.3	0.1		
<b>PWS10-2</b>																			
	4/26/2010	XX	GW PWS23J0			0.004 J			0.0002 U	6.9			0.001 U	1.03		1.5	0.02 U		
	7/19/2010	XX	GW PWS2424			0.005			0.0002 U	10.2			0.001 U	2.54		2.9	0.05		
	10/18/2010	XX	GW PWS2458			0.006			0.0002 U	9.7			0.001 U	0.35		2.4	0.02 U		
	4/25/2011	XX	GW PWS2499			0.002 U			0.0003 J	6.1			0.002 J	3.06		1.9	0.03 J		
	7/18/2011	XX	GW PWS24D7			0.003 J			0.0014	15.2			0.001 J	0.9		3.9	0.43		
	10/24/2011	XX	GW PWS24H2			0.002 U			0.0002 U	12.3			0.013	2.09		2.8	0.07		
	4/23/2012	XX	GW PWS251C			0.005 U			0.0006 U	5.7			0.003 U	1.48		1.6	0.05 U		
	7/23/2012	XX	GW PWS256B			0.005 U			0.0006 U	8.1			0.003 U	1.55		2.7	0.07		
	10/22/2012	XX	GW PWS25D2			0.005 U			0.0006 U	6.6			0.003	0.32		1.4	0.05		
<b>PWS10-3</b>																			
	4/26/2010	XX	GW PWS33J1			0.003 J			0.0002 U	25			0.001 U	0.34		3.6	0.02 J		
	7/19/2010	XX	GW PWS3425			0.004 J			0.0002 U	17			0.001 J	20.8		4.3	0.72		
	10/18/2010	XX	GW PWS3459			0.005			0.0002 U	7.4			0.001 U	2.26		2.4	0.11		
	4/25/2011	XX	GW PWS349A			0.011			0.0002 U	17.8			0.001 U	1.69		3.4	0.05		
	7/18/2011	XX	GW PWS34D8			0.004 J			0.001	12.9			0.002 J	3.85		3.5	1.48		
	10/24/2011	XX	GW PWS34H3			0.002 U			0.0002 U	10.6			0.007	4.95		2.4	0.09		
	4/23/2012	XX	GW PWS351D			0.005 U			0.0006 U	5.1			0.003 U	0.64		2.3	0.05 U		
	7/23/2012	XX	GW PWS356C			0.005 U			0.0006 U	6.2			0.003 U	1.54		2.3	0.12		
	10/22/2012	XX	GW PWS35D3			0.005 U			0.0006 U	4.4			0.003	3.07		1.7	0.15		
<b>SW-1</b>																			
	11/13/1990	XD	SW-1XD33190						0.005 U	3.8	0.01 U		0.02 U	0.3		1.4	0.014		
	11/13/1990	XX	SW-133190						0.005 U	3.9	0.01 U		0.02 U	0.3		1.4	0.014		
	2/20/1991	XX	SW-133289	F	F	F	F	F	F	F	F	F	F	F	F	F	F	F	
	6/4/1991	XX	SW-133393						0.005 U	7.3	0.01 U		0.02 U	1.6		2.1	0.094		
	9/16/1991	XX	SW-133497						0.005 U	7.5	0.01 U		0.02 U	0.88		2	0.056		
	12/18/1991	XX	SWXX1X00B						0.005 U	6	0.01 U		0.02 U	0.33		1.9	0.029		
	3/2/1992	XX	SWXX1X019	F	F	F	F	F	F	F	F	F	F	F	F	F	F	F	
	6/23/1992	XX	SWXX1X024						0.005 U	9	0.01 U		0.02 U	3.2		2.3	0.12		

**SUMMARY REPORT**  
**Metal (part 1 of 2)**

(SW-1)	Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L
XX	8/17/1992	XX	SWXX1X033						0.005 U	21	0.01 U		0.02 U	2.7		3.3	0.42	
XX	1/26/1993	XX	SWXX1X03J						0.005 U	8.7	0.01 U		0.02 U	0.6		2.9	0.18	
XX	4/27/1993	XX	SWXX1X049						0.005 U	4	0.01 U		0.02 U	0.37		2.8	0.011	
XX	7/21/1993	XX	SWXX1X051						0.005 U	11	0.01 U		0.02 U	4.8		2.8	0.54	
XX	10/12/1993	XX	SWXX1X06A						0.005 U	6.5	0.01 U		0.02 U	0.57		1.9	0.074	
XX	1/11/1994	XX	SWXX1X076						0.005 U	10	0.01 U		0.02 U	0.81		2.8	0.14	
XX	5/21/1996	XX	SWXX1X09F						0.0005 U	5.3	0.002 U		0.01	0.25		1.62	0.001	
XX	11/25/1996	XX	SWXX1X0AH											0.41			0.04	
XX	3/26/1997	XX	SW-1816-3515							F				F			F	
XX	6/4/1997	XX	SW-1817-35585							8.1				2.3		2.3	0.18	
XX	9/11/1997	XX	SW-1818-35684							8.8				1.13		3	0.08	
XX	12/8/1997	XX	SW-1819-35772							6.5				0.67		2.8	0.05	
XX	3/25/1998	XX	SW-1820-35879							4.6				0.33		2.2	0.02 U	
XX	6/9/1998	XX	SW-1821-35955							8.9				1.3		2.6	0.17	
XX	9/10/1998	XX	SW-1822-36048							8.2				1.19		3.6	0.1	
XX	12/15/1998	XX	SW-1823-36144							7.5				0.54		2.4	0.05	
XX	3/30/1999	XX	SW-1824-36249							3.3				0.18		0.21	0.01	
XX	6/9/1999	XX	SW-1825-36320							7.7				1.44		2.2	0.25	
XX	9/15/1999	XX	SW-1826-36418							9.1				1.31		2.5	0.02	
XX	12/2/1999	XX	SW-1827-36496							10				0.81		3.3	0.17	
XX	3/28/2000	XX	SW-1828-36613							11				0.45			0.032	
XX	6/13/2000	XX	SW-1829-36690							8.2				0.95		3	0.091	
XX	9/13/2000	XX	SW-1830-36762							10				4		2.8	0.38	
XX	6/19/2001	XX	SW-1831-37061							12				5.3		2.8	0.41	
XX	9/11/2001	XX	SW-1832-37145							7				4.6		3.3	0.23	
XX	12/12/2001	XX	SW-1833-37237							7				1.4		2.6	0.072	
XX	3/14/2002	XX	SW-1834-37329											0.3			0.01 U	
XX	6/18/2002	XX	SW-1835-37425							6.8				1.6		2.2	0.021	
XX	9/19/2002	XX	SW-1836-37518							9.3				5.3		2.9	0.26	
XX	6/26/2003	XX	SW-1N37798											10			4.8	
XX	9/18/2003	XX	SW-1N37892											5.4			0.44	
XX	5/3/2004	XX	SWXX1X018			0.006				6.3				0.23		1.99	0.03 J	
XX	7/27/2004	XX	SWXX1X04E			0.006				7.3				3.3		2.4	0.75	
XX	10/26/2004	XX	SWXX1X069			0.005				4.8				0.63		1.77	0.06	
XX	5/10/2005	XX	SWXX1X12A			0.002 J			0.0002 U	3.1			0.01 U	0.21		1.19	0.02 U	
XX	7/28/2005	XX	SWXX1X15I			0.004			0.0002 U	6.8			0.001 J	5		2.4	0.4	
XX	9/20/2005	XX	SWXX1X18G			0.001 J			0.0002 U	11			0.001 J	3.5		2.9	0.23	
XX	5/24/2006	XX	SWXX1X1DB			0.004			0.0003 J	25			0.002 J	0.56		4.5	0.04 J	
XX	7/26/2006	XX	SWDP2X1GE			0.007			0.0002 U	7.6			0.002 J	2.3		2.3	0.32	
XX	9/13/2006	XX	SWXX1X1G8			0.007			0.0002 U	7.6			0.003	2.5		2.3	0.33	
XX	5/15/2007	XX	SWXX1X1J1			0.001 J			0.0002 U	48			0.002 J	1.16		8.7	0.16	
XX	5/15/2007	XX	SWXX1X228			0.004			0.0002 U	8.4			0.002 J	0.72		2.3	0.05	
XX	7/24/2007	XX	SWDP2X2ZE			0.004			0.0003 J	9.2			0.002 J	0.74		2.6	0.04 J	
XX	7/24/2007	XX	SWDP2X26I			0.001 U			0.0003 J	10			0.002 J	1.18		2.7	0.03 J	
XX	9/11/2007	XX	SWXX1X26C			0.001 J			0.0004 J	10			0.003	1.16		2.7	0.03 J	
XX	5/21/2008	XX	SWDP2X2D2			0.003 J			0.001 U	11			0.001 J	1.27		2.7	0.06	
XX	5/21/2008	XX	SWXX1X2CG			0.003 J			0.001 U	8.5			0.003 U	1.96		2.3	0.09	
XX	7/29/2008	XX	SWXX1X2G0			0.003 J			0.001 U	8.6			0.003 U	1.97		2.3	0.1	

SUMMARY REPORT  
 Metal (part 1 of 2)

(SW-1)	Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
XX	10/28/2008	XX	SWXX1X2IA			0.002 U			0.0005 J	6.9			0.01 U	0.57		2.1		0.03 J	
XX	4/14/2009	XX	SWXX1X31I			0.002 U			0.00002 U	9.4			0.0001 U	0.1		2.2		0.02 U	
XX	7/7/2009	XX	SWXX1X362			0.002 U			0.00002 U	5.4			0.0001 U	1.31		1.7		0.1	
XX	10/27/2009	XX	SWXX1X3DH			0.002 U			0.00002 U	3.9			0.0001 U	0.35		1.4		0.02 J	
XX	4/28/2010	XX	SWXX1X3IG			0.002 U			0.00003 J	6.9			0.0001 J	0.56		2.1		0.05	
XX	7/20/2010	XX	SWXX1X420			0.008			0.00002 U	33.7			0.0075	19.4		10.7		0.49	
XX	10/19/2010	XX	SWXX1X454			0.002 U			0.00002 U	6.4			0.0001 U	0.4		2.1		0.02 U	
XX	4/26/2011	XX	SWXX1X495			0.005			0.00002 U	5.4			0.0001 U	0.32		1.7		0.02 U	
XX	7/19/2011	XX	SWXX1X4D3			0.009			0.00002 U	26.2			0.0001 U	10.9		7.4		1.1	
XX	10/25/2011	XX	SWXX1X4GI			0.002 U			0.00002 J	7.5			0.0001 U	0.53		2		0.02 J	
XX	4/24/2012	XX	SWXX1X518			0.005 U			0.00006 U	5.4			0.0003 U	0.23		1.8		0.05 U	
XX	7/24/2012	XX	SWXX1X567			0.01			0.00006 U	10.6			0.0003 U	2.32		3.6		0.25	
XX	10/23/2012	XX	SWXX1X5CI			0.005 U			0.00019	11.6			0.0027	0.3		2.6		0.05	
<b>SW-2</b>																			
XX	11/13/1990	XX	SW-233190						0.005 U	3.6	0.01 U			0.02 U	0.24	1.2		0.005 U	
XX	2/20/1991	XX	SW-233289						0.005 U	7.2	0.01 U			0.02 U	1.6	2.6		0.1	
XD	2/20/1991	XD	SW-2XD33289						0.005 U	6.6	0.01 U			0.02 U	1.4	2.4		0.093	
XX	6/4/1991	XX	SW-233393						0.005 U	5.2	0.01 U			0.02 U	0.79	1.9		0.043	
XX	9/17/1991	XX	SW-233498						0.005 U	0.1 U	0.01 U			0.02 U	0.03 U	0.1 U		0.005 U	
XX	12/18/1991	XX	SWXX2X00C						0.005 U	4.4	0.01 U			0.02 U	0.58	1.5		0.094	
XD	3/2/1992	XD	SWXX2XHA0						0.005 U	7.4	0.01 U			0.02 U	4.2	2.9		0.11	
XX	3/2/1992	XX	SWXX2X01A						0.005 U	7.7	0.01 U			0.02 U	3	3		0.11	
XX	6/23/1992	XX	SWXX2X025						0.005 U	8.1	0.01 U			0.02 U	1.5	2.5		0.066	
XX	8/17/1992	XX	SWXX2X034						0.005 U	10	0.01 U			0.02 U	8.8	3.2		0.43	
XX	1/26/1993	XX	SWXX2X040						0.005 U	7.3	0.01 U			0.02 U	1.2	2.6		0.092	
XD	1/27/1993	XD	SWXX2XHA5						0.005 U	6.5	0.01 U			0.02 U	1.4	2.4		0.082	
XX	4/27/1993	XX	SWXX2X04A						0.005 U	3.8	0.01 U			0.02 U	0.75	1.3		0.025	
XX	7/21/1993	XX	SWXX2X052						0.005 U	9.4	0.01 U			0.02 U	1.9	2.9		0.075	
XX	10/13/1993	XX	SWXX2X06B						0.005 U	4.5	0.01 U			0.02 U	1.7	1.5		0.019	
XX	1/1/1994	XX	SWXX2X077						0.005 U	10	0.01 U			0.02 U	2.5	3.3		0.22	
XX	5/21/1996	XX	SWXX2X08G						0.0005 U	3.5	0.002 U			0.02	0.33	1.38		0.003	
XX	11/25/1996	XX	SWXX2X0AI											0.38				0.045	
XD	11/25/1996	XD	SWDP2X0AG											0.4				0.042	
XX	3/26/1997	XX	SW-2818-35515							5.8				1.43		2.3		0.1	
XX	6/4/1997	XX	SW-2818-35585							6.6				0.7		2.1		0.02	
XX	9/11/1997	XX	SW-2820-35684							6.9				2.6		2.7		0.15	
XX	12/8/1997	XX	SW-2821-35772							6.6				2.3		2.7		0.23	
XX	3/25/1998	XX	SW-2822-35879							3.8				1.32		1.81		0.12	
XX	6/9/1998	XX	SW-2823-35955							5.7				0.63		2.1		0.06	
XX	9/10/1998	XX	SW-2824-36048							9				1.27		3.7		0.13	
XX	12/15/1998	XX	SW-2825-36144							5.9				0.92		2.1		0.09	
XX	3/30/1999	XX	SW-2826-36249							2.3				0.22		0.56		0.06	
XX	6/9/1999	XX	SW-2827-36320							6.8				1.47		2		0.14	
XX	9/15/1999	XX	SW-2828-36418							6.9				2.9		2.1		0.22	
XX	12/2/1999	XX	SW-2829-36496							5.3				1.63		2		0.09	
XX	3/28/2000	XX	SW-2830-36613											0.63				0.096	
XX	6/13/2000	XX	SW-2831-36690							5.6				1.3		1.9		0.089	
XX	9/13/2000	XX	SW-2832-36792							6.6				0.77		2.3		0.063	
XX	12/12/2000	XX	SW-2833-36872							2				0.63		1 U		0.055	

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Metal (part 1 of 2)

Page 31 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(SW-2)	Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L
	6/19/2001	XX	SW-2834-37081							5.5				2.3		2		0.093
	9/11/2001	XX	SW-2835-37145							8.6				1.1		2.6		0.069
	12/12/2001	XX	SW-2836-37237							4.4				0.28		1.8		0.022
	3/14/2002	XX	SW-2837-37329											1				0.085
	6/18/2002	XX	SW-2838-37425							4.6				1.9		1.8		0.074
	9/19/2002	XX	SW-2839-37518							7.8				1.7		2.8		0.17
	12/10/2002	XX	SW-2840-37600											1.4				0.18
	3/26/2003	XX	SW-2N37706							4.3				0.38		1.6		0.066
	6/26/2003	XX	SW-2N37798											1.7				0.18
	9/18/2003	XX	SW-2N37882											2.3				0.11
	5/3/2004	XX	SWXX2X019			0.004				5.4				0.39		1.4		0.08
	7/27/2004	XX	SWXX2X04F			0.004				7.1				0.78	0.002 J	2.3		0.05
	7/27/2004	XD	SWDP2X050			0.005				6.8				0.77	0.001 J	2.4		0.07
	10/26/2004	XX	SWXX2X06A			0.001 J				4.7				0.37		1.9		0.03 J
	5/10/2005	XD	SWDP2X12G			0.003 J				3.1			0.002 U	0.21		1.32		0.02 U
	5/10/2005	XX	SWXX2X12B			0.002 J				3.2			0.001 J	0.2		1.33		0.02 U
	7/28/2005	XX	SWXX2X15J			0.001 U				5.3			0.002 U	0.47		2		0.07
	9/20/2005	XX	SWXX2X18H			0.007				5.8			0.002 U	0.75		1.92		0.08
	5/24/2006	XD	SWDP2X1DH			0.001 U				5.5			0.001 J	0.27		1.6		0.02 J
	5/24/2006	XX	SWXX2X1DC			0.003 J				5.4			0.001 J	0.28		1.61		0.02 J
	7/26/2006	XX	SWXX2X169			0.007				5.5			0.002 U	2.5		1.94		0.18
	9/13/2006	XX	SWXX2X1U2			0.001 J				4.5			0.002 U	1.63		2.8		0.17
	9/13/2006	XD	SWDP2X1J7			0.001 U				4.5			0.001 U	1.64		2.8		0.15
	5/15/2007	XX	SWXX2X229			0.002 J				5			0.002 J	0.68		1.71		0.08
	7/24/2007	XX	SWXX2X28D			0.001 J				10			0.001 J	1.26		2.4		0.12
	9/11/2007	XX	SWXX2X293			0.001 J				10			0.001 J	1.29		2.6		0.19
	9/11/2007	XD	SWDP2X298			0.001 U				10			0.002 J	1.28		2.6		0.2
	5/21/2008	XX	SWXX2X2GH			0.003 J				5			0.003 U	1.51		1.8		0.09
	7/29/2008	XX	SWXX2X2G1			0.002 U				6.3			0.001 U	1.37		2.3		0.14
	10/28/2008	XD	SWDP2X2IG			0.002 U				4.7			0.001 U	0.41		1.9		0.03 J
	10/28/2008	XX	SWXX2X2IB			0.002 U				4.6			0.01 U	0.38		1.9		0.02 J
	4/14/2009	XX	SWXX2X31J			0.002 U				2.8			0.0002 U	0.37		1.1		0.04 J
	7/7/2009	XX	SWXX2X363			0.004 J				4.2			0.0003 J	0.68		1.5		0.06
	7/7/2009	XD	SWDP2X368			0.002 J				4.1			0.0004 J	0.76		1.5		0.06
	10/27/2009	XX	SWXX2X38D			0.002 U				7			0.002 U	0.14		2.1		0.02 U
	4/28/2010	XD	SWDP2X3J2			0.005				4.6			0.0002 U	0.32		1.7		0.04 J
	4/28/2010	XX	SWXX2X3IH			0.003 J				4.5			0.0002 J	0.31		1.7		0.04 J
	7/20/2010	XD	SWDP2X426			0.002 J				5.7			0.0002 U	0.67		2.1		0.06
	7/20/2010	XX	SWXX2X421			0.002 J				5.9			0.0002 J	0.68		2.1		0.06
	10/19/2010	XD	SWDP2X45A			0.002 U				5.7			0.0002 U	0.44		2		0.02 J
	10/19/2010	XX	SWXX2X455			0.002 U				5.8			0.0002 U	0.44		2.1		0.02 J
	4/26/2011	XD	SWDP2X49B			0.006				3.6			0.0002 U	0.17		1.3		0.02 U
	4/26/2011	XX	SWXX2X486			0.006				3.8			0.0002 U	0.17		1.4		0.02 U
	7/19/2011	XX	SWXX2X4D4			0.002 U				8.2			0.0002 U	1.17		2.7		0.03 J
	7/19/2011	XD	SWDP2X4D9			0.002 J				7.5			0.0002 U	1.23		2.6		0.03 J
	10/25/2011	XX	SWXX2X4GJ			0.002 U				5.3			0.0002 U	0.32		1.7		0.02 U
	10/25/2011	XD	SWDP2X4H4			0.002 U				5.4			0.0002 U	0.31		1.8		0.02 U
	4/24/2012	XX	SWXX2X519			0.005 U				6.1			0.0003 U	0.26		2.5		0.05 U
	4/24/2012	XD	SWDP2X51E			0.005 U				6.3			0.0003 U	0.27		2.6		0.05 U
	7/24/2012	XX	SWXX2X568			0.005 U				6.1			0.0007	1.41		2.5		0.09

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Metal (part 1 of 2)

Page 32 of 34

SEVVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(SW-2)	Date	Type	Sample ID	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
	10/23/2012	XX	SWXX2X6CJ			0.005 U			0.0002	3.9			0.0011	0.31		1.6		0.05 U	
	10/23/2012	XD	SWDP2X5D4			0.005 U			0.00017	4			0.001	0.34		1.6		0.05 U	
<b>SW-3</b>																			
	5/26/1994	XX	SWXX3X078						0.005 U	5.9	0.01 U		0.02 U	0.7		1.6		0.06	
	8/8/1994	XX	SWXX3X07G						0.005 U	7	0.01 U		0.02 U	0.8		1.9		0.11	
	11/15/1994	XX	SWXX3X080						0.005 U	5.4	0.01 U		0.02 U	0.28		1.6		0.015	
	2/7/1995	XX	SWXX3X084						0.005 U	6.5	0.01 U		0.02 U	0.43		1.8		0.034	
	5/24/1995	XX	SWXX3X088						0.005 U	6.4	0.01 U		0.02 U	0.77		1.8		0.059	
	8/16/1995	XX	SWXX3X08C						0.005 U	8.5	0.01 U		0.02 U	1.5		2.3		0.16	
	11/30/1995	XX	SWXX3X08G						0.01 U	5	0.015 U		0.025 U	0.28		1.6		0.015	
	2/27/1996	XX	SWXX3X090						0.01 U	3.2	0.015 U		0.025 U	0.33		0.97		0.04	
	5/21/1996	XX	SWXX3X0A0						0.0005 U	4.7	0.002 U		0.01	0.34		1.33		0.004	
	11/25/1996	XX	SWXX3X0AJ											0.54				0.038	
	3/26/1997	XX	SW-3819-35515							F				F				F	
	6/4/1997	XX	SW-3820-35585							6.8				1.13		1.8		0.05	
	9/11/1997	XX	SW-3821-35684							7				0.62		2.4		0.06	
	12/8/1997	XX	SW-3822-35772							5.9				0.45		2.1		0.03	
	3/26/1998	XX	SW-3823-35880											0.37				0.02 U	
	6/9/1998	XX	SW-3824-35955							6.8				0.6		2.4		0.08	
	9/10/1998	XX	SW-3825-36048							7.8				0.76		3.1		0.1	
	12/15/1998	XX	SW-3826-36144							7.9				0.42		2		0.03	
	3/30/1999	XX	SW-3827-36249							2.8				0.21		0.47		0.03	
	6/9/1999	XX	SW-3828-36320							6.6				2.3		1.57		0.3	
	9/15/1999	XX	SW-3828-36418							6.8				0.82		1.75		0.04	
	12/2/1999	XX	SW-3830-36496							5.9				0.56		1.72		0.05	
	3/28/2000	XX	SW-3831-36613											0.64				0.059	
	6/13/2000	XX	SW-3832-36690							7.2				1.7		1.9		0.06	
	9/13/2000	XX	SW-3833-36782							7.2				1.6		2.3		0.11	
	6/19/2001	XX	SW-3834-37061							10				1.6		2.7		0.34	
	9/11/2001	XX	SW-3835-37145							10				1.9		2.8		0.79	
	12/12/2001	XX	SW-3836-37237							7.8				0.46		2.6		0.048	
	3/14/2002	XX	SW-3837-37329											0.36				0.026	
	6/18/2002	XX	SW-3838-37425							7.5				1.3		2.1		0.075	
	9/19/2002	XX	SW-3838-37518							9.7				0.91		3		0.53	
	12/10/2002	XX	SW-3840-37600											0.72				0.06	
	6/26/2003	XX	SW-3N37788											3				1.3	
	9/18/2003	XX	SW-3N37882											1.5				0.48	
	5/3/2004	XX	SWXX3X01A			0.004				5.2				0.53		1.45		0.18	
	5/3/2004	XD	SWDP2X01E			0.002 J				4.7				0.57		1.43		0.19	
	7/27/2004	XX	SWXX3X04G			0.003 J				10				3.5	0.001 J	2.7		0.42	
	10/26/2004	XX	SWXX3X06B			0.001 J				5				1.7		1.89		0.25	
	10/26/2004	XD	SWDP2X06F			0.002 J				5.1				1.68		1.89		0.25	
	5/10/2005	XX	SWXX3X12C			0.003 J			0.0002 U	3.2			0.01 U	0.3		0.97		0.02 J	
	7/28/2005	XD	SWDP2X164			0.001 J			0.0002 U	6.4			0.001 J	1.95		1.9		0.25	
	7/28/2005	XX	SWXX3X160			0.002 J			0.0002 U	6.2			0.001 J	1.97	2	2		0.26	
	9/20/2005	XX	SWXX3X181			0.003 J			0.0002 U	7.8			0.003	1.78		1.8		0.17	
	9/20/2005	XD	SWDP2X192			0.002 J			0.0002 U	8.1			0.002 J	1.82		1.82		0.17	
	5/24/2006	XX	SWXX3X1DD			0.001 U			0.0002 U	5.6			0.001 U	0.54		1.24		0.07	
	7/26/2006	XX	SWXX3X1GA			0.003 J			0.0002 U	5.9			0.002 J	1.36		1.44		0.17	

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Metal (part 1 of 2)

Page 33 of 34  
 SEVVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(SW-3)	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L	
Date	Type	Sample ID														
9/13/2006	XX	SWXX3X1B				0.001 J	5.2			0.001 U	1.53		2		0.12	
5/15/2007	XX	SWXX3X2A				0.002 J	6.3			0.003	0.69		1.65		0.17	
7/24/2007	XX	SWXX3X2E				0.002 J	10			0.001 J	1.75		2.1		0.23	
9/11/2007	XX	SWXX3X2B4				0.001 U	11			0.002 U	1.3		2.3		0.2	
5/21/2008	XX	SWXX3X2C1				0.003 U	7.3			0.003 U	0.99		2.1		0.2	
7/29/2008	XX	SWXX3X2E2				0.002 U	9			0.001 U	1.12		2.4		0.06	
10/28/2008	XX	SWXX3X2C				0.002 U	6.6			0.01 U	0.48		1.9		0.02 J	
4/14/2009	XX	SWXX3X320				0.0005 J	3.8			0.0001 U	0.2		1.2		0.02 U	
7/17/2009	XX	SWXX3X364				0.0002 U	6			0.0001 U	1.14		1.5		0.07	
10/27/2009	XX	SWXX3X3D				0.0002 U	4.1			0.0001 U	0.39		1.2		0.02 J	
4/28/2010	XX	SWXX3X3I				0.0002 U	6.4			0.0001 U	0.6		1.7		0.08	
7/20/2010	XX	SWXX3X422				0.0002 U	11.2			0.0001 J	1.34		2.7		0.28	
10/19/2010	XX	SWXX3X456				0.0002 U	7.8			0.0001 U	0.28		1.9		0.02 U	
4/26/2011	XX	SWXX3X487				0.0002 U	4.7			0.0001 U	0.21		1.3		0.02 J	
7/19/2011	XX	SWXX3X4D5				0.0002 U	10.1			0.0001 U	1.03		2.6		0.21	
10/25/2011	XX	SWXX3X4H0				0.0002 U	6.8			0.0001 U	0.54		1.7		0.03 J	
4/24/2012	XX	SWXX3X51A				0.0006 U	4.3			0.0003 U	1.17		1.2		0.05 U	
7/24/2012	XD	SWDP2X56D				0.0006 U	7.5			0.0003 U	1.17		3		0.42	
7/24/2012	XX	SWXX3X569				0.0006 U	10.1			0.0003 U	1.34		3		0.46	
10/23/2012	XX	SWXX3X5D0				0.0006 U	4.3			0.0003 U	0.36		1.2		0.05 U	
<b>SW-DP1</b>																
5/3/2004	XX	SWDP1X0T1H				0.003 J	34				0.11		5.9		0.06	
7/27/2004	XX	SWDP1X053				0.003 J	40				0.2	0.001 U	7.6		0.03 J	
10/26/2004	XX	SWDP1X08H				0.004	32				0.05 J		6.5		0.02 J	
5/10/2005	XX	SWDP1X12I				0.002 U	13			0.01 U	0.85		2.2		0.06	
7/28/2005	XX	SWDP1X166				0.002 U	15			0.001 J	0.72		2.8		0.09	
9/20/2005	XX	SWDP1X184				0.0005 J	29			0.001 U	1.37		2.9		0.12	
5/24/2006	XX	SWDP1X1D				0.002 J	33			0.001 J	0.37		4		0.19	
7/26/2006	XX	SWDP1X1G				0.0002 J	27			0.003	1.4		4.1		0.88	
9/13/2006	XX	SWDP1X1J9				0.002 U	24			0.001 U	0.64		4.4		0.05	
5/15/2007	XX	SWDP1X2ZG				0.0002 J	28			0.003	0.18		4.4		0.03 J	
7/24/2007	XX	SWDP1X270				0.004 J	18			0.012	0.38		2.5		0.09	
9/11/2007	XX	SWDP1X28A				0.001 U	14			0.001 U	0.1		1.8		0.02 J	
5/21/2008	XX	SWDP1X2D4				0.002 U	17.2			0.003 U	0.26		4.9		0.05	
7/29/2008	XX	SWDP1X2G8				0.002 U	12.1			0.001 J	0.18		1.9		0.02 J	
10/28/2008	XX	SWDP1X2II				0.002 U	20.7			0.01 U	0.49		4		0.04 J	
4/14/2009	XX	SWDP1X326				0.0002 U	26.9			0.0019	0.36		4.7		0.08	
7/17/2009	XX	SWDP1X36A				0.0002 U	15.9			0.0001 U	0.14		2		0.04 J	
10/27/2009	XX	SWDP1X3E5				0.002 U	17.7			0.0022	0.33		1.9		0.02 J	
4/28/2010	XX	SWDP1X3J4				0.0002 U	22.4			0.0001 J	0.1		3.3		0.06	
7/20/2010	XX	SWDP1X428				0.0002 U	12.5			0.0001 J	0.18		1.6		0.05	
10/19/2010	XX	SWDP1X45C				0.0002 U	15.9			0.0001 U	0.15		1.4		0.02 J	
4/26/2011	XX	SWDP1X48D				0.0002 U	15.5			0.0001 U	0.16		2.5		0.03 J	
7/19/2011	XX	SWDP1X4D8				0.0002 U	21.8			0.0001 U	0.06		2.8		0.09	
10/25/2011	XX	SWDP1X4H6				0.0002 U	15.5			0.016	0.25		1.9		0.03 J	
4/24/2012	XX	SWDP1X51G				0.0006 U	13.9			0.0003 U	2.94		2.3		0.13	
7/24/2012	XX	SWDP1X56F				0.0006 U	20.6			0.0003 U	0.17		4.2		0.11	
10/23/2012	XX	SWDP1X5D6				0.0016	10.4			0.0082	1.93		1.4		0.21	

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Metal (part 1 of 2)

Page 34 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(SW-DP6)	Aluminum mg/L	Antimony mg/L	Arsenic mg/L	Barium mg/L	Beryllium mg/L	Cadmium mg/L	Calcium mg/L	Chromium mg/L	Cobalt mg/L	Copper mg/L	Iron mg/L	Lead mg/L	Magnesium mg/L	Manganese mg/L	Mercury mg/L
Date	Type	Sample ID													
10/27/2009	XX	SWDP6X366				0.0002 U	11.3			0.005	3.05		2.2	0.07	
4/28/2010	XX	SWDP6X3J5				0.0002 J	29.8			0.0018	1.52		3.8	0.96	
7/20/2010	XX	SWDP6X429				0.0002 U	31			0.0001 U	1.02		3.5	0.36	
10/19/2010	XX	SWDP6X45D				0.00002 U	24.6			0.0001 U	0.42		2.5	0.08	
4/26/2011	XX	SWDP6X48E				0.0003 J	19.1			0.0001 U	0.28		1.9	0.06	
7/19/2011	XX	SWDP6X4DC				0.00002 U	63.3			0.0001 U	0.12		7.3	0.09	
10/25/2011	XX	SWDP6X4H7				0.0002 U	39.4			0.0022	0.17		4	0.06	
4/24/2012	XX	SWDP6X5H				0.00006 U	14.1			0.0003 U	0.1		1.9	0.05 U	
7/24/2012	XX	SWDP6X56G				0.00006 U	11			0.0003 U	1.32		2.5	0.79	
10/23/2012	XX	SWDP6X5D7				0.00006 U	6.6			0.006	2.63		1.9	0.16	

**Notes:**  
 TYPE - Sample Type Qualifier where D = Duplicate Sample.  
 Blank Cells appear when a parameter was not analyzed.

**Concentration Qualifier Notes:**

- I - The sampling location was damaged or destroyed.
- D - The sampling location was dry.
- DE - Decommissioned Location
- F - The sampling location was frozen.
- F12 - Pipe under water, no sample taken.
- F6 - No flow. Sample not taken.
- H2 - Waterlevel higher than pipes. See LF-COMP for readings
- I - The sampling location yielded insufficient quantity to collect a sample.
- J - Analyte was positively identified/Associated value is an estimate below reporting limit.
- U - Not Detected above the reported sample detection limit.

SUMMARY REPORT  
 Metal (part 2 of 2)

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

(DP-4)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
<b>DP-4</b>												
	1/30/2004	XX	GWDP4X039		4.5			40				
	5/6/2004	XX	GWXXXX00D		3.2			54				
	7/26/2004	XX	GWXXXX041		2.5			50				
	10/26/2004	XX	GWXXXX07H		1.8			74				
	5/9/2005	XX	GWXXXX13I	0.006	1.8			50				
	8/1/2005	XX	GWXXXX176	0.004 J	1.5			35				
	9/20/2005	XX	GWXXXX1A4	0.002 U	1.6			29				
	5/22/2006	XX	GWXXXX1EJ	0.003 J	1.1			7.3				
	7/24/2006	XX	GWXXXX1HG	0.002 U	1			10.4				
	9/11/2006	XX	GWXXXX209	0.002 J	1.4			13.4				
	5/14/2007	XX	GWXXXX23G	0.002 U	2.1			8				
	7/23/2007	XX	GWXXXX280	0.003 J	1.5			7.3				
	9/10/2007	XX	GWXXXX2AA	0.005	1.3			8.8				
	5/19/2008	XX	GWXXXX2E4	0.004 J	1.5			7.9				
	7/29/2008	XX	GWXXXX2H8	0.004 J	1.3			7.4				
	10/27/2008	XX	GWXXXX2J1	0.005	1.3			7.3				
	4/13/2009	XX	GWXXXX338	0.006	1.5			8				
	7/6/2009	XX	GWXXXX37A	0.005	1.4			9.3				
	10/26/2009	XX	GWXXXX3F5	0.007	1.7			9.4				
	4/26/2010	XX	GWXXXX404	0.002 U	1.2			7.9				
	7/19/2010	XX	GWXXXX438	0.002 U	1.3			8.9				
	10/18/2010	XX	GWXXXX46C	0.002 J	1.5			9				
	4/25/2011	XX	GWXXXX4AD	0.002 U	1.1			8.3				
	7/18/2011	XX	GWXXXX4EB	0.002 U	1.1			8.8				
	10/24/2011	XX	GWXXXX4H6	0.002 U	1.3			10.3				
	4/25/2012	XX	GWXXXX52G	0.005 U	1.1			10.2				
	7/25/2012	XX	GWXXXX57F	0.005 U	1.3			10.5				
	10/24/2012	XX	GWXXXX5E8	0.005 U	1.2			11.8				
<b>LF-COMP</b>												
	7/19/2011	XX	LFXXXX4F1	0.002 U	4.3			9				
	4/24/2012	XX	LFXXXX53B	0.005 U	3.4			6.9				
<b>LF-UD-1</b>												
	7/28/2004	XX	LFUD1X05E		2.7			5.9				
	10/27/2004	XX	LFUD1X076		2.1			5.8				
	5/11/2005	XX	LFUD1X137	0.01	1.9			6.8				
	7/27/2005	XX	LFUD1X16F	0.002 U	1.8			6.4				
	9/21/2005	XX	LFUD1X19D	0.002 U	1.8			7.1				
	5/24/2006	XX	LFUD1X1E8	0.002 U	2			7.6				
	7/25/2006	XX	LFUD1X1H5	0.002 U	2.4			8.6				
	9/11/2006	XX	LFUD1X1J1	0.003 J	2			9.1				
	5/16/2007	XX	LFUD1X235	0.002 U	4			9.4				
	7/25/2007	XX	LFUD1X279	0.002 U	2.5			8				
	9/12/2007	XX	LFUD1X29J	1	1			1				
	5/20/2008	XX	LFUD1X2DD	0.003 U	2.3			8.3				
	7/28/2008	XX	LFUD1X2GH	0.002 U	2.2			6.8				
	10/28/2008	XX	LFUD1X2J7	0.002 U	2.4			7.8				
	4/15/2009	XX	LFUD1X32F	0.002 U	2.8			8.2				

**SUMMARY REPORT**  
**Metal (part 2 of 2)**

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

(LF-UD-1)		Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
Date	Type Sample ID									
7/8/2009	XX LFUD1X36J	H2	H2			H2				
10/27/2009	XX LFUD1X3EE	H2	H2			H2				
4/27/2010	XX LFUD1X3UD	0.002 U	3.1			7.6				
7/20/2010	XX LFUD1X42H	F6	F6			F6				
10/19/2010	XX LFUD1X46I	F6	F6			F6				
4/26/2011	XX LFUD1X4A2	0.002 U	3.3			8				
7/19/2011	XX LFUD1X4E0	0.002 U	4.1			9.1				
10/25/2011	XX LFUD1X4HF	0.002 U	3.1			8.4				
4/24/2012	XX LFUD1X525	H2	H2			H2				
7/24/2012	XX LFUD1X574	0.005 U	3.5			8.7				
10/23/2012	XX LFUD1X5DF	F6	F6			F6				
<b>LF-UD-2</b>										
7/28/2004	XX LFUD2X05F		2.5			5.4				
10/27/2004	XX LFUD2X077		2			5.2				
5/11/2005	XX LFUD2X138	0.002 J	2			5.7				
7/27/2005	XX LFUD2X16G	0.002 U	2			6.9				
9/21/2005	XX LFUD2X19E	0.002 U	1.9			6.1				
5/24/2006	XX LFUD2X1E9	0.002 U	2.1			5.7				
7/25/2006	XX LFUD2X1H6	0.002 U	2.4			6				
9/11/2006	XX LFUD2X1JJ	0.002 J	3.2			18.1				
5/16/2007	XX LFUD2X236	0.002 J	3.6			6.4				
7/25/2007	XX LFUD2X27A	0.002 U	2.5			5.9				
9/12/2007	XX LFUD2X2A0	0.002 U	2.3			5.8				
5/20/2008	XX LFUD2X2DE	0.003 U	2.4			5.5				
7/28/2008	XX LFUD2X2G1	0.002 U	2.3			5.4				
10/29/2008	XX LFUD2X2J8	0.002 U	2.3			5.2				
4/15/2009	XX LFUD2X32G	0.002 U	2.9			6.1				
7/8/2009	XX LFUD2X370	H2	H2			H2				
10/27/2009	XX LFUD2X3EF	H2	H2			H2				
4/27/2010	XX LFUD2X3JE	0.002 U	3.3			6.6				
7/20/2010	XX LFUD2X42I	0.002 U	3.3			6.2				
10/19/2010	XX LFUD2X462	0.002 U	5			9.9				
4/26/2011	XX LFUD2X4A3	0.002 U	2.6			5.2				
7/19/2011	XX LFUD2X4E1	0.002 U	2.7			6.1				
10/25/2011	XX LFUD2X4HG	0.002 U	2.6			5.9				
4/24/2012	XX LFUD2X526	H2	H2			H2				
7/24/2012	XX LFUD2X575	0.005 U	3.1			6.7				
10/23/2012	XX LFUD2X5DG	0.005 U	2.7			6.3				
<b>LF-UD-3A,B</b>										
5/16/2007	XX LFUD3X246	0.002 U	3.3			8.9				
7/25/2007	XX LFUD3X288	F6	F6			F6				
9/12/2007	XX LFUD3X2AI	F6	F6			F6				
5/20/2008	XX LFUD3X2EE	0.003 U	2.9			6				
7/28/2008	XX LFUD3X2HG	D	D			D				
10/29/2008	XX LFUD3X306	F6	F6			F6				
4/15/2009	XX LFXXX33F	0.002 U	2			8.4				
7/8/2009	XX LFXXX33I	H2	H2			H2				
10/27/2009	XX LFXXX33C	H2	H2			H2				

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Metal (part 2 of 2)

Page 3 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(LF-UD-3A,B)		Nickel	Potassium	Selenium	Silver	Sodium	Thallium	Vanadium	Zinc	Tin
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
Date Type Sample ID										
4/27/2010	XX	LFXXX40C	1.8			9.5				
7/20/2010	XX	LFXXX43G	F6			F6				
10/19/2010	XX	LFXXX46J	F6			F6				
4/26/2011	XX	LFXXX481	1.8			7.2				
7/19/2011	XX	LFXXX4EJ	H2			H2				
10/25/2011	XX	LFXXX4IC	F6			F6				
4/24/2012	XX	LFXXX53A	H2			H2				
7/24/2012	XX	LFXXX581	F6			F6				
10/23/2012	XX	LFXXX5EC	F6			F6				
<b>LF-UD-4</b>										
4/15/2009	XX	LFXXX34A	4.9			10.2				
7/8/2009	XX	LFXXX380	H2			H2				
10/27/2009	XX	LFXXX3FE	H2			H2				
4/27/2010	XX	LFXXX40E	F6			F6				
7/20/2010	XX	LFXXX43I	F6			F6				
10/19/2010	XX	LFXXX471	F6			F6				
4/26/2011	XX	LFXXX4B3	F12			F12				
7/19/2011	XX	LFXXX4HG2	H2			H2				
10/25/2011	XX	LFXXX4GA	F6			F6				
4/24/2012	XX	LFXXX536	H2			H2				
7/24/2012	XX	LFXXX562	5.8			10.6				
10/23/2012	XX	LFXXX5CA	3.8			8.4				
<b>LF-UD-5</b>										
4/27/2010	XX	LFXXX40F	3.9			6				
<b>LF-UD-5and6</b>										
7/20/2010	XX	LFXXX43J	4.9			7.1				
10/19/2010	XX	LFXXX472	4.8			8.1				
4/26/2011	XX	LFXXX4B4	5.7			8.8				
7/19/2011	XX	LFXXX4F2	5.5			10.2				
10/25/2011	XX	LFXXX4G7	7			10				
4/24/2012	XX	LFXXX537	5.3			9.8				
7/24/2012	XX	LFXXX584	5.5			9.8				
10/23/2012	XX	LFXXX5C7	4.8			8.7				
<b>LF-UD-6</b>										
4/26/2011	XX	LFUD64B6	5			11.3				
7/19/2011	XX	LFUD64F4	5.9			9.6				
10/25/2011	XX	LFUD64G9	5.1			8.7				
4/24/2012	XX	LFUD64S9	4.7			7.9				
7/24/2012	XX	LFUD64S96	5.3			26.5				
10/23/2012	XX	LFUD64S99	5.1			64.1				
<b>LF-UD-7</b>										
4/24/2012	XX	LFUD74S3A	H2			H2				
7/24/2012	XX	LFXXX587	F6			F6				
10/23/2012	XX	LFXXX5EF	F6			F6				
<b>LP-COMP</b>										
10/27/2004	XX	LF-COMP4D2	33			62				

**SUMMARY REPORT**  
**Meta (part 2 of 2)**

(LP-LD-1)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
7/28/2004	XX	LPD1X05E1			32			51				
10/27/2004	XX	LPD1X07A			22			37				
5/11/2005	XX	LPD1X13B			4.2			2.8				
7/27/2005	XX	LPD1X16J	0.002 U		6.5			9.7				
9/21/2005	XX	LPD1X19H	0.005		58			68				
5/24/2006	XX	LPD1X1EC	0.002 J		8.7			12				
7/25/2006	XX	LPD1X1H9	0.002 U		8.3			26				
9/11/2006	XX	LPD1X202	0.006		11.5			45				
5/16/2007	XX	LPD1X239	0.002 J		4.5			22				
7/25/2007	XX	LPD1X27D	0.002 U		18			35				
9/12/2007	XX	LPD1X2A3	0.005		18			42				
5/20/2008	XX	LPD1X2DH	0.003 U		9.3			2.7				
7/28/2008	XX	LPD1X2H1	0.002 U		17.3			5.3				
10/29/2008	XX	LPD1X2JB	0.002 U		24.9			7.4				
4/15/2009	XX	LPD1X32J	0.002 U		6.2			21.3				
7/8/2009	XX	LPD1X373	0.002 U		2.1			8.1				
10/27/2009	XX	LPD1X3EI	0.002 J		7.1			7.7				

(LP-UD-1)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
7/28/2004	XX	LPUD1X05G			D			D				
10/27/2004	XX	LPUD1X078			H2			H2				
5/11/2005	XX	LPUD1X139			D			D				
7/27/2005	XX	LPUD1X18H	D		D			D				
9/21/2005	XX	LPUD1X19F	D		D			D				
5/24/2006	XX	LPUD1X1EA	D		D			D				
7/26/2006	XX	LPUD1X1H7	F6		F6			F6				
9/11/2006	XX	LPUD1X200	D		D			D				
5/16/2007	XX	LPUD1X237	F6		F6			F6				
7/25/2007	XX	LPUD1X278	F6		F6			F6				
9/12/2007	XX	LPUD1X2A1	F6		F6			F6				
5/20/2008	XX	LPUD1X2DF	F6		F6			F6				
7/28/2008	XX	LPUD1X2GJ	D		D			D				
10/29/2008	XX	LPUD1X2J9	F6		F6			F6				
4/15/2009	XX	LPUD1X32H	F6		F6			F6				
7/8/2009	XX	LPUD1X371	F6		F6			F6				
10/27/2009	XX	LPUD1X3EG	F6		F6			F6				
4/27/2010	XX	LPUD1X3JF	F6		F6			F6				
7/20/2010	XX	LPUD1X42J	F6		F6			F6				
10/19/2010	XX	LPUD1X463	F6		F6			F6				
4/26/2011	XX	LPUD1X4A4	F6		F6			F6				
7/19/2011	XX	LPUD1X4E2	F6		F6			F6				
10/25/2011	XX	LPUD1X4HH	F6		F6			F6				
4/24/2012	XX	LPUD1X527	F6		F6			F6				
7/24/2012	XX	LPUD1X576	F6		F6			F6				
10/23/2012	XX	LPUD1X5DH	F6		F6			F6				

(LP-UD-2)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
7/28/2004	XX	LPUD2X05H			8			24				
10/27/2004	XX	LPUD2X079			25			58				

SUMMARY REPORT  
 Metal (part 2 of 2)

(LP-UD-2)		Nickel	Potassium	Selenium	Silver	Sodium	Thallium	Vanadium	Zinc	Tin
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
Date Type Sample ID										
5/11/2005	XX	0.007	8.4			23				
7/27/2005	XX	0.002 U	3.7			21				
9/21/2005	XX	0.002 U	5.3			25				
5/24/2006	XX	0.002 U	4.2			17				
7/25/2006	XX	0.002 J	4			17.6				
9/11/2006	XX	0.002 J	2.3			7				
5/16/2007	XX	0.002 J	4.3			15.9				
7/25/2007	XX	0.002 U	4.2			14.5				
9/12/2007	XX	0.002 U	2.9			12.6				
5/20/2008	XX	0.003 U	3			12.1				
7/28/2008	XX	0.002 U	3.1			10.6				
10/29/2008	XX	0.002 U	3.2			9.9				
4/15/2009	XX	0.002 U	2.7			9.2				
7/8/2009	XX	0.002 J	3.1			10.4				
10/27/2009	XX	0.003 J	2.8			7.6				
4/27/2010	XX	0.002 U	2.3			8.5				
7/20/2010	XX	0.002 U	2.5			8.9				
10/19/2010	XX	0.002 U	2.3			8.7				
4/26/2011	XX	0.002 U	2.4			8.5				
7/19/2011	XX	0.004 J	2.7			9.3				
10/25/2011	XX	0.002 U	2.8			9.6				
4/24/2012	XX	0.005 U	2.9			8.5				
7/24/2012	XX	0.005 U	3.2			9.7				
10/23/2012	XX	0.005 U	2.4			9				

LT-C4L

4/15/2009	XX	0.153	1619	0.01 U	0.055	2212	0.005 U	0.02 U	0.604	0.12
7/7/2009	XX	0.119	1801			2454				
10/28/2009	XX	0.091	1775			2612				
4/28/2010	XX	0.106	1982	0.021	0.0003 J	2448	0.012	0.025	0.053	0.014 J
7/20/2010	XX	0.101	1659			2130				
10/19/2010	XX	0.078	1779			2265				
4/27/2011	XX	0.061	1135	0.016	0.0007 J	1520	0.001 U	0.017	0.011	0.005 U
7/19/2011	XX	0.079	1806			2590				
10/26/2011	XX	0.03	1066			1580				
4/24/2012	XX	0.045	714	0.025	0.005 U	1024	0.02 U	0.05 U	0.155	0.075 U
7/24/2012	XX	0.122	1719			2337				
10/23/2012	XX	0.084	1100			1842				

MW04-102

1/18/2005	XX	0.003 J	1.2	0.002 U	0.02 U	9.8	0.002 U	0.004 U	0.01 U	2 U
3/27/2005	XX	0.002 U	1.5	0.004 J	0.02 U	11	0.002 U	0.004 U	0.01 U	2 U
7/25/2005	XX	0.002 U	2.5	0.002 U	0.02 U	9	0.002 U	0.004 U	0.01 U	2 U
9/20/2005	XX	0.006	1.8	0.002 U	0.02 U	9.2	0.002 U	0.004 U	0.01 U	2 U
5/23/2006	XX	0.002 U	2.3			8.7				
7/25/2006	XX	0.012	2.5			8.9				
9/12/2006	XX	0.002 U	3.2			10.1				
5/15/2007	XX	0.003 J	2.6			8.7				
7/24/2007	XX	0.002 J	2.4			8.1				
9/11/2007	XX	0.002 U	1.9			8.2				

SUMMARY REPORT  
Metal (part 2 of 2)

(MW04-102)

Date Type Sample ID

Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
5/20/2008	XX	GW102X2E8	0.003 U	1.8			7.5				
7/29/2008	XX	GW102X2HC	0.002 U	1.7			6.8				
10/27/2008	XX	GW102X302	0.002 U	1.6			6.4				
4/14/2009	XX	GW102X339	0.002 U	1.7			7.3				
7/17/2009	XX	GW102X37D	0.002 U	1.7			7.2				
10/27/2009	XX	GW102X3F8	0.002 U	1.7			6.8				
4/27/2010	XX	GW102X407	0.002 U	1.6			6.9				
7/21/2010	XX	GW102X43B	0.002 U	1.7			6.6				
10/19/2010	XX	GW102X46F	0.002 U	1.8			7.3				
4/25/2011	XX	GW102X4AG	0.002 U	1.7			6.9				
7/19/2011	XX	GW102X4EE	0.002 U	1.7			7.1				
10/25/2011	XX	GW102X4I9	0.003 J	2			7.6				
4/24/2012	XX	GW102X52J	0.005 U	1.7			6.9				
7/24/2012	XX	GW102X57I	0.005 U	1.9			7.9				
10/22/2012	XX	GW102X5E9	0.005 U	2			8.9				

MW04-105

1/17/2005	XX	GW105X10F	0.002 J	2	0.002 U	0.02 U	19	0.002 J	0.004 U	0.01 J	2 U
3/21/2005	XX	GW105X147	0.002 U	1.9	0.002 U	0.02 U	16	0.002 U	0.004 U	0.01 J	2 U
7/25/2005	XX	GW105X181	0.002 U	1.9	0.002 U	0.02 U	15	0.002 U	0.004 U	0.01 J	2 U
9/20/2005	XX	GW105X1AC	0.002 U	1.6	0.003 J	0.02 U	18	0.002 U	0.004 U	0.01 U	2 U
5/23/2006	XX	GW105X1F7	0.003 J	2			12				
7/25/2006	XD	GWDP3X1GI	0.004 J	2			18.9				
7/25/2006	XX	GW105X1I1	0.004 J	2.2			18				
9/12/2006	XX	GW105X20E	0.002 J	2.8			26				
5/14/2007	XX	GW105X241	0.002 U	1.9			19				
5/14/2007	XD	GWDP3X22I	0.002 U	2.3			19.5				
7/24/2007	XD	GWDP3X272	0.002 J	1.9			29				
7/24/2007	XX	GW105X285	0.003 J	1.9			31				
9/10/2007	XX	GW105X2AF	0.002 U	1.7			32				
5/19/2008	XD	GWDP3X2D6	0.003 U	2.1			24.3				
5/19/2008	XX	GW105X2E9	0.003 U	2.2			25.3				
7/29/2008	XD	GWDP3X2SA	0.002 U	1.7			24.1				
7/29/2008	XX	GW105X2HD	0.002 U	1.7			25.2				
10/27/2008	XD	GWDP1X305	0.002 U	1.6			23.2				
10/27/2008	XX	GW105X303	0.002 U	2			20.9				
4/15/2009	XX	GW105X33A	0.002 U	1.6			15.3				
4/15/2009	XD	GWDP3X328	0.002 U	1.6			13.7				
7/17/2009	XX	GW105X37E	0.002 J	1.4			22.6				
7/17/2009	XD	GWDP1X361	0.002 J	1.7			20.3				
10/26/2009	XX	GW105X3F9	0.004 J	1.6			20.8				
10/26/2009	XD	GWDP1X3DG	0.003 J	1.3			19.6				
4/27/2010	XX	GW105X408	0.002 U	1.3			16.7				
4/27/2010	XD	GWDP3X3J6	0.002 U	1.3			16.4				
7/19/2010	XX	GW105X43C	0.002 U	1.3			17.3				
10/18/2010	XD	GWDP3X46E	0.002 U	1.7			18.9				
10/18/2010	XX	GW105X46G	0.002 U	1.4			17.7				
4/26/2011	XD	GWDP3X49F	0.002 J	1.5			13.3				
4/26/2011	XX	GW105X44H	0.002 J	1.4			13.4				
7/18/2011	XX	GW105X4EF	0.002 U	1.3			14.9				

SUMMARY REPORT  
 Metal (part 2 of 2)

(MW04-105)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
	10/25/2011	XX	GW105X41A	0.002 U	1.3			11				
	10/25/2011	XD	GWDP1X4GH	0.002 U	1.5			13				
	4/23/2012	XD	GWDP3X511	0.005 U	1.5			12				
	4/23/2012	XX	GW105X590	0.005 U	1.5			12.1				
	7/24/2012	XX	GW105X57J	0.005 U	1.4			12.4				
	10/22/2012	XX	GW105X5EA	0.005 U	1.3			8.7				
	10/22/2012	XD	GWDP1X5CH	0.005 U	1.3			8.4				
<b>MW04-109</b>												
	1/19/2005	XX	GW109X10I	0.002 U	2.3	0.002 J	0.02 U	70	0.002 U	0.004 U	0.01 J	2 U
	1/19/2005	XD	GWDP1X1H0	0.002 U	2.2	0.002 J	0.02 U	72	0.002 U	0.004 U	0.01 J	2 U
	3/23/2005	XX	GW109X14A	0.002 U	2.1	0.002 J	0.02 U	55	0.002 U	0.004 U	0.01 U	2 U
	7/26/2005	XX	GW109X184	0.002 U	2.4	0.002 U	0.02 U	45	0.002 U	0.004 U	0.01 J	2 U
	7/26/2005	XD	GWDP5X186	0.002 U	2.4	0.002 U	0.02 U	44	0.002 U	0.004 U	0.01 U	2 U
	9/20/2005	XX	GW109X1AF	0.002 U	2.1	0.003 J	0.02 U	40	0.002 U	0.004 U	0.01 U	2 U
	9/20/2005	XD	GWDP5X1AH	0.002 J	1.9	0.002 J	0.02 U	43	0.002 U	0.004 U	0.01 U	2 U
	5/23/2006	XX	GW109X1FA	0.002 U	2			22				
	5/23/2006	XD	GWDP3X1E1	0.002 J	2.1			23				
	7/25/2006	XX	GW109X1I2	0.002 J	2			19.2				
	9/12/2006	XD	GWDP1X1J0	0.004 J	4.9			21				
	9/12/2006	XX	GW109X20F	0.004 J	5.4			19.5				
	5/15/2007	XX	GW109X242	0.004 J	2.1			13.5				
	7/24/2007	XX	GW109X286	0.002 J	2			12.6				
	9/10/2007	XD	GWDP5X2AH	0.002 U	1.7			12.1				
	9/10/2007	XX	GW109X2AG	0.002 U	1.7			12				
	5/19/2008	XX	GW109X2EA	0.003 U	2.7			15.4				
	7/29/2008	XX	GW109X2HE	0.002 J	3.1			21.6				
	10/28/2008	XX	GW109X304	0.002 U	3			22.9				
	4/15/2009	XX	GW109X35B	0.002 J	2.5			19.7				
	7/7/2009	XX	GW109X37F	DE	DE			DE				
<b>MW04-109R</b>												
	12/8/2009	XX	GW109X3GF	0.002 U	2.5			9				
	4/27/2010	XX	GW109X409	0.002 U	1.9			9.1				
	7/20/2010	XX	GW109X43D	0.002 U	2.1			9.5				
	10/19/2010	XX	GW109X46H	0.002 U	2.2			10.3				
	4/26/2011	XX	GW109X4AI	0.002 U	2.2			9.1				
	7/19/2011	XX	GW109X4EG	0.002 U	2.1			8.3				
	10/25/2011	XX	GW109X4HB	0.002 U	2.2			9.6				
	4/24/2012	XX	GW109X531	0.005 U	2.2			10.6				
	7/24/2012	XX	GW109X580	0.005 U	2.2			10				
	10/23/2012	XX	GW109X5EB	0.005 U	2			9.8				
<b>MW09-901</b>												
	12/8/2009	XX	GW901X3GH	0.002 J	2.6			11.9				
	4/27/2010	XX	GW901X3J7	0.002 U	2.5			8.2				
	7/20/2010	XX	GW901X42B	0.002 U	2.3			7.7				
	10/19/2010	XX	GW901X45F	0.002 U	2.5			17.4				
	4/26/2011	XX	GW901X49G	0.002 U	2.1			6				
	7/19/2011	XX	GW901X4DE	0.002 U	1.8			5.9				
	10/25/2011	XX	GW901X4H8	0.003 J	2			6.2				

SUMMARY REPORT  
 Metal (part 2 of 2)

(MW09-901)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
	4/24/2012	XX	GW901X51J	0.005 U	1.6			5.2				
	7/24/2012	XX	GW901X56I	0.005 U	1.8			5.5				
	10/23/2012	XX	GW901X5D9	0.005 U	1.8			6.4				
<b>MW11-207R</b>												
	7/20/2011	XX	GW207X4CH	0.002 U	0.5			3.6				
	10/24/2011	XX	GW207X4GC	0.002 U	0.5			3.6				
	4/23/2012	XX	GW207X512	0.005 U	0.5			3.7				
	7/23/2012	XX	GW207X561	0.005 U	0.4			3.3				
	10/22/2012	XX	GW207X5CC	0.005 U	0.5			3.9				
<b>MW-204</b>												
	11/13/1990	XX	MW-20433190					6			0.02 U	
	2/20/1991	XX	MW-20433289	F	F	F	F	F	F	F	F	
	6/3/1991	XX	MW-20433392					5.2			0.02 U	
	9/16/1991	XX	MW-20433497					5.3			0.02 U	
	12/17/1991	XX	GW204X001					4.7			0.02 U	
	3/2/1992	XX	GW204X001	F	F	F	F	F	F	F	F	
	6/23/1992	XX	GW204X01E					5			0.02 U	
	8/17/1992	XX	GW204X02C					4			0.02 U	
	1/26/1993	XX	GW204X038					4			0.02 U	
	4/27/1993	XX	GW204X04C					5			0.02	
	7/21/1993	XX	GW204X054					4			0.02 U	
	10/12/1993	XX	GW204X051					5			0.02 U	
	1/11/1994	XX	GW204X06E					4.2			0.02 U	
	5/21/1996	XX	GW204X093					4.5			0.02 U	
	11/25/1996	XX	GW204X0A2					4.1			0.02 U	
	3/25/1997	XX	MW-204808-35514					5				
	6/3/1997	XX	MW-204809-35584					5.2				
	9/9/1997	XX	MW-204810-35682					4.8				
	12/3/1997	XX	MW-204811-35787					4.8				
	3/23/1998	XX	MW-204812-35877					4.8				
	6/8/1998	XX	MW-204813-35954					4.9				
	9/9/1998	XX	MW-204814-36047					5.4				
	12/14/1998	XX	MW-204815-36143					5.6				
	3/29/1999	XX	MW-204816-36248					4.5				
	6/8/1999	XX	MW-204817-36319					5.4				
	9/13/1999	XX	MW-204818-36416					5.5				
	12/11/1999	XX	MW-204819-36495					5.3				
	3/27/2000	XX	MW-204820-36612					5.3				
	6/12/2000	XX	MW-204821-36689					5.5				
	9/12/2000	XX	MW-204822-36781					5.9				
	12/11/2000	XX	MW-204823-36871					5.2				
	3/12/2001	XX	MW-204824-36962					4.6				
	6/18/2001	XX	MW-204825-37060					4.9				
	9/10/2001	XX	MW-204826-37144					5				
	12/11/2001	XX	MW-204827-37236					5.6				
	3/13/2002	XX	MW-204828-37328					6.1				
	6/17/2002	XX	MW-204829-37424					6.9				
	9/18/2002	XX	MW-204830-37517					5.9				

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Metal (part 2 of 2)**

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-204)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
	12/9/2002	XX	MW-204831-37599					6.1				
	3/25/2003	XX	MW-204N37705					5.3				
	6/25/2003	XX	MW-204N37797					5.2				
	9/17/2003	XX	MW-204N37881					4.5				
	1/29/2004	XX	GW204X03A		1.6			8.1				
	5/4/2004	XX	GW204X008	0.002 J	1.1	0.002 U	0.02 U	6.2	0.002 U	0.004 U	0.01 U	2 U
	7/27/2004	XX	GW204X03G	0.002 U	1.7	0.002 J	0.02 U	6	0.002 U	0.004 U	0.01 U	2 U
	10/25/2004	XX	GW204X07D		1.3			6.1				
	5/9/2005	XX	GW204X13E	0.003 J	1.1			6.8				
	8/1/2005	XX	GW204X172	0.002 U	1.2			7.3				
	9/20/2005	XX	GW204X1A0	0.002 U	1.3			8.2				
	5/23/2006	XX	GW204X1EF	0.002 U	1.2			7				
	7/24/2006	XX	GW204X1HC	0.002 U	1.2			7.4				
	9/11/2006	XX	GW204X205	0.002 U	1.1			8.6				
	5/14/2007	XX	GW204X23C	0.002 U	3.3			8.9				
	7/23/2007	XX	GW204X27G	0.003 J	1.3			8.7				
	9/10/2007	XX	GW204X2A6	0.004 J	1.2			10.6				
	5/21/2008	XX	GW204X2E0	0.003 U	1.1			8.4				
	7/30/2008	XX	GW204X2H4	0.002 U	1			7.8				
	10/28/2008	XX	GW204X2JE	0.002 U	1.1			8.7				
	4/13/2009	XX	GW204X332	0.002 U	1.1			7.6				
	7/6/2009	XX	GW204X376	0.002 J	0.9			7.2				
	10/26/2009	XX	GW204X3F1	0.002 U	1.1			8.1				
	4/28/2010	XX	GW204X400	0.002 U	0.9			6.3				
	7/19/2010	XX	GW204X434	0.002 U	0.9			7				
	10/19/2010	XX	GW204X468	0.002 U	1			7.5				
	4/26/2011	XX	GW204X4A9	0.002 J	1			6.7				
	7/19/2011	XX	GW204X4E7	0.002 U	0.9			7				
	10/26/2011	XX	GW204X4I2	0.002 U	1			6.7				
	4/24/2012	XX	GW204X52C	0.005 U	0.9			6.2				
	7/23/2012	XX	GW204X57B	0.005 U	0.9			7				
	10/24/2012	XX	GW204X5E2	0.005 U	1			7.8				

**MW-207**

	11/13/1990	XX	MW-20733190					51			0.02 U	
	2/19/1991	XX	MW-20733288					29			0.02 U	
	6/4/1991	XX	MW-20733393					15			0.02 U	
	9/17/1991	XX	MW-20733498					14			0.02 U	
	12/18/1991	XX	GW207X002					19			0.02 U	
	3/2/1992	XX	GW207X00J	F	F	F	F	F	F	F	F	
	6/23/1992	XX	GW207X01F					18			0.02 U	
	6/23/1992	XD	GW207X028					19			0.02 U	
	8/17/1992	XX	GW207X02D					15			0.02 U	
	1/26/1993	XX	GW207X039					11			0.02	
	4/27/1993	XX	GW207X04D					11			0.03	
	7/22/1993	XX	GW207X055					12			0.02 U	
	10/13/1993	XX	GW207X060					12			0.02 U	
	1/11/1994	XX	GW207X06G					12			0.02 U	
	5/21/1996	XX	GW207X065					6.3			0.02 U	
	5/21/1996	XD	GWDF1X09A					6.1			0.02 U	

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Metal (part 2 of 2)**

Page 10 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-207)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
XX	11/26/1996	XX	GW207X0A4					5.8				
XX	3/24/1997	XX	MW-207825-35513					4.9				
XX	6/2/1997	XX	MW-207826-35683					6.5				
XX	9/8/1997	XX	MW-207827-35681					4.5				
XX	12/3/1997	XX	MW-207828-35767					4				
XX	3/23/1998	XX	MW-207829-35877					3.4				
XX	6/8/1998	XX	MW-207830-35954					3.4				
XX	9/8/1998	XX	MW-207831-36046					3.4				
XX	12/14/1998	XX	MW-207832-36143					3.2				
XX	3/29/1999	XX	MW-207833-36248					2.9				
XX	6/8/1999	XX	MW-207834-36319					4				
XX	9/13/1999	XX	MW-207835-36416					3.2				
XX	12/1/1999	XX	MW-207836-36495					2.4				
XX	3/27/2000	XX	MW-207837-36612					2.8				
XX	6/12/2000	XX	MW-207838-36689					2.7				
XX	9/12/2000	XX	MW-207839-36781					2.1				
XX	12/11/2000	XX	MW-207840-36871					2				
XX	3/13/2001	XX	MW-207841-36963					2.2				
XX	6/18/2001	XX	MW-207842-37080					1.9				
XX	9/10/2001	XX	MW-207843-37144					2.3				
XX	12/11/2001	XX	MW-207844-37236					2.2				
XX	3/13/2002	XX	MW-207845-37328					2.1				
XX	6/17/2002	XX	MW-207846-37424					2.3				
XX	9/18/2002	XX	MW-207847-37517					2.3				
XX	12/9/2002	XX	MW-207848-37599					1.8				
XX	3/26/2003	XX	MW-207849-37706					24				
XX	6/25/2003	XX	MW-207850-37881					2.5				
XX	9/17/2003	XX	MW-207851-37881					1.6				
XX	5/5/2004	XX	GW207X011		0.9			8.3				
XX	7/28/2004	XX	GW207X048		1.2			3.1				
XX	10/25/2004	XX	GW207X063		1			2.9				
XX	5/12/2005	XX	GW207X124	0.002 J	3.1			4.5				
XX	8/1/2005	XX	GW207X15C	0.003 J	0.9			3.9				
XX	9/19/2005	XD	GWDF1X18F	0.002 U	0.5			4				
XX	9/19/2005	XX	GW207X18A	0.002 U	0.5			3.8				
XX	5/22/2006	XX	GW207X1D5	0.003 J	1			3.8				
XX	7/25/2006	XX	GW207X1G2	0.005	1.2			3.5				
XX	9/11/2006	XX	GW207X1IF	0.003 J	0.9			4.3				
XX	5/14/2007	XX	GW207X222	0.002 U	1.2			4.7				
XX	7/25/2007	XX	GW207X266	0.002 U	1.3			4				
XX	9/10/2007	XX	GW207X28G	0.004 J	3.9			4.7				
XX	5/19/2008	XX	GW207X2CA	0.003 U	1.2			3.2				
XX	7/29/2008	XX	GW207X2FE	0.002 J	1.3			3.2				
XX	10/28/2008	XX	GW207X2H4	0.002 J	1.3			2.9				
XX	4/13/2009	XX	GW207X31C	0.002 J	6.1			3.7				
XX	7/6/2009	XX	GW207X35G	0.002 J	5.8			4.4				
XX	10/26/2009	XX	GW207X3DB	0.013	4.5			5.8				
XX	4/26/2010	XX	GW207X3JA	0.003 J	2.4			5.5				
XX	7/19/2010	XX	GW207X41E	0.002 U	0.9			4.9				
XX	10/18/2010	XX	GW207X44I	0.002 U	3.7			6.4				

SUMMARY REPORT  
 Metal (part 2 of 2)

(MW-207)	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
4/25/2011 XX GW207X48J	0.005	3			5.6				
<b>MW-206</b>									
4/27/1993 XX GW206X04I					6			0.03	
4/27/1993 XD GW206X04E					6			0.02 U	
7/21/1993 XX GW206X05A					7			0.02 U	
10/13/1993 XX GW206X05J					7			0.02 U	
1/11/1994 XX GW206X06F					7			0.02 U	
5/21/1996 XX GW206X094					5			0.02 U	
11/26/1996 XX GW206X0A3					5				
3/25/1997 XX MW-206824-35514					4.5				
6/2/1997 XX MW-206825-35583					6.1				
9/8/1997 XX MW-206826-35681					5.4				
12/3/1997 XX MW-206827-35767					5.3				
3/23/1998 XX MW-206828-35877					5.3				
6/8/1998 XX MW-206829-35954					5				
9/8/1998 XX MW-206830-36048					5.8				
12/14/1998 XX MW-206831-36143					5.7				
3/29/1999 XX MW-206832-36248					4.4				
6/8/1999 XX MW-206833-36319					5.9				
9/15/1999 XX MW-206834-36418					6				
12/1/1999 XX MW-206835-36495					6				
3/27/2000 XX MW-206836-36612					5.9				
6/12/2000 XX MW-206837-36699					5.9				
9/13/2000 XX MW-206838-36782					6.3				
12/11/2000 XX MW-206839-36871					5.6				
3/13/2001 XX MW-206840-36963					5.1				
6/18/2001 XX MW-206841-37060					5				
9/10/2001 XX MW-206842-37144					4.9				
12/12/2001 XX MW-206843-37237					4.6				
3/13/2002 XX MW-206844-37328					5.5				
6/17/2002 XX MW-206845-37424					6				
9/18/2002 XX MW-206846-37517					4.7				
12/9/2002 XX MW-206847-37599					4.5				
3/26/2003 XX MW-206837708					25				
6/25/2003 XX MW-206837797					5.7				
9/17/2003 XX MW-206837881					3.7				
5/6/2004 XX GW206X010		1			5.7				
7/28/2004 XX GW206X047		1.8			5.6				
10/26/2004 XX GW206X062		1			5.1				
5/11/2005 XX GW206X123		0.8			7				
7/28/2005 XX GW206X158		0.8			6.4				
9/19/2005 XX GW206X189		0.6			4.5				
5/24/2006 XX GW206X1D4		0.8			5.9				
7/25/2006 XX GW206X1G1		0.9			5.6				
9/12/2006 XX GW206X1E		0.8			8				
5/14/2007 XX GW206X221		0.3			7.2				
7/25/2007 XX GW206X265		0.8			5.8				
9/11/2007 XX GW206X28F		1			5.2				
5/20/2008 XX GW206X2C9		0.7			4.9				

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Metal (part 2 of 2)**

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-206)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
XX	7/29/2008	XX	GW206X2FD	0.002 U	0.8			4.9				
XX	10/27/2008	XX	GW206X2I3	0.002 U	0.6			4.4				
XX	4/13/2009	XX	GW206X31B	0.002 U	0.8			5.1				
XX	7/16/2009	XX	GW206X35F	0.002 U	0.7			5.1				
XX	10/28/2009	XX	GW206X3DA	0.002 U	0.7			4.8				
XX	4/26/2010	XX	GW206X3I9	0.002 U	0.8			4.8				
XX	7/19/2010	XX	GW206X41D	0.002 U	2.5			4.9				
XX	10/18/2010	XX	GW206X44H	0.002 U	1.5			6.5				
XX	4/25/2011	XX	GW206X48I	0.002 U	0.9			5				
XX	7/18/2011	XX	GW206X4CG	0.003 J	0.9			5.2				
XX	10/24/2011	XX	GW206X4GB	0.002 U	0.8			5				
XX	4/23/2012	XX	GW206X51I	0.005 U	0.9			5.5				
XD	7/23/2012	XD	GWDP4X573	0.005 U	0.8			4.7				
XX	7/23/2012	XX	GW206X560	0.005 U	0.8			4.6				
XX	10/22/2012	XX	GW206X5CB	0.005 U	0.8			5.3				

**MW-212**

XX	11/13/1990	XX	MW-21233190	I	I	I	I	I	I	I	I	
XX	2/19/1991	XX	MW-21233288					6.1			0.02 U	
XX	6/3/1991	XX	MW-21233392					4.9			0.02 U	
XX	9/16/1991	XX	MW-21233497					I			I	
XX	12/17/1991	XX	GW212X004					3.6			0.02 U	
XX	3/2/1992	XX	GW212X011	I	I	I	I	I	I	I	I	
XX	6/23/1992	XX	GW212X01H	D	D	D	D	D	D	D	D	
XX	1/26/1993	XX	GW212X03B					D			D	
XX	4/27/1993	XX	GW212X04G					22			0.02 U	
XX	7/21/1993	XX	GW212X058					D			D	
XX	10/12/1993	XX	GW212X062					D			D	
XX	1/11/1994	XX	GW212X06I					5			0.02 U	
XX	5/21/1996	XX	GW212X097					4.5			0.02 U	
XX	11/26/1996	XX	GW212X0A5					D				
XX	3/24/1997	XX	MW-212826-35513					F				
XX	6/2/1997	XX	MW-212827-35583					4.6				
XX	3/23/1998	XX	MW-212830-35877					9.2				
XX	6/8/1998	XX	MW-212831-35954					3.3				
XX	3/29/1999	XX	MW-212834-36248					4.9				
XX	6/8/1999	XX	MW-212835-36319					3.7				
XX	12/1/1999	XX	MW-212837-36485					3.3				
XX	3/27/2000	XX	MW-212838-36612					8				
XX	6/12/2000	XX	MW-212839-36689					3.2				
XX	3/13/2002	XX	MW-212840-37328					4				
XX	6/17/2002	XX	MW-212841-37424					2.8				
XX	3/26/2003	XX	MW-212N37706					45				
XX	6/25/2003	XX	MW-212N37797					2.6				
XX	5/5/2004	XX	GW212X00B	0.002 J	0.5	0.002 U	0.02 U	3.6	0.002 U	0.004 U	0.01 J	2 U
XX	7/27/2004	XX	GW212X03J	D	D	D	D	D	D	D	D	D
XX	10/27/2004	XX	GW212X07F					D				
XX	5/12/2005	XX	GW212X13G	0.002 U	1.4			22				
XX	8/1/2005	XX	GW212X174	0.002 U	0.4			3.4				
XX	9/20/2005	XX	GW212X1A2	I	I			I				

SUMMARY REPORT  
 Metal (part 2 of 2)

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-212)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
5/22/2006	XX		GW212X1EH	0.002 U	0.6			4.9				
7/25/2006	XX		GW212X1HE	0.002 U	0.7			3.4				
9/11/2006	XX		GW212X207	I	I			I				
5/14/2007	XX		GW212X33E	0.002 U	0.2 J			5.5				
7/24/2007	XX		GW212X271	D	D			D				
9/10/2007	XX		GW212X2A8	D	D			D				
5/19/2008	XX		GW212X2E2	0.003 U	0.5			5.5				
7/29/2008	XX		GW212X2H6	D	D			D				
10/28/2008	XX		GW212X2JG	D	D			D				
4/13/2009	XX		GW212X334	0.002 U	0.9			24.9				
7/6/2009	XX		GW212X378	0.002 J	0.9			8.9				
10/26/2009	XX		GW212X3F3	D	D			D				
4/26/2010	XX		GW212X402	0.002 U	1			17.4				
7/19/2010	XX		GW212X436	D	D			D				
10/16/2010	XX		GW212X46A	D	D			D				
4/25/2011	XX		GW212X4AB	0.002 U	0.8			33.3				
7/16/2011	XX		GW212X4E9	D	D			D				
10/24/2011	XX		GW212X4I4	D	D			D				
4/23/2012	XX		GW212X52E	D	D			D				
7/23/2012	XX		GW212X57D	D	D			D				
10/22/2012	XX		GW212X5E4	D	D			D				

MW-216B

11/12/1990	XX		MW-216B33169					9			0.02 U	
2/19/1991	XX		MW-216B33288					4.9			0.02 U	
6/4/1991	XD		MW-216BXD33393					5.1			0.02 U	
6/4/1991	XX		MW-216B33393					5.4			0.02 U	
9/16/1991	XX		MW-216B33497					6.3			0.02 U	
9/16/1991	XD		MW-216BXD33497					6.6			0.02 U	
12/17/1991	XD		GW216B00F					4			0.02 U	
12/17/1991	XX		GW216B007					4.1			0.02 U	
3/2/1992	XX		GW216B014					4			0.02 U	
6/23/1992	XX		GW216B01J					4			0.02 U	
8/17/1992	XX		GW216B02I					5			0.02 U	
1/26/1993	XX		GW216B03D					5			0.02 U	
4/27/1993	XX		GW216B043					5			0.02 U	
7/21/1993	XX		GW216B050					5			0.02 U	
10/13/1993	XX		GW216X064					6			0.02 U	
10/13/1993	XD		GW216B066					6			0.02 U	
1/11/1994	XD		GW216B071					6			0.02 U	
1/11/1994	XX		GW216B070					6			0.02 U	
5/21/1996	XX		GW216B099					5.1			0.02 U	
11/25/1996	XX		GW216B0A7					5			0.02 U	
3/25/1997	XX		MW-216B810-35514					5				
6/2/1997	XX		MW-216B811-35583					6.6				
9/9/1997	XX		MW-216B812-35682					6				
12/3/1997	XX		MW-216B813-35767					5.6				
3/25/1998	XD		MW-216B815-35865					4.9				
3/25/1998	XX		MW-216B814-35879					5.3				
9/8/1998	XX		MW-216B816-36046					5.8				

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Metal (part 2 of 2)**

Page 14 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

**(MW-216B)**

Date Type Sample ID

Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
12/14/1998	XX	MW-216B817-36143					6.1				
3/30/1999	XX	MW-216B818-36249					4.7				
6/9/1999	XX	MW-216B819-36320					4.8				
9/14/1999	XX	MW-216B820-36417					5.9				
12/2/1999	XX	MW-216B821-36496					4.6				
3/28/2000	XX	MW-216B822-36613					4.3				
6/13/2000	XX	MW-216B823-36660					5.5				
9/13/2000	XX	MW-216B824-36782					6.3				
12/12/2000	XX	MW-216B825-36872					5.7				
3/14/2001	XX	MW-216B826-36964					5				
6/19/2001	XX	MW-216B827-37061					6.3				
9/11/2001	XX	MW-216B828-37145					6.4				
12/12/2001	XX	MW-216B829-37237					5.4				
3/14/2002	XX	MW-216B830-37329					7				
6/18/2002	XX	MW-216B831-37425					5.2				
9/19/2002	XX	MW-216B832-37518					13				
12/10/2002	XX	MW-216B833-37600					5				
3/26/2003	XX	MW-216B837706					12				
6/26/2003	XX	MW-216B837798					3.9				
9/18/2003	XX	MW-216B837882					3.4				
5/6/2004	XX	GW216B013	0.8				4.8				
5/6/2004	XD	GWDF1X017	0.8				4.9				
7/26/2004	XX	GW216B049	1				4.6				
10/26/2004	XX	GW216B064	2				4				
10/26/2004	XD	GWDF1X068	1.8				4				
5/10/2005	XX	GW216B125	0.004 J	0.4			4.5				
7/27/2005	XD	GWDF3X168	0.002 J	0.7			5.9				
7/27/2005	XX	GW216B15D	0.002 J	0.9			5.8				
9/22/2005	XX	GW216B188	0.003 J	0.4			4.9				
5/23/2006	XX	GW216B1D6	0.1	2.6			11				
7/25/2006	XD	GWDF1X167	0.073	1.3			5.7				
7/25/2006	XX	GW216B1G3	0.067	1.4			5.7				
9/12/2006	XX	GW216B1H	0.046	1.3			4.5				
5/15/2007	XX	GW216B223	0.018	0.5			5.4				
7/24/2007	XD	GWDF1X26B	0.012	0.7			5.1				
7/24/2007	XX	GW216B267	0.01	0.8			4.8				
9/10/2007	XX	GW216B28H	0.002 U	1.1			7.9				
5/20/2008	XX	GW216B2CB	0.094	1.5			7.4				
7/28/2008	XD	GWDF1X2FJ	0.032	1.2			10.8				
7/28/2008	XX	GW216B2FF	0.032	1.2			11				
10/28/2008	XX	GW216B2I5	0.013	0.7			6.6				
4/14/2009	XX	GW216B31D	0.045	0.5			4.9				
7/7/2009	XX	GW216B35H	DE	DE			DE				
<b>MW-216BR</b>											
12/8/2009	XX	GW216B3GG	0.002 J	2.4			18.8				
4/27/2010	XX	GW216B3IB	0.002 U	1.7			15.9				
7/20/2010	XX	GW216B41F	0.002 U	1.5			14.9				
10/19/2010	XX	GW216B44J	0.002 U	1.6			15.8				
4/26/2011	XX	GW216B490	0.002 U	2			12.8				

SUMMARY REPORT  
 Metal (part 2 of 2)

(MW-216BR)

Date Type Sample ID

Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
7/19/2011	XX	GW216B4C1	0.002 U	1.8			15.2				
10/25/2011	XX	GW216B4GD	0.002 U	2.2			14.3				
4/24/2012	XX	GW216B513	0.005 U	1.8			11.3				
7/24/2012	XX	GW216B562	0.005 U	2.2			12.2				
10/23/2012	XX	GW216B5CD	0.005 U	1.8			10.6				
<b>MW-223A</b>											
11/12/1990	XX	MW-223A33189					4			0.02 U	
2/19/1991	XX	MW-223A33288	F	F	F	F	F	F	F	F	
6/3/1991	XX	MW-223A33392					2.7			0.02 U	
9/16/1991	XX	MW-223A33487					3			0.02 U	
12/17/1991	XX	GW223A008	F	F	F	F	F	F	F	F	
3/2/1992	XX	GW223A016	F	F	F	F	F	F	F	F	
6/23/1992	XX	GW223A020					3			0.02 U	
8/17/1992	XX	GW223A02J					3			0.02 U	
1/26/1993	XX	GW223A03E					F			F	
4/27/1993	XX	GW223A044					3			0.02 U	
7/21/1993	XD	GW223A056					3			0.03	
7/21/1993	XX	GW223A05B					3			0.02 U	
10/12/1993	XX	GW223X065					3			0.02	
1/11/1994	XX	GW223A072					F			F	
5/21/1996	XX	GW223A09B					3			0.02 U	
11/25/1996	XX	GW223A0A8					2.9				
6/3/1997	XX	MW-223A812-35684					3.5				
9/10/1997	XX	MW-223A813-35683					3.5				
12/4/1997	XX	MW-223A814-35768					3				
6/11/1998	XX	MW-223A816-35957					3.2				
9/9/1998	XX	MW-223A817-36047					2.8				
12/15/1998	XX	MW-223A818-36144					3.2				
3/30/1999	XX	MW-223A819-36249					2.3				
6/9/1999	XX	MW-223A820-36320					3.1				
9/14/1999	XX	MW-223A821-36417					3				
12/2/1999	XX	MW-223A822-36496					3.1				
3/28/2000	XX	MW-223A823-36613					3.4				
6/13/2000	XX	MW-223A824-36690					3.4				
9/13/2000	XX	MW-223A825-36782					3.3				
12/12/2000	XX	MW-223A826-36872					3.6				
6/19/2001	XX	MW-223A827-37061					3.6				
9/11/2001	XX	MW-223A828-37145					3.3				
12/11/2001	XX	MW-223A829-37236					3.5				
3/14/2002	XX	MW-223A830-37329					4.2				
6/18/2002	XX	MW-223A831-37425					3.4				
9/19/2002	XX	MW-223A832-37518					3.2				
12/10/2002	XX	MW-223A833-37600					3.4				
3/25/2003	XX	MW-223AN3705					3				
3/25/2003	XD	MW-223AD3705					2.9				
6/26/2003	XX	MW-223AN3798					2.6				
9/18/2003	XX	MW-223AN37882					1.8				
5/5/2004	XX	GW223A014		0.7			3.4				
7/28/2004	XX	GW223A04A		1.3			3.6				

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Metal (part 2 of 2)

Page 16 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-223A)

Date Type Sample ID

Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
7/28/2004	XD	GWDP1X04D		1.2			3.5				
10/25/2004	XX	GW223A065		0.7			3				
5/10/2005	XD	GWDP3X130	0.009	0.7			3.9				
5/10/2005	XX	GW223A126	0.008	0.6			3.8				
7/26/2005	XX	GW223A15E	0.002 U	0.7			4				
9/21/2005	XX	GW223A18C	0.002 U	0.5			9.8				
5/24/2006	XD	GWDP1X1DA	0.004 J	0.9			3.7				
5/24/2006	XX	GW223A1D7	0.004 J	1			3.6				
7/26/2006	XD	GWDP5X113	0.002 U	0.6			3.5				
7/26/2006	XX	GW223A1G4	0.002 U	0.8			3.6				
9/13/2006	XD	GWDP5X20G	0.003 J	0.5			3.9				
9/13/2006	XX	GW223A1IH	0.002 J	0.7			3.7				
5/15/2007	XD	GWDP1X227	0.002 U	0.5			3.6				
5/15/2007	XX	GW223A224	0.002 J	0.4			3.6				
7/24/2007	XD	GWDP5X287	0.002 U	0.4			3.4				
7/24/2007	XX	GW223A268	0.002 U	0.6			3.4				
9/11/2007	XX	GW223A28I	0.003 J	0.6			2.7				
5/20/2008	XD	GWDP1X2CF	0.003 U	0.4			2.7				
5/20/2008	XX	GW223A2CC	0.003 U	0.4			2.7				
7/30/2008	XX	GW223A2FG	0.002 U	0.5			2.9				
7/30/2008	XD	GWDP5X2HF	0.002 U	0.5			3				
10/28/2008	XX	GW223A2I6	0.002 U	0.6			2.9				
4/14/2009	XD	GWDP1X3IH	0.002 U	0.8			4.8				
4/14/2009	XX	GW223A31E	0.002 U	0.8			4.6				
7/7/2009	XX	GW223A35I	0.002 J	0.5			3.3				
10/27/2009	XD	GWDP4X3ED	0.002 U	0.6			3.4				
10/27/2009	XX	GW223A3DD	0.002 U	0.6			3.3				
4/27/2010	XX	GW223A3IC	0.002 U	0.6			3.4				
4/27/2010	XD	GWDP1X3IF	0.002 U	0.6			3.5				
7/20/2010	XX	GW223A41G	0.002 U	0.6			3.5				
10/19/2010	XD	GWDP1X453	0.002 U	0.6			3.5				
10/19/2010	XX	GW223A450	0.002 U	0.7			3.4				
4/26/2011	XD	GWDP1X484	0.002 U	0.7			3.9				
4/26/2011	XX	GW223A49I	0.002 U	0.7			3.7				
7/19/2011	XX	GW223A4CJ	0.002 U	0.7			3.5				
10/25/2011	XX	GW223A4GE	0.002 U	0.8			4.1				
10/25/2011	XD	GWDP3X4H8	0.002 U	0.8			4.1				
4/24/2012	XX	GW223A514	0.005 U	0.7			4				
4/24/2012	XD	GWDP1X517	0.005 U	0.7			3.7				
7/24/2012	XX	GW223A563	0.005 U	0.8			4.4				
10/23/2012	XD	GWDP3X6D8	0.005 U	0.7			4.5				
10/23/2012	XX	GW223A5CE	0.005 U	0.7			4.3				

MW-223B

11/12/1990	XX	MW-223B33189					4			0.02 U	
2/19/1991	XX	MW-223B33288	F	F	F	F	F	F	F	F	
6/3/1991	XX	MW-223B33392					3.3			0.02 U	
9/16/1991	XX	MW-223B33487					4			0.02 U	
12/17/1991	XX	GW223B009	F	F	F	F	F	F	F	F	
3/2/1992	XX	GW223B017	F	F	F	F	F	F	F	F	

SUMMARY REPORT  
 Metal (part 2 of 2)

(MW-223B)		Nickel	Potassium	Selenium	Silver	Sodium	Thallium	Vanadium	Zinc	Tin
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
Date	Type	Sample ID								
6/23/1992	XX					3			0.02 U	
8/17/1992	XX					4			0.02 U	
1/26/1993	XX					F			F	
4/27/1993	XX					3			0.02 U	
7/21/1993	XX					3			0.02 U	
10/12/1993	XX					3			0.02 U	
1/11/1994	XX					F			F	
5/21/1996	XX					3.2			0.02 U	
11/25/1996	XX					3.2				
3/24/1997	XX					F				
6/3/1997	XX					3.6				
9/10/1997	XX					3.1				
12/4/1997	XX					3.4				
6/8/1998	XX					4				
9/9/1998	XX					3.6				
12/15/1998	XX					2.9				
3/30/1999	XX					3.6				
6/9/1999	XX					3.8				
9/14/1999	XX					3.6				
12/2/1999	XX					3.9				
3/28/2000	XX					4.3				
6/13/2000	XX					3.5				
9/13/2000	XX					4				
12/12/2000	XX					4.5				
6/19/2001	XX					4.1				
9/11/2001	XX					4.3				
12/11/2001	XX					4				
3/14/2002	XX					5.1				
6/18/2002	XX					3.7				
9/19/2002	XX					3.2				
12/10/2002	XX					4.1				
3/25/2003	XX					3.1				
6/26/2003	XX					3.1				
6/26/2003	XD					3.1				
9/18/2003	XX					2.1				
5/5/2004	XX					4.3			0.004 U	2 U
7/27/2004	XX					3.2			0.004 U	2 U
10/25/2004	XX					3.8				
5/10/2005	XX					4.5				
7/26/2005	XX					5.2				
9/21/2005	XX					4.5				
5/24/2006	XX					4.6				
7/26/2006	XX					4.5				
9/13/2006	XX					4.9				
5/15/2007	XX					4.5				
7/24/2007	XX					4.1				
9/11/2007	XX					3.8				
5/20/2008	XX					3.9				
7/30/2008	XX					4.2				
10/28/2008	XX					4.2				

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Metal (part 2 of 2)

Page 18 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-223B)		Nickel	Potassium	Selenium	Silver	Sodium	Thallium	Vanadium	Zinc	Tin
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
Date Type Sample ID										
4/14/2009	XX	0.002 U	0.7			4.6				
7/17/2009	XD	0.002 U	0.6			4.5				
7/17/2009	XX	0.002 U	0.5			4.8				
10/27/2009	XX	0.003 J	0.7			4.4				
4/27/2010	XX	0.002 U	0.6			4.2				
7/20/2010	XX	0.002 U	0.8			4.6				
7/20/2010	XD	0.002 U	0.8			4.6				
10/19/2010	XX	0.002 U	0.8			4.4				
4/26/2011	XX	0.002 U	0.7			4.3				
7/19/2011	XD	0.002 U	1.9			4.3				
7/19/2011	XX	0.002 U	1.7			4.1				
10/25/2011	XX	0.002 U	2			4.8				
4/24/2012	XX	0.005 U	0.6			4.2				
7/24/2012	XD	0.005 U	0.8			4.6				
7/24/2012	XX	0.005 U	0.8			4.6				
10/23/2012	XX	0.005 U	0.7			4.6				
<b>MW-227</b>										
11/13/1990	XX					7			0.02 U	
2/19/1991	XX	F	F	F	F	F	F	F	F	
6/3/1991	XX					5.5			0.02 U	
9/16/1991	XX					6.5			0.02 U	
12/17/1991	XX	F	F	F	F	5.8			0.02 U	
3/2/1992	XX							F	F	
6/23/1992	XX					6			0.02 U	
8/17/1992	XX					6			0.02 U	
1/26/1993	XX					F			F	
4/27/1993	XX					7			0.04	
7/21/1993	XX					7			0.02 U	
10/12/1993	XX					7			0.02 U	
1/11/1994	XX					F			F	
5/21/1996	XX					6.6			0.02 U	
11/25/1996	XX					6.6			0.02 U	
3/24/1997	XX					F				
6/3/1997	XX					7.3				
9/9/1997	XX					8				
12/14/1997	XX					7.2				
3/25/1998	XX					8.4				
6/8/1998	XX					8				
9/9/1998	XX					8.7				
12/15/1998	XX					8.9				
3/29/1999	XX					7.8				
6/8/1999	XX					8.5				
9/13/1999	XX					7.5				
12/11/1999	XX					8				
3/27/2000	XX					8				
6/12/2000	XX					7.6				
9/12/2000	XX					8.4				
12/11/2000	XX					7				
3/12/2001	XX					6.6				

**SUMMARY REPORT**  
Metal (part 2 of 2)

REPORT PREPARED: 1/17/2013 13:57  
FOR: Juniper Ridge Landfill

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

(MW-227)		Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
6/18/2001	XX	MW-227830-37060							6.9				
9/10/2001	XX	MW-227831-37144							7.2				
12/12/2001	XX	MW-227832-37237							7				
3/14/2002	XX	MW-227833-37329							8.4				
6/17/2002	XX	MW-227834-37424							7				
9/18/2002	XX	MW-227835-37517							7				
12/19/2002	XX	MW-227836-37599							6.6				
3/25/2003	XX	MW-227N37705							6.2				
6/25/2003	XX	MW-227N37797							6.4				
9/18/2003	XX	MW-227N37882							3.7				
5/5/2004	XX	GW227X015				1			9				
7/26/2004	XX	GW227X04B				1			6.2				
10/26/2004	XX	GW227X066				1			11				
5/9/2005	XX	GW227X127			0.004 J	1.2			7.5				
7/27/2005	XX	GW227X15F			0.002 U	1.1			7.4				
9/21/2005	XX	GW227X18D			0.002 U	0.6			7.2				
5/24/2006	XX	GW227X1D8			0.002 U	1.1			6.9				
7/26/2006	XX	GW227X1G5			0.002 U	0.9			6.8				
9/13/2006	XX	GW227X1I1			0.002 J	1.2			7.2				
5/15/2007	XX	GW227X225			0.002 U	0.7			6.8				
7/24/2007	XX	GW227X268			0.002 U	1.1			6.6				
9/11/2007	XX	GW227X28J			0.002 U	1.1			6				
5/20/2008	XX	GW227X2CD			0.003 U	0.9			5.6				
7/30/2008	XX	GW227X2FH			0.002 U	1			5.5				
10/27/2008	XX	GW227X2I7			0.002 U	0.8			5.3				
4/14/2009	XX	GW227X31F			0.002 U	1			6.2				
7/7/2009	XX	GW227X35J			0.002 U	0.9			5.5				
10/27/2009	XX	GW227X3DE			0.002 J	1.1			5.6				
4/27/2010	XX	GW227X3ID			0.002 U	1.6			5.3				
7/20/2010	XX	GW227X41H			0.002 U	1			5.5				
10/19/2010	XX	GW227X45I			0.002 U	1			5.2				
4/26/2011	XX	GW227X492			0.002 U	1			5.1				
7/19/2011	XX	GW227X4D0			0.002 U	0.9			5.3				
10/25/2011	XX	GW227X4GF			0.002 U	1.1			3.1				
4/24/2012	XX	GW227X515			0.005 U	1			5				
7/24/2012	XX	GW227X564			0.005 U	1.1			5.3				
10/23/2012	XX	GW227X5CF			0.005 U	1			5.5				
<b>MW-301</b>													
11/25/1996	XD	GWDP1X0AC							7.4				
11/25/1996	XX	GW301X0B0							7.4				
3/24/1997	XX	MW-301815-35513							F				
6/3/1997	XX	MW-301816-35584							7.5				
9/8/1997	XX	MW-301817-35682							7.3				
12/3/1997	XX	MW-301818-35767							6.8				
3/23/1998	XX	MW-301819-35877							7.4				
6/8/1998	XX	MW-301820-35954							7.5				
9/9/1998	XX	MW-301821-36047							8				
12/14/1998	XX	MW-301822-36143							8.4				
3/29/1999	XX	MW-301823-36248							7.5				

SUMMARY REPORT  
 Metal (part 2 of 2)

(MW-301)	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
6/8/1999	XX	MW-301824-36319			8.4				
9/13/1999	XX	MW-301825-36416			8.3				
12/1/1999	XX	MW-301826-36495			8.2				
3/27/2000	XX	MW-301827-36612			8.6				
6/12/2000	XX	MW-301828-36689			8.5				
9/12/2000	XX	MW-301829-36781			9.4				
6/18/2001	XX	MW-301830-37060			9.1				
9/10/2001	XX	MW-301831-37144			8.6				
12/11/2001	XX	MW-301832-37236			8.8				
3/13/2002	XX	MW-301833-37328			10				
6/17/2002	XX	MW-301834-37424			9.8				
9/18/2002	XX	MW-301835-37517			7.7				
3/25/2003	XX	MW-301N3705			7.9				
6/25/2003	XX	MW-301N3797			9.1				
9/17/2003	XD	MW-301D37881			6.9				
9/17/2003	XX	MW-301N37881			7.8				
5/5/2004	XX	GW301X016	0.8		11				
5/5/2004	XD	GWDF3X01J	1		10				
7/26/2004	XX	GW301X04C	1		12				
10/25/2004	XX	GW301X067	0.7		14				
5/9/2005	XX	GW301X128	0.002 U		14				
8/1/2005	XX	GW301X156	0.002 U		11				
9/22/2005	XX	GW301X18E	0.002 U		14				
5/22/2006	XX	GW301X1D9	0.002 U		13				
7/24/2006	XX	GW301X1G6	0.002 U		12.5				
9/11/2006	XX	GW301X1I1J	0.002 J		12.9				
5/14/2007	XX	GW301X226	0.002 U		14.2				
7/23/2007	XX	GW301X26A	0.002 U		12.4				
9/10/2007	XX	GW301X290	0.002 U		12.5				
5/19/2008	XX	GW301X2CE	0.003 U		12.3				
7/30/2008	XX	GW301X2FI	0.002 U		11.1				
10/28/2008	XX	GW301X2I8	0.002 U		11.3				
4/15/2009	XX	GW301X31G	0.002 U		11.8				
7/7/2009	XX	GW301X360	0.002 U		13.1				
10/26/2009	XX	GW301X3DF	0.002 U		11.5				
4/26/2010	XX	GW301X3E	0.002 U		10.9				
10/19/2010	XX	GW301X41I	0.002 U		11.8				
4/27/2011	XX	GW301X483	0.002 U		10.7				
7/20/2011	XX	GW301X4D1	0.002 U		11.4				
10/26/2011	XX	GW301X4GG	0.002 U		10.6				
4/25/2012	XX	GW301X516	0.005 U		10.7				
7/25/2012	XX	GW301X585	0.005 U		11.1				
10/24/2012	XX	GW301X5CG	0.005 U		11.8				
10/24/2012	XD	GWDF4X5DE	0.005 U		10.3				
10/24/2012	XD	GWDF4X5DE	0.6		10				
<b>MW-302</b>									
6/23/1992	XX	GW302X027			2			0.02 U	
8/17/1992	XD	GW302X035			3			0.02 U	
8/17/1992	XX	GW302X032			3			0.02 U	

SUMMARY REPORT  
 Metal (part 2 of 2)

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

(MW-302)		Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
Date	Type	Sample ID								
1/26/1993	XX	GW-302X03H	1.2	0.002 U	0.02 U	2	0.002 U	0.004 U	0.02 U	2 U
4/27/1993	XX	GW-302X048				2			0.02 U	
7/21/1993	XX	GW-302X05F				2			0.02 U	
10/12/1993	XX	GW-302X069				2			0.02 U	
1/11/1994	XX	GW-302X075				3			0.02 U	
5/21/1996	XX	GW-302X09E				1			1	
11/26/1996	XX	GW-302X0AB				3.1				
3/26/1997	XX	MW-302827-35515				2.6				
6/3/1997	XX	MW-302828-35584				3.3				
9/10/1997	XX	MW-302829-35683				3.7				
12/4/1997	XX	MW-302830-35768				3.2				
3/25/1998	XX	MW-302831-35879				3.1				
6/8/1998	XX	MW-302832-35954				3.5				
9/9/1998	XX	MW-302833-36047				5.3				
12/15/1998	XX	MW-302834-36144				3.8				
3/30/1999	XX	MW-302835-36249				3.3				
6/9/1999	XX	MW-302836-36320				3.7				
9/13/1999	XX	MW-302837-36416				3.7				
12/11/1999	XX	MW-302838-36495				4.3				
3/27/2000	XX	MW-302839-36612				4.7				
6/13/2000	XX	MW-302840-36690				3.5				
9/12/2000	XX	MW-302841-36781				4				
12/11/2000	XX	MW-302842-36871				4.7				
3/12/2001	XX	MW-302843-36962				3.4				
6/18/2001	XX	MW-302844-37060				3.5				
9/10/2001	XX	MW-302845-37144				4.8				
12/11/2001	XX	MW-302846-37236				4.8				
3/13/2002	XX	MW-302847-37328				5.9				
6/17/2002	XX	MW-302848-37424				4.7				
9/18/2002	XX	MW-302849-37517				4.8				
12/9/2002	XX	MW-302850-37599				4.4				
3/25/2003	XX	MW-302N37705				5				
6/25/2003	XX	MW-302N37797				4.1				
9/17/2003	XX	MW-302N37881				3.5				
5/6/2004	XX	GW-302X009	0.8	0.002 U	0.02 U	4.6	0.002 U	0.004 U	0.01 U	2 U
7/27/2004	XX	GW-302XHD1	1.2	0.002 U	0.02 U	3.5	0.002 U	0.004 U	0.01 U	2 U
10/25/2004	XX	GW-302X07C	0.8			4.3				
5/10/2005	XX	GW-302X13D	0.9			5				
7/27/2005	XX	GW-302X171	0.7			4.7				
9/19/2005	XX	GW-302X19J	0.6			5.6				
5/23/2006	XX	GW-302X1EE	0.8			6				
7/24/2006	XX	GW-302X1HB	0.4			5.2				
9/12/2006	XX	GW-302X204	1			6.8				
5/14/2007	XX	GW-302X23B	0.8			5.9				
7/25/2007	XX	GW-302X27F	0.7			5.9				
9/10/2007	XX	GW-302X2A5	DE	DE	DE	DE				
<b>MW-302R</b>										
5/20/2008	XX	GW-302X2DJ	1.2			7.5				
7/29/2008	XX	GW-302X2H3	2			7.1				

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Metal (part 2 of 2)

Page 22 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-302R)

Date Type Sample ID

Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
10/27/2008	XX	GW-302X2JD	0.002 U	1			6.6				
4/13/2009	XX	GW-302X331	0.002 U	0.7			6.6				
7/16/2009	XX	GW-302X375	0.002 J	0.8			9.6				
10/27/2009	XX	GW-302X3F0	0.002 U	1.4			22.9				
4/26/2010	XX	GW-302X3JJ	0.002 U	0.5			6				
7/19/2010	XX	GW-302X433	0.002 U	1.2			20.3				
10/18/2010	XX	GW-302X467	0.002 U	1.6			22				
4/25/2011	XX	GW-302X4A8	0.002 U	0.8			14.9				
7/18/2011	XX	GW-302X4E6	0.002 U	1			20.6				
10/24/2011	XX	GW-302X4H1	0.002 U	1.2			24.7				
4/23/2012	XX	GW-302X52B	0.005 U	0.8			13.2				
7/23/2012	XX	GW-302X57A	0.005 U	0.9			18.4				
10/22/2012	XX	GW-302X5E1	0.005 U	1.2			28.6				

MW-303

11/26/1996	XX	GW-303X0B1					4.3				
3/26/1997	XX	MW-303828-35515					3.1				
6/2/1997	XX	MW-303829-35583					4.6				
9/8/1997	XX	MW-303830-35681					3.3				
12/3/1997	XX	MW-303831-35767					3.2				
3/25/1998	XX	MW-303832-35879					3.3				
6/9/1998	XX	MW-303833-35955					3.2				
9/8/1998	XX	MW-303834-36046					3.3				
12/14/1998	XX	MW-303835-36143					3.3				
3/29/1999	XX	MW-303836-36248					2.6				
6/8/1999	XX	MW-303837-36319					3.8				
9/13/1999	XX	MW-303838-36416					3.1				
12/1/1999	XX	MW-303839-36495					3.1				
3/27/2000	XX	MW-303840-36672					3.4				
6/12/2000	XX	MW-303841-36689					3.1				
9/13/2000	XX	MW-303842-36782					2.9				
12/11/2000	XX	MW-303843-36871					3.2				
3/13/2001	XX	MW-303844-36963					3.1				
6/19/2001	XX	MW-303845-37061					4				
9/11/2001	XX	MW-303846-37145					3.3				
12/12/2001	XX	MW-303847-37237					2.5				
3/13/2002	XX	MW-303848-37328					3.1				
6/17/2002	XX	MW-303849-37424					4.1				
9/18/2002	XX	MW-303850-37517					2.9				
12/9/2002	XX	MW-303851-37599					3				
3/26/2003	XX	MW-303852-37706					7.3				
6/25/2003	XX	MW-303853-37797					2.5				
9/17/2003	XX	MW-303854-37881					1.9				
5/6/2004	XX	GW-303X00C	0.002 J	0.4	0.002 U	0.02 U	3.9	0.002 U	0.004 U	0.01 U	2 U
7/28/2004	XX	GW-303X040	0.002 U	1	0.002 J	0.02 U	4.1	0.002 U	0.004 J	0.01 U	2 U
10/26/2004	XX	GW-303X07G		0.6			3.3				
10/26/2004	XD	GWDF3X06J		0.6			3.2				
5/11/2005	XX	GW-303X13H	0.002 U	0.4			4.1				
8/1/2005	XX	GW-303X175	0.002 U	0.4			4.3				
8/1/2005	XD	GWDP1X15H	0.002 U	0.4			4.5				

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Metal (part 2 of 2)**

Page 23 of 34

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

**(MW-303)**

**Date Type Sample ID**

Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
9/19/2005	XX	GW903X1A3	0.002 U	0.5			4				
5/23/2006	XX	GW903X1E1	0.002 U	0.6			4.3				
7/24/2006	XD	GWDP4X1H4	0.002 U	0.3			3.9				
7/24/2006	XX	GW903X1HF	0.002 U	0.3			3.7				
9/12/2006	XX	GW903X208	0.002 U	0.7			4.3				
5/14/2007	XX	GW903X23F	0.002 U	0.2 J			4.7				
7/25/2007	XD	GWDP4X278	0.002 U	0.4			3.8				
7/25/2007	XX	GW903X27J	0.002 U	0.5			3.6				
9/11/2007	XX	GW903X2A9	0.002 U	0.5			3.1				
9/11/2007	XD	GWDP1X291	0.002 U	0.5			3.2				
5/19/2008	XX	GW903X2E3	0.003 U	0.5			4.6				
7/29/2008	XD	GWDP4X2GG	0.002 U	0.5			4.4				
7/29/2008	XX	GW903X2H7	0.002 U	0.6			4.6				
10/27/2008	XX	GW903X2JH	0.002 U	0.5			4.2				
10/27/2008	XD	GWDP3X2J0	0.002 U	0.4			4.2				
4/13/2009	XX	GW903X335	0.002 U	0.9			5.8				
7/16/2009	XX	GW903X379	0.002 J	0.7			6.1				
7/16/2009	XD	GWDP3X36C	0.002 J	0.7			6				
10/28/2009	XX	GW903X3F4	0.002 U	0.7			5.8				
4/26/2010	XX	GW903X403	0.002 U	0.7			6				
7/19/2010	XD	GWDP4X42G	0.002 U	0.8			6.3				
7/19/2010	XX	GW903X437	0.002 U	0.8			6.5				
10/18/2010	XX	GW903X46B	0.002 U	0.7			6.8				
4/25/2011	XX	GW903X4AC	0.002 U	0.8			6.9				
7/18/2011	XD	GWDP4X4DJ	0.002 U	0.8			6.8				
7/18/2011	XX	GW903X4EA	0.002 U	0.8			6.7				
10/24/2011	XX	GW903X4I5	0.002 U	0.9			7.6				
10/24/2011	XD	GWDP4X4HE	0.002 U	0.8			7.2				
4/23/2012	XX	GW903X52F	0.005 U	1			8.5				
7/24/2012	XX	GW903X57E	!	!			!				

**MW12-303R**

10/23/2012	XX	GW903X5EG	0.005 U	1.5			10.4				
------------	----	-----------	---------	-----	--	--	------	--	--	--	--

**MW-304A**

7/29/2004	XX	GW904AHD0	0.002 U	3.2	0.002 J	0.02 U	23	0.002 U	0.004 U	0.01 U	
10/27/2004	XX	GW904A07B	0.002 U	1.9	0.002 U	0.02 U	17	0.002 U	0.2 U	0.01 U	
5/11/2005	XX	GW904A13C	0.002 U	1.2			3.6				
7/28/2005	XX	GW904A170	0.002 U	1			3.9				
9/19/2005	XX	GW904A19I	0.002 U	0.7			4.8				
5/24/2006	XX	GW904A1ED	0.002 U	0.6			4.5				
7/25/2006	XX	GW904A1HA	0.002 U	1			4.4				
9/12/2006	XX	GW904A203	0.002 U	1			5.6				
5/15/2007	XX	GW904A23A	0.006	0.3			5.8				
7/24/2007	XX	GW904A27E	0.003 J	1.1			5.6				
9/11/2007	XX	GW904A2A4	0.004 J	0.9			4.6				
5/20/2008	XX	GW904A2DI	0.003 U	0.7			3.6				
7/29/2008	XX	GW904A2H2	0.002 U	0.9			4.3				
10/27/2008	XX	GW904A2JC	0.002 U	0.8			6.1				
4/13/2009	XX	GW904A530	0.002 U	1			4.8				

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Metal (part 2 of 2)

Page 24 of 34

SEVIEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-304A)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
XX	7/16/2009	XX	GW304A374	0.002 U	0.7			4.2				
XX	10/27/2009	XX	GW304A3EJ	0.002 U	0.7			3.3				
XX	4/26/2010	XX	GW304A3JI	0.002 U	0.5			2.9				
XX	7/19/2010	XX	GW304A432	0.002 U	0.7			3.4				
XX	10/18/2010	XX	GW304A466	0.002 U	0.7			3.6				
XX	4/25/2011	XX	GW304A4A7	0.002 U	0.7			3.2				
XX	7/18/2011	XX	GW304A4E5	0.002 U	0.6			3.6				
XX	10/24/2011	XX	GW304A4I0	0.002 U	0.8			5				
XX	4/23/2012	XX	GW304A52A	0.005 U	0.9			7.1				
XX	7/23/2012	XX	GW304A579	0.005 U	0.8			4.7				
XX	10/22/2012	XX	GW304A5E0	0.005 U	0.7			3.7				
<b>MW-401A</b>												
XX	7/29/2004	XX	GW401A059	0.002 U	1.4	0.004 J	0.02 U	3.6	0.002 U	0.005 J	0.01 U	
XX	10/27/2004	XX	GW401A071	0.002 U	0.9	0.002 U	0.02 U	3.7	0.002 U	0.2 U	0.01 U	
XD	10/27/2004	XD	GWDP4X075	0.002 U	0.9	0.002 U	0.02 U	3.8	0.002 U	0.2 U	0.01 J	
XX	5/10/2005	XX	GW401A132	0.003 J	0.7			4.7				
XX	7/28/2005	XX	GW401A16A	0.002 U	0.8			5.2				
XD	7/28/2005	XD	GWDP4X16E	0.002 U	0.6			5.1				
XX	9/21/2005	XX	GW401A198	0.002 U	0.3			4.5				
XX	5/23/2006	XX	GW401A1E3	0.002 U	1			4.6				
XX	7/25/2006	XX	GW401A1H0	0.004 J	0.7			4.5				
XX	9/12/2006	XX	GW401A1JD	0.002 U	0.8			4.9				
XX	5/14/2007	XX	GW401A230	0.002 U	0.3			5.2				
XX	7/24/2007	XX	GW401A274	0.002 U	1.3			4.8				
XX	9/11/2007	XX	GW401A29E	0.003 J	0.8			3.8				
XX	5/20/2008	XX	GW401A2D8	0.003 U	0.6			3.6				
XX	7/28/2008	XX	GW401A2GC	0.002 U	0.7			3.8				
XX	10/27/2008	XX	GW401A2J2	0.002 U	0.6			3.5				
XX	4/13/2009	XX	GW401A32A	0.002 U	0.8			3.9				
XX	7/7/2009	XX	GW401A36E	0.002 U	0.6			3.9				
XX	10/28/2009	XX	GW401A3E9	0.002 U	0.6			3.2				
XX	4/27/2010	XX	GW401A3JB	0.002 U	0.7			3.5				
XX	7/20/2010	XX	GW401A42C	0.002 U	0.7			3.6				
XX	10/20/2010	XX	GW401A45G	0.002 U	0.7			4				
XX	4/25/2011	XX	GW401A49H	0.002 U	0.8			4				
XX	7/18/2011	XX	GW401A4DF	0.002 U	0.7			3.7				
XX	10/24/2011	XX	GW401A4HA	0.002 U	0.7			3.8				
XX	4/23/2012	XX	GW401A520	0.005 U	0.8			4				
XX	7/23/2012	XX	GW401A56J	0.005 U	0.7			3.5				
XX	10/22/2012	XX	GW401A5DA	0.005 U	0.7			4				
<b>MW-401B</b>												
XD	7/29/2004	XD	GWDP4X05D	0.002 J	3.4	0.002 J	0.02 U	18	0.002 U	0.004 U	0.01 U	
XX	7/29/2004	XX	GW401B05A	0.002 J	3.2	0.003 J	0.02 U	18	0.002 U	0.004 U	0.01 U	
XX	10/27/2004	XX	GW401B072	0.002 U	3.1	0.002 J	0.02 U	23	0.002 U	0.2 U	0.01 J	
XD	5/10/2005	XD	GWDP4X136	0.003 J	2			24				
XX	5/10/2005	XX	GW401B133	0.004 J	2.1			23				
XX	7/27/2005	XX	GW401B16B	0.002 J	2			24				
XX	9/21/2005	XX	GW401B199	0.003 J	1.9			33				

**SUMMARY REPORT**  
 Metal (part 2 of 2)

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

(MW-401B)		Nickel	Potassium	Selenium	Silver	Sodium	Thallium	Vanadium	Zinc	Tin
Date	Type	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
9/21/2005	XD	0.003 J	1.7			30				
5/23/2006	XX	0.002 J	1.8			26				
5/23/2006	XD	0.002 J	1.9			25				
7/25/2006	XX	0.005	2.3			30				
9/12/2006	XD	0.002 J	2.2			28				
9/12/2006	XX	0.002 J	2.1			29				
5/14/2007	XD	0.002 U	0.8			18.8				
5/14/2007	XX	0.002 J	0.9			19.6				
7/24/2007	XX	0.002 U	1.8			21				
9/11/2007	XD	0.003 J	1.8			26				
9/11/2007	XX	0.002 J	1.8			27				
5/20/2008	XX	0.003 U	1.2			15.9				
5/20/2008	XD	0.003 U	1.2			15.2				
7/28/2008	XX	0.002 J	1.5			16.3				
10/27/2008	XD	0.002 U	1.5			16.1				
10/27/2008	XX	0.002 U	1.5			16.1				
4/13/2009	XD	0.002 U	1.1			10.1				
4/13/2009	XX	0.002 U	1.1			10.6				
7/7/2009	XX	0.002 U	1.3			13.2				
10/28/2009	XD	0.003 J	1.4			13.3				
10/28/2009	XX	0.003 J	1.4			13.6				
4/27/2010	XX	0.002 U	1			9.8				
4/27/2010	XD	0.002 U	1			10.4				
7/20/2010	XX	0.002 U	1.3			12.9				
7/20/2010	XD	0.002 U	1.4			14.6				
10/20/2010	XX	0.002 U	1.5			15.6				
10/20/2010	XD	0.002 U	1.5			15.3				
4/25/2011	XD	0.002 U	1.1			10.3				
4/25/2011	XX	0.002 U	1.1			10.5				
7/18/2011	XX	0.002 U	1.1			11.5				
7/18/2011	XD	0.002 U	1.1			11.9				
10/24/2011	XX	0.002 U	1.3			13.4				
4/23/2012	XX	0.005 U	1.1			10.9				
4/23/2012	XD	0.005 U	1.2			11.7				
7/23/2012	XX	0.005 U	1.1			11.4				
7/23/2012	XD	0.005 U	1.1			10.8				
10/22/2012	XX	0.005 U	1.4			14.7				
<b>MW-402A</b>										
7/29/2004	XX	0.003 J	1.3	0.003 J	0.02 U	8	0.002 U	0.004 U	0.01 U	
10/27/2004	XX	0.002 U	0.5	0.002 J	0.02 U	8.2	0.002 U	0.2 U	0.01 J	
5/11/2005	XX	0.002 J	0.7			11				
8/1/2005	XX	0.002 U	0.7			9.7				
9/21/2005	XX	0.002 U	0.5			9.2				
5/23/2006	XX	0.002 U	0.8			9.8				
7/26/2006	XX	0.002 U	0.8			9.4				
9/12/2006	XX	0.002 U	0.8			10.5				
5/15/2007	XX	0.003 J	0.3			9.9				
7/25/2007	XX	0.002 U	0.8			9.7				
9/12/2007	XX	0.008	0.7			9.2				

SUMMARY REPORT  
 Metal (part 2 of 2)

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

(MW-402A)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
XX	5/20/2008	XX	GW402A2DA	0.003 U	0.5			8.7				
XX	7/28/2008	XX	GW402A2GE	0.002 U	0.6			7.9				
XX	10/27/2008	XX	GW402A2JA	0.002 U	0.5			8				
XX	4/14/2009	XX	GW402A32C	0.002 U	0.6			9.2				
XX	7/8/2009	XX	GW402A36G	0.002 J	0.6			8.4				
XX	10/28/2009	XX	GW402A3EB	0.002 J	0.6			8.2				
XX	4/27/2010	XX	GW402A3JA	0.002 U	0.6			8				
XX	7/21/2010	XX	GW402A42E	0.002 U	0.6			7.8				
XX	10/20/2010	XX	GW402A45I	0.002 U	0.7			10.3				
XX	4/27/2011	XX	GW402A48J	0.002 U	0.6			7.8				
XX	7/20/2011	XX	GW402A4DH	0.002 U	0.7			8.1				
XX	10/26/2011	XX	GW402A4HC	0.002 J	0.6			8.2				
XX	4/24/2012	XX	GW402A52Z	0.005 U	0.6			7.8				
XX	7/25/2012	XX	GW402A57I	0.005 U	0.6			8.6				
XX	10/24/2012	XX	GW402A5DC	0.005 U	0.6			8.5				
<b>MW-402B</b>												
XX	7/29/2004	XX	GW402B05C	0.002 U	1.4	0.003 J	0.02 U	7.9	0.002 U	0.004 U	0.01 U	
XX	10/27/2004	XX	GW402B07A	0.002 U	0.9	0.002 J	0.02 U	8.5	0.002 U	0.2 U	0.01 U	
XX	5/11/2005	XX	GW402B135	0.002 J	0.9			12				
XX	8/1/2005	XX	GW402B16D	0.002 U	0.7			9.8				
XX	9/21/2005	XX	GW402B19B	0.002 U	0.5			11				
XD	9/21/2005	XD	GWDP3X196	0.002 J	0.4			10				
XX	5/23/2006	XX	GW402B1E6	0.002 U	0.8			9.2				
XX	7/26/2006	XX	GW402B1H3	0.002 U	0.8			9.1				
XX	9/12/2006	XX	GW402B1JG	0.002 J	0.7			10.3				
XX	5/15/2007	XX	GW402B233	0.002 U	0.4			9.6				
XX	7/25/2007	XX	GW402B277	0.002 U	0.8			9.3				
XX	9/12/2007	XX	GW402B29H	0.002 U	2.2			9				
XX	5/20/2008	XX	GW402B2DB	0.003 U	0.5			8.3				
XX	7/28/2008	XX	GW402B29F	0.002 U	0.6			7.9				
XX	10/27/2008	XX	GW402B2J5	0.002 U	0.6			7.8				
XX	4/14/2009	XX	GW402B32D	0.002 U	0.6			8.4				
XX	7/8/2009	XX	GW402B36H	0.002 U	0.7			8.7				
XX	10/28/2009	XX	GW402B35C	0.002 J	0.7			8.3				
XX	4/27/2010	XX	GW402B3JB	0.002 U	0.6			7.8				
XX	7/21/2010	XX	GW402B42F	0.002 U	0.7			7.6				
XX	10/20/2010	XX	GW402B45J	0.002 U	0.8			9.2				
XX	4/27/2011	XX	GW402B44O	0.002 U	0.6			7.9				
XX	7/20/2011	XX	GW402B4DI	0.002 U	0.7			7.8				
XX	10/26/2011	XX	GW402B4HD	0.002 U	0.7			8.1				
XX	4/24/2012	XX	GW402B523	0.005 U	0.7			8.1				
XX	7/25/2012	XX	GW402B57Z	0.005 U	0.7			8.1				
XX	10/24/2012	XX	GW402B5DD	0.005 U	0.6			8.1				
<b>P-04-02</b>												
XX	2/5/2004	XX	GWXXXX03E		3.5			73				
XX	2/11/2004	XX	GWXXXX03C		2			52				
XX	5/5/2004	XX	GWXXXX00E		1.8			21				
XX	7/26/2004	XX	GWXXXX04Z		1.6			19				

SUMMARY REPORT  
 Metal (part 2 of 2)

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
10/25/2004	XX	GWXXXX071		1.4			19				
5/9/2005	XX	GWXXXX13J	0.002 U	1.6			12				
7/27/2005	XX	GWXXXX177	0.002 U	1.3			12				
9/22/2005	XX	GWXXXX1A5	0.002 U	1.2			11				
5/22/2006	XX	GWXXXX1F0	0.002 U	1.4			9.7				
7/24/2006	XX	GWXXXX1HH	0.002 U	1.1			9.1				
9/11/2006	XX	GWXXXX20A	0.002 J	1.2			9.7				
5/14/2007	XX	GWXXXX23H	0.002 U	1.4			9.6				
7/23/2007	XX	GWXXXX281	0.002 U	1.5			8.3				
9/10/2007	XX	GWXXXX2AB	0.003 J	1.5			8.2				
5/21/2008	XX	GWXXXX2E5	0.003 U	1.5			7.8				
7/30/2008	XX	GWXXXX2H9	0.002 U	1.3			7.1				
10/29/2008	XX	GWXXXX2JU	0.002 U	1.4			6.7				
4/13/2009	XX	GWXXXX337	0.002 U	1.5			7.4				
7/6/2009	XX	GWXXXX37B	0.002 J	1.4			7.7				
10/27/2009	XX	GWXXXX3F6	0.002 U	1.3			7.1				
4/26/2010	XX	GWXXXX465	0.002 U	1.1			6.5				
7/21/2010	XX	GWXXXX439	0.002 U	1.3			6.6				
10/20/2010	XX	GWXXXX46D	0.002 U	1.4			7.6				
4/27/2011	XX	GWXXXX4AE	0.002 U	1.2			6.6				
7/20/2011	XX	GWXXXX4EC	0.002 U	1.3			6.7				
10/26/2011	XX	GWXXXX4I7	I	I			I				
4/25/2012	XX	GWXXXX52H	0.005 U	1.7			11.2				
4/25/2012	XX	GWXXXX588	0.005 U	1.6			11.4				
7/25/2012	XX	GWXXXX57G	0.005 U	1.6			17.6				
10/24/2012	XX	GWXXXX5E7	0.005 U	1.7			25.8				
<b>P-04-04</b>											
2/5/2004	XX	GWXXXX08F		4.6			73				
2/11/2004	XX	GWXXXX03D		1.7			25				
5/6/2004	XX	GWXXXX00F		2			14				
7/26/2004	XX	GWXXXX043		2.2			12				
10/25/2004	XX	GWXXXX07J		2			11				
5/9/2005	XX	GWXXXX140	0.002 U	2			7.8				
7/27/2005	XX	GWXXXX178	0.002 U	1.4			6.7				
9/22/2005	XX	GWXXXX1A6	0.002 J	1.9			6.1				
5/22/2006	XX	GWXXXX1F1	0.002 U	1.7			6.3				
7/24/2006	XX	GWXXXX1HI	0.002 U	1.5			5.6				
9/11/2006	XX	GWXXXX20B	0.002 U	1.5			6.2				
5/14/2007	XX	GWXXXX23I	0.002 U	0.9			6				
7/23/2007	XX	GWXXXX282	0.002 U	1.5			4.7				
9/10/2007	XX	GWXXXX2AC	0.003 J	1.5			4.8				
5/21/2008	XX	GWXXXX2E6	0.003 U	1.5			4.6				
7/30/2008	XX	GWXXXX2HA	0.002 U	1.4			4.1				
10/29/2008	XX	GWXXXX300	0.002 U	1.5			4.8				
4/13/2009	XX	GWXXXX338	0.002 U	1.6			4.2				
7/6/2009	XX	GWXXXX37C	0.002 U	1.4			4.2				
10/27/2009	XX	GWXXXX3F7	0.002 U	1.4			3.9				
4/26/2010	XX	GWXXXX466	0.002 U	1.3			3.9				
7/21/2010	XX	GWXXXX43A	0.002 U	1.4			3.9				

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Metal (part 2 of 2)**

Page 28 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(P-04-04)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
	10/20/2010	XX	GWXXXX46E	0.002 U	1.6			4.5				
	4/27/2011	XX	GWXXXX4AF	0.002 U	1.3			4				
	7/20/2011	XX	GWXXXX4ED	0.002 U	1.3			3.7				
	10/26/2011	XX	GWXXXX4IB	0.002 U	1.4			3.7				
	4/25/2012	XX	GWXXXX52I	0.005 U	1.3			4.1				
	7/25/2012	XX	GWXXXX57H	0.005 U	1.3			4.2				
	10/24/2012	XX	GWXXXX5E8	0.005 U	1.3			4.2				
<b>PWS10-1</b>												
	4/26/2010	XX	GWPWS13JU	0.034	1.9			7.6				
	7/19/2010	XX	GWPWS1423	0.02	2.8			9.6				
	10/18/2010	XX	GWPWS1457	0.002 U	1.5			9.1				
	4/25/2011	XX	GWPWS1488	0.002 U	1			7.6				
	7/18/2011	XX	GWPWS14D6	0.002 J	1.4			8.7				
	10/24/2011	XX	GWPWS14H1	0.002 U	1.1			6.7				
	4/23/2012	XX	GWPWS151B	0.005 U	0.6			7.9				
	7/23/2012	XX	GWPWS156A	0.005 U	0.5			5.1				
	10/22/2012	XX	GWPWS15D1	0.005 U	0.4			6.4				
<b>PWS10-2</b>												
	4/26/2010	XX	GWPWS23J0	0.002 U	0.5			3.7				
	7/19/2010	XX	GWPWS2424	0.002 U	0.4			4.5				
	10/18/2010	XX	GWPWS2458	0.002 U	0.6			3.9				
	4/25/2011	XX	GWPWS2498	0.007	1.1			3.2				
	7/18/2011	XX	GWPWS24D7	0.002 U	0.7			5.1				
	10/24/2011	XX	GWPWS24H2	0.003 J	1.1			2.8				
	4/23/2012	XX	GWPWS251C	0.005 U	0.3 U			4.2				
	7/23/2012	XX	GWPWS256B	0.005 U	0.4			4.6				
	10/22/2012	XX	GWPWS25D2	0.005 U	0.8			2.9				
<b>PWS10-3</b>												
	4/26/2010	XX	GWPWS33J1	0.002 U	0.7			3.8				
	7/19/2010	XX	GWPWS3425	0.002 U	0.9			4.2				
	10/18/2010	XX	GWPWS3459	0.002 U	0.3			5.8				
	4/25/2011	XX	GWPWS349A	0.002 U	0.2 J			3.9				
	7/18/2011	XX	GWPWS34D8	0.002 U	1.3			4.6				
	10/24/2011	XX	GWPWS34H3	0.002 U	0.1 J			2.5				
	4/23/2012	XX	GWPWS351D	0.005 U	0.3 U			3.5				
	7/23/2012	XX	GWPWS356C	0.005 U	0.3			4.2				
	10/22/2012	XX	GWPWS35D3	0.005 U	0.3 U			3.2				
<b>SW-1</b>												
	11/13/1990	XD	SW-1XD3190					3			0.02 U	
	11/13/1990	XX	SW-133190					3			0.02 U	
	2/20/1991	XX	SW-133289	F	F	F	F	F	F	F	F	
	6/4/1991	XX	SW-133393					2.9			0.02 U	
	9/16/1991	XX	SW-133467					3.7			0.02 U	
	12/18/1991	XX	SWXX1X00B					3.1			0.02 U	
	3/2/1992	XX	SWXX1X019	F	F	F	F	F	F	F	F	
	6/23/1992	XX	SWXX1X024					4			0.02 U	
	8/17/1992	XX	SWXX1X033					5			0.02 U	

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Metal (part 2 of 2)

Page 29 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(SW-1)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
XX	1/26/1993	XX	SWXX1X03J					6			0.02 U	
XX	4/27/1993	XX	SWXX1X049					5			0.02 U	
XX	7/21/1993	XX	SWXX1X051					5			0.02 U	
XX	10/12/1993	XX	SWXX1X06A					4			0.02	
XX	1/11/1994	XX	SWXX1X076					6			0.02 U	
XX	5/21/1996	XX	SWXX1X09F					3.1			0.02 U	
XX	11/25/1996	XX	SWXX1X0AH					3.9			0.02 U	
XX	3/26/1997	XX	SW-1816-3515					F				
XX	6/4/1997	XX	SW-1817-3585					6.5				
XX	9/11/1997	XX	SW-1818-35684					4.3				
XX	12/8/1997	XX	SW-1819-35772					3.3				
XX	3/25/1998	XX	SW-1820-35879					5.4				
XX	6/9/1998	XX	SW-1821-35955					4.9				
XX	9/10/1998	XX	SW-1822-36048					7.2				
XX	12/15/1998	XX	SW-1823-36144					4.8				
XX	3/30/1999	XX	SW-1824-36249					3.4				
XX	6/9/1999	XX	SW-1825-36320					4.8				
XX	9/15/1999	XX	SW-1826-36418					5.7				
XX	12/2/1999	XX	SW-1827-36486					6.9				
XX	3/28/2000	XX	SW-1828-36613					3.5				
XX	6/13/2000	XX	SW-1829-36690					4.8				
XX	9/13/2000	XX	SW-1830-36782					6.3				
XX	6/19/2001	XX	SW-1831-37061					8				
XX	9/11/2001	XX	SW-1832-37145					5.8				
XX	12/12/2001	XX	SW-1833-37237					6.9				
XX	3/14/2002	XX	SW-1834-37329					5.3				
XX	6/18/2002	XX	SW-1835-37425					6.4				
XX	9/19/2002	XX	SW-1836-37518					6.2				
XX	6/26/2003	XX	SW-1837-37798					8.9				
XX	9/18/2003	XD	SW-1D37882					12				
XX	9/18/2003	XX	SW-1N37882					12				
XX	5/3/2004	XX	SWXX1X018	2.6				8.1				
XX	7/27/2004	XX	SWXX1X04E	2				4.4				
XX	10/26/2004	XX	SWXX1X069	1.7				4.6				
XX	5/10/2005	XX	SWXX1X12A	0.002 U	0.2 J			6.8				
XX	7/28/2005	XX	SWXX1X15I	0.002 J	2.4			6.4				
XX	9/20/2005	XX	SWXX1X18G	0.004 J	5			5.4				
XX	5/24/2006	XX	SWXX1X1DB	0.003 J	1.4			8.4				
XD	7/26/2006	XD	SWDP2X1GE	0.002 U	0.6			4.2				
XX	7/26/2006	XX	SWXX1X1G8	0.002 U	0.5			4.1				
XX	9/13/2006	XX	SWXX1X1J1	0.002 J	2.7			10.6				
XX	5/15/2007	XX	SWXX1X228	0.002 J	0.5			6.5				
XD	5/15/2007	XD	SWDP2X22E	0.002 U	0.5			7.1				
XD	7/24/2007	XD	SWDP2X26I	0.002 U	0.5			7.5				
XX	7/24/2007	XX	SWXX1X26C	0.002 U	0.6			7.6				
XX	9/11/2007	XX	SWXX1X292	0.003 J	1			6.2				
XD	5/21/2008	XD	SWDP2X2D2	0.003 U	0.6			6.8				
XX	5/21/2008	XX	SWXX1X2CG	0.003 U	0.6			6.7				
XX	7/29/2008	XX	SWXX1X2G0	1	1			1				
XX	10/28/2008	XX	SWXX1X2IA	0.002 U	0.4			3.8				

SUMMARY REPORT  
 Metal (part 2 of 2)

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

(SW-1)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
XX	4/14/2009	XX	SWXX1X311	0.002 U	0.8			7.1				
XX	7/7/2009	XX	SWXX1X362	0.002 U	0.1 J			5.3				
XX	10/27/2009	XX	SWXX1X3DH	0.002 U	0.2 J			3.6				
XX	4/28/2010	XX	SWXX1X3IG	0.002 U	0.5			5.3				
XX	7/20/2010	XX	SWXX1X420	0.01	2.9			8.4				
XX	10/19/2010	XX	SWXX1X454	0.002 U	0.2 J			5.4				
XX	4/26/2011	XX	SWXX1X465	0.004 J	0.5			5				
XX	7/19/2011	XX	SWXX1X4D3	0.005	1.5			8.4				
XX	10/25/2011	XX	SWXX1X4GI	0.002 U	0.3			4.5				
XX	4/24/2012	XX	SWXX1X518	0.005 U	1			5.1				
XX	7/24/2012	XX	SWXX1X567	0.005 U	0.8			5				
XX	10/23/2012	XX	SWXX1X5CI	0.005 U	1.1			4.1				

SW-2

XX	11/13/1990	XX	SW-233190					2			0.02 U	
XX	2/20/1991	XX	SW-233289					4.1			0.02 U	
XD	2/20/1991	XD	SW-2XD33289					3.7			0.02 U	
XX	6/4/1991	XX	SW-233393					3			0.02 U	
XX	9/17/1991	XX	SW-233488					1 U			0.02 U	
XX	12/18/1991	XX	SWXX2X00C					2.4			0.02 U	
XD	3/2/1992	XD	SWXX2X4A0					4			0.02 U	
XX	3/2/1992	XX	SWXX2X01A					5			0.02 U	
XX	6/23/1992	XX	SWXX2X025					5			0.02 U	
XX	8/17/1992	XX	SWXX2X034					5		0.05		
XX	1/26/1993	XX	SWXX2X040					6			0.02 U	
XD	1/27/1993	XD	SWXX2X4A5					6			0.02 U	
XX	4/27/1993	XX	SWXX2X04A					5		0.03		
XX	7/21/1993	XX	SWXX2X052					5			0.02 U	
XX	10/13/1993	XX	SWXX2X06B					4			0.02 U	
XX	1/11/1994	XX	SWXX2X077					8			0.02 U	
XX	5/21/1996	XX	SWXX2X06G					2.3			0.02 U	
XX	11/25/1996	XX	SWXX2X0A1					3.8			0.02 U	
XD	11/25/1996	XD	SWDP2X0AG					3.8				
XX	3/26/1997	XX	SW-2818-35515					5.7				
XX	6/4/1997	XX	SW-2819-35565					7.4				
XX	9/11/1997	XX	SW-2820-35664					4.1				
XX	12/8/1997	XX	SW-2821-35772					3.7				
XX	3/25/1998	XX	SW-2822-35879					5.3				
XX	6/9/1998	XX	SW-2823-35965					6.5				
XX	9/10/1998	XX	SW-2824-36048					8.3				
XX	12/15/1998	XX	SW-2825-36144					4.6				
XX	3/30/1999	XX	SW-2826-36249					3.5				
XX	6/9/1999	XX	SW-2827-36320					5.4				
XX	9/15/1999	XX	SW-2828-36418					5.7				
XX	12/2/1999	XX	SW-2829-36496					5				
XX	3/28/2000	XX	SW-2830-36613					3.2				
XX	6/13/2000	XX	SW-2831-36690					5.7				
XX	9/13/2000	XX	SW-2832-36782					5.4				
XX	12/12/2000	XX	SW-2833-36872					1.7				
XX	6/19/2001	XX	SW-2834-37061					5.6				

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 Metal (part 2 of 2)

Page 31 of 34  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(SW-2)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
	9/11/2001	XX	SW-2835-37145					5.8				
	12/12/2001	XX	SW-2836-37237					4.4				
	3/14/2002	XX	SW-2837-37329					6				
	6/18/2002	XX	SW-2838-37425					6.2				
	9/19/2002	XX	SW-2839-37518					7.6				
	12/10/2002	XX	SW-2840-37600					7.6				
	3/26/2003	XX	SW-2N37706					14				
	6/26/2003	XX	SW-2N37788					8.9				
	9/18/2003	XX	SW-2N37882					14				
	5/3/2004	XX	SWXX2X019		0.9			7.3				
	7/27/2004	XX	SWXX2X04F		0.5			4.9				
	7/27/2004	XX	SWDP2X050		0.7			4.9				
	10/26/2004	XX	SWXX2X06A		0.4			6.1				
	5/10/2005	XD	SWDP2X12G	0.002 U	0.3			7.6				
	5/10/2005	XX	SWXX2X12B	0.002 U	0.3			7.5				
	7/28/2005	XX	SWXX2X15J	0.002 U	0.6			4.2				
	9/20/2005	XX	SWXX2X18H	0.002 U	0.3			4.6				
	5/24/2006	XD	SWDP2X1DH	0.002 U	0.4			7.2				
	5/24/2006	XX	SWXX2X1DC	0.002 U	0.3			7.1				
	7/26/2006	XX	SWXX2X1G9	0.002 U	0.5			3.9				
	9/13/2006	XX	SWXX2X1J2	0.002 J	0.3			4.9				
	9/13/2006	XD	SWDP2X1I7	0.002 U	0.4			5				
	5/15/2007	XX	SWXX2X229	0.003 J	0.3			6.4				
	7/24/2007	XX	SWXX2X26D	0.002 U	0.6			6.9				
	9/11/2007	XX	SWXX2X283	0.002 U	1.4			5.3				
	9/11/2007	XD	SWDP2X298	0.002 U	1.4			5.3				
	5/21/2008	XX	SWXX2X2CH	0.003 U	0.8			7				
	7/29/2008	XX	SWXX2X2G1	0.002 U	0.6			5.5				
	10/28/2008	XD	SWDP2X2IG	0.002 U	0.4			3.4				
	10/28/2008	XX	SWXX2X2IB	0.002 U	0.3			3.3				
	4/14/2009	XX	SWXX2X31J	0.002 U	0.6			5.7				
	7/7/2009	XX	SWXX2X363	0.002 U	0.1 U			5.2				
	7/7/2009	XD	SWDP2X368	0.002 U	0.1 J			4.8				
	10/27/2009	XX	SWXX2X3DI	0.006	0.3			3.5				
	4/28/2010	XD	SWDP2X3J2	0.002 U	0.5			5.4				
	4/28/2010	XX	SWXX2X3IH	0.002 U	0.5			5.3				
	7/20/2010	XD	SWDP2X426	0.002 U	0.5			4.1				
	7/20/2010	XX	SWXX2X42I	0.002 U	0.6			4.1				
	10/19/2010	XD	SWDP2X45A	0.002 U	0.1 J			5.5				
	10/19/2010	XX	SWXX2X455	0.002 U	0.1 J			5.6				
	4/26/2011	XD	SWDP2X488	0.002 J	0.3			5.4				
	4/26/2011	XX	SWXX2X486	0.003 J	0.4			5.7				
	7/19/2011	XX	SWXX2X4D4	0.003 J	0.6			4.4				
	7/19/2011	XD	SWDP2X4D9	0.003 J	0.6			4.2				
	10/25/2011	XX	SWXX2X4GJ	0.002 U	0.2 J			4.8				
	10/25/2011	XD	SWDP2X4H4	0.002 U	0.2 J			4.9				
	4/24/2012	XX	SWXX2X519	0.005 U	1.2			11.1				
	4/24/2012	XD	SWDP2X51E	0.005 U	1.2			11.3				
	7/24/2012	XX	SWXX2X568	0.005 U	0.3			4.1				
	10/23/2012	XX	SWXX2X5CJ	0.005 U	0.9			2.9				

SUMMARY REPORT  
 Metal (part 2 of 2)

(SW-2)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
	10/23/2012	XD	SWDP2X5D4	0.005 U	0.9			2.8				
<b>SW-3</b>												
	5/26/1994	XX	SWXX3X078					4			0.02 U	
	8/8/1994	XX	SWXX3X07G					3			0.02 U	
	11/15/1994	XX	SWXX3X080					3			0.02 U	
	2/7/1995	XX	SWXX3X084					4			0.02 U	
	5/24/1995	XX	SWXX3X088					4			0.02 U	
	8/16/1995	XX	SWXX3X08C					4			0.02 U	
	11/30/1995	XX	SWXX3X08G					3.5			0.025 U	
	2/27/1996	XX	SWXX3X090					5.1			0.025 U	
	5/21/1996	XX	SWXX3X0A0					3.1			0.02 U	
	11/25/1996	XX	SWXX3X0AJ					3.5				
	3/26/1997	XX	SW-3819-35515					F				
	6/4/1997	XX	SW-3820-35585					5.6				
	9/11/1997	XX	SW-3821-35684					4				
	12/8/1997	XX	SW-3822-35772					4.4				
	3/26/1998	XX	SW-3823-35880					5				
	6/9/1998	XX	SW-3824-35955					4.4				
	9/10/1998	XX	SW-3825-36048					6.9				
	12/15/1998	XX	SW-3826-36144					4.7				
	3/30/1999	XX	SW-3827-36249					2.5				
	6/9/1999	XX	SW-3828-36320					4.6				
	9/15/1999	XX	SW-3829-36418					4.8				
	12/2/1999	XX	SW-3830-36496					3.7				
	3/28/2000	XX	SW-3831-36613					7.9				
	6/13/2000	XX	SW-3832-36690					3.9				
	9/13/2000	XX	SW-3833-36782					5.1				
	6/19/2001	XX	SW-3834-37061					4.6				
	9/1/2001	XX	SW-3835-37145					5.4				
	12/12/2001	XX	SW-3836-37237					5.7				
	3/14/2002	XX	SW-3837-37329					5.6				
	6/18/2002	XX	SW-3838-37425					5.6				
	9/19/2002	XX	SW-3839-37518					7.1				
	12/10/2002	XX	SW-3840-37600					9.3				
	6/26/2003	XX	SW-3N37798					5.1				
	9/18/2003	XX	SW-3N37882					6.2				
	5/3/2004	XX	SWXX3X01A		1.1			6.3				
	5/3/2004	XD	SWDP2X01E		1.1			6.6				
	7/27/2004	XX	SWXX3X04G		0.9			5				
	10/26/2004	XX	SWXX3X06B		1.6			3.6				
	10/26/2004	XD	SWDP2X06F		1.6			3.6				
	5/10/2005	XX	SWXX3X12C	0.002 U	0.4			4.9				
	7/28/2005	XD	SWDP2X164	0.002 U	1			5.3				
	7/28/2005	XX	SWXX3X160	0.002 U	1			5.2				
	9/20/2005	XX	SWXX3X181	0.002 U	1.4			4				
	9/20/2005	XD	SWDP2X192	0.002 U	1.2			4.3				
	5/24/2006	XX	SWXX3X1DD	0.002 U	0.8			5.1				
	7/26/2006	XX	SWXX3X1GA	0.002 U	0.6			3.2				
	9/13/2006	XX	SWXX3X1J3	0.002 U	0.7			4.4				

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Metal (part 2 of 2)**

Page 33 of 34  
 SEVIE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(SW-3)	Date	Type	Sample ID	Nickel mg/L	Potassium mg/L	Selenium mg/L	Silver mg/L	Sodium mg/L	Thallium mg/L	Vanadium mg/L	Zinc mg/L	Tin mg/L
	5/15/2007	XX	SWXX322A	0.002 J	0.8			2.9				
	7/24/2007	XX	SWXX326E	0.002 U	0.7			5				
	9/11/2007	XX	SWXX3294	0.002 U	1.5			5.2				
	5/21/2008	XX	SWXX32CI	0.003 J	0.6			5.8				
	7/29/2008	XX	SWXX32G2	0.002 U	0.4			4.8				
	10/28/2008	XX	SWXX32IC	0.002 U	0.5			3.8				
	4/14/2009	XX	SWXX3320	0.002 U	0.5			6.3				
	7/7/2009	XX	SWXX3364	0.002 U	0.2 J			3.9				
	10/27/2009	XX	SWXX33DJ	0.002 U	0.4			2.9				
	4/28/2010	XX	SWXX33II	0.002 U	0.5			4.9				
	7/20/2010	XX	SWXX3422	0.002 U	0.4			3.6				
	10/19/2010	XX	SWXX3456	0.002 U	0.4			4.4				
	4/26/2011	XX	SWXX3487	0.003 J	0.4			5.5				
	7/19/2011	XX	SWXX34D5	0.003 J	0.2 J			4.3				
	10/25/2011	XX	SWXX34H0	0.002 U	0.4			4.1				
	4/24/2012	XX	SWXX351A	0.005 U	0.7			2.9				
	7/24/2012	XD	SWDP256D	0.005 U	0.5			5.2				
	7/24/2012	XX	SWXX3569	0.005 U	0.5			5.4				
	10/23/2012	XX	SWXX35D0	0.005 U	0.7			2.4				
<b>SW-DP1</b>												
	5/3/2004	XX	SWDP1X01H		25			17				
	7/27/2004	XX	SWDP1X053		19			25				
	10/26/2004	XX	SWDP1X06H		4.7			6.3				
	5/10/2005	XX	SWDP1X12I	0.003 J	3.7			3.7				
	7/28/2005	XX	SWDP1X166	0.002 U	2.7			3.1				
	9/20/2005	XX	SWDP1X194	0.002 J	3.7			4.5				
	5/24/2006	XX	SWDP1X1DJ	0.002 J	3.8			6.7				
	7/26/2006	XX	SWDP1X1GG	0.003 J	3.1			9				
	9/13/2006	XX	SWDP1X1J9	0.002 U	2.6			5.3				
	5/15/2007	XX	SWDP1X22G	0.002 J	2.8			6.5				
	7/24/2007	XX	SWDP1X270	0.002 U	2.1			4.2				
	9/11/2007	XX	SWDP1X28A	0.002 U	1.7			3.3				
	5/21/2008	XX	SWDP1X2D4	0.003 U	1.2			6.6				
	7/29/2008	XX	SWDP1X2G8	0.002 U	1.5			3.5				
	10/28/2008	XX	SWDP1X2II	0.002 U	1.8			4.4				
	4/14/2009	XX	SWDP1X326	0.002 U	1.9			5.6				
	7/7/2009	XX	SWDP1X36A	0.002 U	1.1			2.6				
	10/27/2009	XX	SWDP1X3E5	0.002 U	1.8			2.9				
	4/28/2010	XX	SWDP1X3J4	0.002 U	1.7			5.4				
	7/20/2010	XX	SWDP1X428	0.002 U	0.4			2.3				
	10/19/2010	XX	SWDP1X45C	0.002 U	1.4			2.8				
	4/26/2011	XX	SWDP1X49D	0.003 J	1.4			3.1				
	7/19/2011	XX	SWDP1X4DB	0.002 U	1.7			3				
	10/25/2011	XX	SWDP1X4H6	0.002 U	1.5			1.9				
	4/24/2012	XX	SWDP1X51G	0.005	1.9			2.1				
	7/24/2012	XX	SWDP1X56F	0.005 U	2.4			3.6				
	10/23/2012	XX	SWDP1X5D6	0.005 U	1.3			1.2				
<b>SW-DP6</b>												

**SUMMARY REPORT**  
**Metal (part 2 of 2)**

REPORT PREPARED: 1/17/2013 13:57  
 FOR: Juniper Ridge Landfill

(SW-DP6)		Nickel	Potassium	Selenium	Silver	Sodium	Thallium	Vanadium	Zinc	Tin
Date		Type	Sample ID	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
10/27/2009	XX	SWDP6X3G6	2.1			2.5				
4/28/2010	XX	SWDP6X3J5	1.5			6.3				
7/20/2010	XX	SWDP6X4Z9	2.9			6.7				
10/19/2010	XX	SWDP6X45D	2.3			3.4				
4/26/2011	XX	SWDP6X49E	1.9			6.4				
7/19/2011	XX	SWDP6X4DC	3.2			7.5				
10/25/2011	XX	SWDP6X4H7	2.4			6				
4/24/2012	XX	SWDP6X51H	1.6			3.8				
7/24/2012	XX	SWDP6X56G	3.4			2.2				
10/23/2012	XX	SWDP6X5D7	1.9			1.4				

**Notes:**  
 TYPE - Sample Type Qualifier where D = Duplicate Sample.  
 Blank Cells appear when a parameter was not analyzed.

**Concentration Qualifier Notes:**

- ! - The sampling location was damaged or destroyed.
- D - The sampling location was dry.
- DE - Decommissioned Location
- F - The sampling location was frozen.
- F12 - Pipe under water, no sample taken.
- F6 - No flow. Sample not taken.
- H2 - Waterlevel higher than pipes. See LF-COMP for readings
- I - The sampling location yielded insufficient quantity to collect a sample.
- J - Analyte was positively identified/Associated value is an estimate below reporting limit.
- U - Not Detected above the reported sample detection limit.

SUMMARY REPORT  
 VOA (part 1 of 4)

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Dibromomethane	Dibromochloro	Chloromethane	Chloroform	Chloroethane	Chlorobenzene	Carbon	Bromomethane	Bromoform	Bromodichloro	Bromochlorome	Benzene	Dichlorobenzen	1,2-	1,2-	1,2-Dibromo-3-
			ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	Tetrachloride	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
7/26/2004	XX	GWXXXX041	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
9/20/2005	XX	GWXXXX1A4	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/22/2006	XX	GWXXXX1EJ	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/14/2007	XX	GWXXXX23G	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/19/2008	XX	GWXXXX2E4	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
4/13/2009	XX	GWXXXX336	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
4/26/2010	XX	GWXXXX404	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	1U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/25/2011	XX	GWXXXX4AD	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	1U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/25/2012	XX	GWXXXX62G	1U	1U	1U	1U	1U	1U	1U	2U	1U	1U	1U	1U	1U	1U	1U	1U

LF-COMP

4/24/2012	XX	LFXXXX63B	1U	2U	1U													
-----------	----	-----------	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----

LF-UD-1

7/28/2004	XX	LFUD1X05E	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U						
9/21/2005	XX	LFUD1X19D	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U						
5/24/2006	XX	LFUD1X1E8	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U						
5/16/2007	XX	LFUD1X235	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U						
5/20/2008	XX	LFUD1X2DD	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U						
4/15/2009	XX	LFUD1X32F	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U						
4/27/2010	XX	LFUD1X3JD	0.5U	1U	0.5U													
4/26/2011	XX	LFUD1X4A2	0.5U	1U	0.5U													
4/24/2012	XX	LFUD1X625	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2						

LF-UD-2

7/28/2004	XX	LFUD2X06F	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U						
9/21/2005	XX	LFUD2X19E	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U						
5/24/2006	XX	LFUD2X1E9	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U						
5/16/2007	XX	LFUD2X236	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U						
5/20/2008	XX	LFUD2X2DE	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U						
4/15/2009	XX	LFUD2X32G	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U						
4/27/2010	XX	LFUD2X3JE	0.5U	1U	0.5U													
4/26/2011	XX	LFUD2X4A3	0.5U	1U	0.5U													
4/24/2012	XX	LFUD2X626	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2						

LF-UD-3A,B

5/16/2007	XX	LFUD3X246	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U						
5/20/2008	XX	LFUD3X2EE	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U						
4/15/2009	XX	LFXXXX33F	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U						
4/27/2010	XX	LFXXXX40C	0.5U	1U	0.5U													
4/26/2011	XX	LFXXXX4B1	0.5U	1U	0.5U													
4/24/2012	XX	LFXXXX634	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2						

LF-UD-4

4/15/2009	XX	LFXXXX34A	1U															
4/27/2010	XX	LFXXXX40E	F6															
4/26/2011	XX	LFXXXX4B3	F12															
4/24/2012	XX	LFXXXX636	H2															

LF-UD-5

4/15/2009	XX	LFXXXX34A	1U															
4/27/2010	XX	LFXXXX40E	F6															
4/26/2011	XX	LFXXXX4B3	F12															
4/24/2012	XX	LFXXXX636	H2															

**SUMMARY REPORT**  
**VOA (part 1 of 4)**

Date	Type	Sample ID	Dibromomethane	Dibromochloro	Chloromethane	Chloroform	Chloroethane	Chlorobenzene	Carbon	Bromomethane	Bromoform	Bromodichloro	Bromochloro	Benzene	1,2-	1,2-	1,2-Dibromo-3-	
			ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
4/27/2010	XX	LFXXX40F	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	1 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
<b>LF-UD-Sand6</b>																		
4/26/2011	XX	LFXXX4B4	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	1 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
4/24/2012	XX	LFXXX537	1 U	1 U	1 U	1 U	1 U	1 U	1 U	2 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	
<b>LF-UD-6</b>																		
4/26/2011	XX	LFUD64B6	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	1 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
4/24/2012	XX	LFUD6539	1 U	1 U	1 U	1 U	1 U	1 U	1 U	2 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	
<b>LF-UD-7</b>																		
4/24/2012	XX	LFUD753A	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	
<b>LP-LD-1</b>																		
7/28/2004	XX	LPUD1X05I	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	
9/21/2005	XX	LPUD1X19H	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	
5/24/2006	XX	LPUD1X1EC	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	
5/16/2007	XX	LPUD1X239	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	
5/20/2008	XX	LPUD1X2DH	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	
4/15/2009	XX	LPUD1X32J	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	
<b>LP-UD-1</b>																		
7/28/2004	XX	LPUD1X05G	D	D	D	D	D	D	D	D	D	D	D	D	D	D	D	
9/21/2005	XX	LPUD1X19F	D	D	D	D	D	D	D	D	D	D	D	D	D	D	D	
5/24/2006	XX	LPUD1X1EA	D	D	D	D	D	D	D	D	D	D	D	D	D	D	D	
5/16/2007	XX	LPUD1X237	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	
5/20/2008	XX	LPUD1X2DF	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	
4/15/2009	XX	LPUD1X32H	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	
4/27/2010	XX	LPUD1X3JF	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	
4/26/2011	XX	LPUD1X44A	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	
4/24/2012	XX	LPUD1X527	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	
<b>LP-UD-2</b>																		
7/28/2004	XX	LPUD2X05H	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	
9/21/2005	XX	LPUD2X19G	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	
5/24/2006	XX	LPUD2X1EB	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	
5/16/2007	XX	LPUD2X238	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	
5/20/2008	XX	LPUD2X2DG	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	
4/15/2009	XX	LPUD2X32I	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	
4/27/2010	XX	LPUD2X3JG	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	1 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
4/26/2011	XX	LPUD2X445	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	1 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
4/24/2012	XX	LPUD2X528	1 U	1 U	1 U	1 U	1 U	1 U	1 U	2 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	
<b>LT-C4L</b>																		
4/15/2009	XX	LTC4LX325	50 U	50 U	50 U	50 U	50 U	50 U	50 U	50 U	50 U	50 U	50 U	50 U	28 U	50 U	50 U	
7/7/2009	XX	LTC4LX369	25 U	25 U	25 U	25 U	25 U	25 U	25 U	25 U	25 U	25 U	25 U	25 U	25 U	25 U	25 U	
10/28/2009	XX	LTC4LX3EA	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	
4/28/2010	XX	LTC4LX3J3	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	5 U	2.5 U	2.5 U	2.5 U	4.4 J	2.5 U	2.5 U	2.5 U	
7/20/2010	XX	LTC4LX427	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	5 U	2.5 U	2.5 U	2.5 U	4.6 J	2.5 U	2.5 U	2.5 U	
10/19/2010	XX	LTC4LX45B	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	1 U	0.72 J	0.5 U	0.5 U	5	0.5 U	0.5 U	0.5 U	
4/27/2011	XX	LTC4LX46C	5 U	5 U	5 U	5 U	5 U	5 U	5 U	10 U	5 U	5 U	5 U	5 U	2 U	5 U	5 U	
7/19/2011	XX	LTC4LX4DA	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	1 U	0.5 U	0.5 U	0.5 U	3.2	0.5 U	0.5 U	0.5 U	

**SUMMARY REPORT**  
**VOA (part 1 of 4)**

(LT-C4L)		Dibromomethane	Dibromochloro methane	Chloromethane	Chloroform	Chloroethane	Chlorobenzene	Carbon Tetrachloride	Bromomethane	Bromoform	Bromodichloro methane	Bromochloroethane	Benzene	Dichlorobenzene	1,2-Dibromo-3-Chloropropane
Date	Type	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
10/26/2011	XX	LTC4LXH5	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	1 U	0.5 U	0.5 U	0.5 U	4.6	0.5 U	0.5 U
4/24/2012	XX	LTC4LX5IF	5 U	5 U	5 U	5 U	5 U	5 U	10 U	5 U	5 U	5 U	5 U	5 U	5 U
7/24/2012	XX	LTC4LX5BE	5 U	5 U	5 U	5 U	5 U	5 U	10 U	5 U	5 U	5 U	5 U	5 U	5 U
10/23/2012	XX	LTC4LX5D5	25 U	25 U	25 U	25 U	25 U	25 U	50 U	25 U	25 U	25 U	25 U	25 U	25 U
<b>MW04-102</b>															
1/18/2005	XX	GW102X10C	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
3/21/2005	XX	GW102X144	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
7/25/2005	XX	GW102X171	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
9/20/2005	XX	GW102X1A9	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
<b>MW04-105</b>															
1/17/2005	XX	GW105X10F	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
3/21/2005	XX	GW105X147	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
7/25/2005	XX	GW105X181	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
9/20/2005	XX	GW105X1AC	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
<b>MW04-109</b>															
1/19/2005	XD	GWDP1X110	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
1/19/2005	XX	GW109X10I	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
3/23/2005	XX	GW109X14A	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
7/26/2005	XD	GWDP5X186	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
7/26/2005	XX	GW109X184	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
9/20/2005	XD	GWDP5X1AH	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
9/20/2005	XX	GW109X1AF	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
<b>MW-204</b>															
5/4/2004	XX	GW204X008	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
7/27/2004	XX	GW204X03G	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
9/20/2005	XX	GW204X1A0	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
5/23/2006	XX	GW204X1EF	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
5/14/2007	XX	GW204X23C	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
5/21/2008	XX	GW204X2E0	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
4/13/2009	XX	GW204X332	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U
4/28/2010	XX	GW204X400	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	1 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/26/2011	XX	GW204X4A9	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	1 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/24/2012	XX	GW204X52C	1 U	1 U	1 U	1 U	1 U	1 U	2 U	1 U	1 U	1 U	1 U	1 U	1 U
<b>MW-207</b>															
7/28/2004	XX	GW207X048	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
<b>MW-206</b>															
7/28/2004	XX	GW206X047	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
<b>MW-212</b>															
5/5/2004	XX	GW212X00B	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
7/27/2004	XX	GW212X03J	D	D	D	D	D	D	D	D	D	D	D	D	D
<b>MW-216B</b>															
7/26/2004	XX	GW216B049	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
<b>MW-223A</b>															
7/28/2004	XX	GW223A04A	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U

SUMMARY REPORT  
 VOA (part 1 of 4)

(MW-223A)		Dibromomethane	Dibromochloro methane	Chloromethane	Chloroform	Chloroethane	Chlorobenzene	Carbon Tetrachloride	Bromomethane	Bromoform	Bromodichloro methane	Bromochloroethane	Benzene	Dichlorobenzene	1,2-Dibromo-3-Chloropropane
Date	Type	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
7/28/2004	XD	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
<b>MW-223B</b>															
5/5/2004	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
7/27/2004	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
<b>MW-227</b>															
7/26/2004	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
<b>MW-301</b>															
7/26/2004	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
<b>MW-302</b>															
1/26/1993	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/6/2004	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
7/27/2004	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
<b>MW-303</b>															
5/6/2004	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
7/28/2004	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
<b>MW-304A</b>															
7/29/2004	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
10/27/2004	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
<b>MW-401A</b>															
7/29/2004	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
10/27/2004	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
<b>MW-401B</b>															
7/29/2004	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
7/29/2004	XD	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
10/27/2004	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
9/21/2005	XD	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
9/21/2005	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/23/2006	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/23/2006	XD	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/14/2007	XD	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/14/2007	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/20/2008	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/20/2008	XD	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
4/13/2009	XD	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
4/13/2009	XX	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
4/27/2010	XX	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/27/2010	XD	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/25/2011	XX	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/25/2011	XD	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/23/2012	XD	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
4/23/2012	XX	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
<b>MW-402A</b>															
7/29/2004	XX	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U

**SUMMARY REPORT**  
**VOA (part 1 of 4)**

(MW-402A)	Dibromomethane	Dibromochloro methane	Chloromethane	Chloroform	Chloroethane	Chlorobenzene	Carbon Tetrachloride	Bromomethane	Bromoform	Bromodichloro methane	Bromochloroethane	Benzene	Dichlorobenzene	1,2-Dibromo-3-Chloropropane
Date	Type	Sample ID	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
10/27/2004	XX	GW402A073	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
<b>MW-402B</b>														
7/29/2004	XX	GW402B05C	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
10/27/2004	XX	GW402B074	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
<b>P-04-02</b>														
7/26/2004	XX	GWXXXX042	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
9/22/2005	XX	GWXXXX1A5	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/22/2006	XX	GWXXXX1F0	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/14/2007	XX	GWXXXX23H	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/21/2008	XX	GWXXXX2E5	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
4/13/2009	XX	GWXXXX337	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
4/26/2010	XX	GWXXXX405	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/27/2011	XX	GWXXXX4AE	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/25/2012	XX	GWXXXX62H	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
<b>P-04-04</b>														
7/26/2004	XX	GWXXXX043	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/22/2006	XX	GWXXXX1F1	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
<b>SW-1</b>														
7/27/2004	XX	SWXX1X04E	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
<b>SW-2</b>														
7/27/2004	XX	SWXX2X04F	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
7/27/2004	XD	SWDP2X050	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
<b>SW-3</b>														
7/27/2004	XX	SWXX3X04G	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
<b>SW-DP1</b>														
7/27/2004	XX	SWDP1X053	2U	2U	2	2U	2U	2U	2U	2U	2U	2U	2U	2U
<b>QCBT</b>														
5/4/2004	XX	BTXXXX00H	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
6/9/2004	XX	BTXXXX035	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
7/26/2004	XX	BTXXXX046	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
10/27/2004	XX	BTXXXX060	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
1/17/2005	XX	BTXXXX111	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
3/9/2005	XX	BTXXXX11E	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
3/21/2005	XX	BTXXXX142	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/11/2005	XX	BTXXXX121	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
7/25/2005	XX	BTXXXX17G	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
7/27/2005	XX	BTXXXX187	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
9/20/2005	XX	BTXXXX1A7	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
9/21/2005	XX	BTXXXX1A1	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
9/22/2005	XX	BTXXXX1AJ	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
4/19/2006	XX	BTXXXX1FE	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/22/2006	XX	BTXXXX1F2	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/23/2006	XX	BTXXXX1FD	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/24/2006	XX	BTXXXX1ID	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U

SUMMARY REPORT  
 VOA (part 1 of 4)

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(QCBT)	Dibromomethane	Dibromochloro methane	Chloromethane	Chloroform	Chloroethane	Chlorobenzene	Carbon Tetrachloride	Bromomethane	Bromoform	Bromodichloro methane	Bromochloroethane	Benzene	1,2-Dichlorobenzene	1,2-Dibromo-3-Chloropropane
Date	Type	Sample ID	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
7/25/2006	XX	BTXXXX1HU	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
9/13/2006	XX	BTXXXX29C	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/14/2007	XX	BTXXXX23J	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/15/2007	XX	BTXXXX244	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/16/2007	XX	BTXXXX245	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
7/24/2007	XX	BTXXXX283	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
9/11/2007	XX	BTXXXX2AD	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/19/2008	XX	BTXXXX2EC	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/21/2008	XX	BTXXXX2ED	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
7/29/2008	XX	BTXXXX2HB	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
10/29/2008	XX	BTXXXX301	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
4/13/2009	XX	BTXXXX33D	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
4/15/2009	XX	BTXXXX33E	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
7/17/2009	XX	BTXXXX37H	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
10/28/2009	XX	BTXXXX3AJ	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
4/26/2010	XX	BTXXXX40A	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/27/2010	XX	BTXXXX40B	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/28/2010	XX	BTXXXX4G1	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
7/20/2010	XX	BTXXXX43F	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
10/19/2010	XX	BTXXXX46I	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/25/2011	XX	BTXXXX4AJ	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/26/2011	XX	BTXXXX480	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/27/2011	XX	BTXXXX485	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
7/19/2011	XX	BTXXXX4F3	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
10/26/2011	XX	BTXXXX498	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/23/2012	XX	BTXXXX532	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
4/24/2012	XX	BTXXXX533	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
4/25/2012	XX	BTXXXX538	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
7/24/2012	XX	BTXXXX585	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
10/23/2012	XX	BTXXXX568	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U

Notes: TYPE - Sample Type Qualifier where D = Duplicate Sample.

Blank Cells appear when a parameter was not analyzed.

Concentration Qualifier Notes:

- D - The sampling location was dry.
- F12 - Pipe under water, no sample taken.
- F6 - No flow. Sample not taken.
- H2 - Waterlevel higher than pipes. See LF-COMP for readings
- J - Analyte was positively identified/Associated value is an estimate below reporting limit.
- U - Not Detected above the reported sample detection limit.

SUMMARY REPORT  
 VOA (part 2 of 4)

Date	Type	Sample ID	trans-1,3-Dichloropropene	trans-1,2-Dichloroethene	Styrene	Methylene Chloride	Methyl Ethyl Ketone	Ethylbenzene	cis-1,3-Dichloropropene	cis-1,2-Dichloroethene	Carbon Disulfide	Acetone	1,4-Dichlorobenzene	1,2-Dichloropropane	1,2-Dichloroethane	1,1,1-Dichloroethane	ug/L	
			ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
<b>DP-4</b>																		
7/26/2004	XX	GWXXXX041	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
9/20/2005	XX	GWXXXX1A4	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/22/2006	XX	GWXXXX1EJ	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/14/2007	XX	GWXXXX236	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/19/2008	XX	GWXXXX2E4	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
4/13/2009	XX	GWXXXX336	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	1 U
4/26/2010	XX	GWXXXX404	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/25/2011	XX	GWXXXX4AD	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/25/2012	XX	GWXXXX52G	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	1 U
<b>LF-COMP</b>																		
4/24/2012	XX	LFXXXX53B	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	1 U
<b>LF-UD-1</b>																		
7/28/2004	XX	LFUD1X08E	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
9/21/2005	XX	LFUD1X19D	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/24/2006	XX	LFUD1X1E8	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/16/2007	XX	LFUD1X235	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/20/2008	XX	LFUD1X2DD	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
4/15/2009	XX	LFUD1X32F	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	1 U
4/27/2010	XX	LFUD1X3JD	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/26/2011	XX	LFUD1X4A2	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/24/2012	XX	LFUD1X525	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2
<b>LF-UD-2</b>																		
7/28/2004	XX	LFUD2X06F	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
9/21/2005	XX	LFUD2X19E	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/24/2006	XX	LFUD2X1E9	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/16/2007	XX	LFUD2X236	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/20/2008	XX	LFUD2X2DE	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
4/15/2009	XX	LFUD2X32G	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	1 U
4/27/2010	XX	LFUD2X3JE	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/26/2011	XX	LFUD2X4A3	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/24/2012	XX	LFUD2X528	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2
<b>LF-UD-3A,B</b>																		
5/16/2007	XX	LFUD3X246	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/20/2008	XX	LFUD3X2EE	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
4/15/2009	XX	LFXXXX33F	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	1 U
4/27/2010	XX	LFXXXX40C	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/26/2011	XX	LFXXXX4B1	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/24/2012	XX	LFXXXX534	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2
<b>LF-UD-4</b>																		
4/15/2008	XX	LFXXXX34A	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	1 U
4/27/2010	XX	LFXXXX40E	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6
4/26/2011	XX	LFXXXX4B3	F12	F12	F12	F12	F12	F12	F12	F12	F12	F12	F12	F12	F12	F12	F12	F12
4/24/2012	XX	LFXXXX536	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2
<b>LF-UD-5</b>																		

**SUMMARY REPORT**  
**VOA (part 2 of 4)**

Page 2 of 6  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	trans-1,3- Dichloropropen	trans-1,2- Dichloroethene	Styrene	Methylene Chloride	Methyl Ethyl Ketone	Ethylbenzene	cis-1,3- Dichloropropen	cis-1,2- Dichloroethene	Carbon Disulfide	Acetone	1,4- Dichlorobenzene	1,2- Dichloropropan	1,2- Dichloroethane	1,1- Dichloroethane	1,1- Dichloroethane	
			ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
4/27/2010	XX	LFXXX40F	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
<b>LF-UD-Sand6</b>																		
4/26/2011	XX	LFXXX4B4	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
4/24/2012	XX	LFXXX637	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	
<b>LF-UD-6</b>																		
4/26/2011	XX	LFUD6X4B6	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
4/24/2012	XX	LFUD6X539	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	
<b>LF-UD-7</b>																		
4/24/2012	XX	LFUD7X53A	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	
<b>LP-LD-1</b>																		
7/28/2004	XX	LPD1X051	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
9/21/2005	XX	LPD1X19H	2 U	2 U	2 U	5 U	16	2 U	2 U	2 U	2 U	15	2 U	2 U	2 U	2 U	2 U	
5/24/2006	XX	LPD1X1EC	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
5/16/2007	XX	LPD1X239	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
5/20/2008	XX	LPD1X2DH	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
4/15/2009	XX	LPD1X32J	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	
<b>LP-UD-1</b>																		
7/28/2004	XX	LPUDX066	D	D	D	D	D	D	D	D	D	D	D	D	D	D	D	
9/21/2005	XX	LPUDX19F	D	D	D	D	D	D	D	D	D	D	D	D	D	D	D	
5/24/2006	XX	LPUDX1EA	D	D	D	D	D	D	D	D	D	D	D	D	D	D	D	
5/16/2007	XX	LPUDX237	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	
5/20/2008	XX	LPUDX2DF	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	
4/15/2009	XX	LPUDX32H	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	
4/27/2010	XX	LPUDX3JF	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	
4/26/2011	XX	LPUDX4A4	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	
4/24/2012	XX	LPUDX527	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	
<b>LP-UD-2</b>																		
7/28/2004	XX	LPUDX06H	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
9/21/2005	XX	LPUDX19G	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
5/24/2006	XX	LPUDX1EB	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
5/16/2007	XX	LPUDX238	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
5/20/2008	XX	LPUDX2DG	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
4/15/2009	XX	LPUDX32I	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	
4/27/2010	XX	LPUDX3JG	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
4/26/2011	XX	LPUDX4A5	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
4/24/2012	XX	LPUDX528	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	
<b>LT-C4L</b>																		
4/15/2009	XX	LTC4LX325	50 U	50 U	50 U	250 U	11700	50 U	50 U	50 U	50 U	3880	28 U	50 U	50 U	50 U	50 U	
7/17/2009	XX	LTC4LX389	25 U	25 U	25 U	125 U	9080	25 U	25 U	25 U	25 U	4020	25 U	25 U	25 U	25 U	25 U	
10/28/2009	XX	LTC4LX3EA	10 U	10 U	10 U	50 U	2570	10 U	10 U	10 U	10 U	764	10 U	10 U	10 U	10 U	10 U	
4/28/2010	XX	LTC4LX3J3	2.5 U	2.5 U	2.5 U	25 U	1360	5.9	2.5 U	2.5 U	2.5 U	444	2.5 U	2.5 U	3.8 J	2.5 U	2.5 U	
7/20/2010	XX	LTC4LX427	2.5 U	2.5 U	2.5 U	25 U	25 U	2.5 U	2.5 U	2.5 U	2.5 U	365	2.5 U	2.5 U	5.8	2.5 U	2.5 U	
10/19/2010	XX	LTC4LX465	0.5 U	0.5 U	1.4 J	5 U	604	7.9	0.5 U	1.1 J	0.5 U	475	1.3	0.81 J	0.5 U	0.5 U	0.5 U	
4/27/2011	XX	LTC4LX49C	5 U	5 U	5 U	50 U	50 U	5 U	5 U	5 U	5 U	100 U	5 U	5 U	5 U	5 U	5 U	
7/19/2011	XX	LTC4LX4DA	0.5 U	0.5 U	0.5 U	5 U	12	3.8	0.5 U	0.5 U	0.5 U	136	0.89 J	0.5 U	0.5 U	0.5 U	0.5 U	

**SUMMARY REPORT**  
**VOA (part 2 of 4)**

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(LT-C4L)	Date	Type	Sample ID	trans-1,3-Dichloropropene ug/L	trans-1,2-Dichloroethene ug/L	Styrene ug/L	Methylene Chloride ug/L	Methyl Ethyl Ketone ug/L	Ethylbenzene ug/L	cis-1,3-Dichloropropene ug/L	cis-1,2-Dichloroethene ug/L	Carbon Disulfide ug/L	Acetone ug/L	1,4-Dichlorobenzene ug/L	1,2-Dichloropropane ug/L	1,2-Dichloroethane ug/L	1,1-Dichloroethane ug/L	1,1-Dichloroethane ug/L	
	10/26/2011	XX	LTC4LX4H5	0.5 U	0.5 U	1	5 U	97	6.7	0.5 U	0.7 J	0.5 U	117	1.1	0.5 U	0.5 U	0.5 U	0.5 U	
	4/24/2012	XX	LTC4LX51F	5 U	5 U	5 U	25 U	3440	5.8	5 U	5 U	5 U	974	5 U	5 U	10	5 U	5 U	
	7/24/2012	XX	LTC4LX58E	5 U	5 U	5 U	25 U	9540	5 U	5 U	5 U	25 U	2460	5 U	5 U	5 U	5 U	5 U	
	10/23/2012	XX	LTC4LX5D5	25 U	25 U	25 U	125 U	7490	25 U	25 U	25 U	25 U	2710	25 U	25 U	25 U	25 U	25 U	
<b>MW04-102</b>																			
	1/18/2005	XX	GW102X10C	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	3/21/2005	XX	GW102X144	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	7/25/2005	XX	GW102X171	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	9/20/2005	XX	GW102X1A9	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
<b>MW04-105</b>																			
	1/17/2005	XX	GW105X10F	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	3/21/2005	XX	GW105X147	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	7/25/2005	XX	GW105X181	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	9/20/2005	XX	GW105X1AC	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
<b>MW04-109</b>																			
	1/19/2005	XD	GWDP1X110	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	1/19/2005	XX	GW109X10I	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	3/23/2005	XX	GW109X14A	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	7/26/2005	XD	GWDP5X186	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	7/26/2005	XX	GW109X184	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	9/20/2005	XD	GWDP5X1AH	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	9/20/2005	XX	GW109X1AF	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
<b>MW-204</b>																			
	5/4/2004	XX	GW204X008	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	7/27/2004	XX	GW204X03G	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	9/20/2005	XX	GW204X1A0	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	5/23/2006	XX	GW204X1EF	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	5/14/2007	XX	GW204X23C	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	5/21/2008	XX	GW204X2E0	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	4/13/2009	XX	GW204X332	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	
	4/28/2010	XX	GW204X400	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
	4/26/2011	XX	GW204X4A9	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
	4/24/2012	XX	GW204X52C	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	
<b>MW-207</b>																			
	7/28/2004	XX	GW207X048	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
<b>MW-206</b>																			
	7/28/2004	XX	GW206X047	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
<b>MW-212</b>																			
	5/5/2004	XX	GW212X00B	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
	7/27/2004	XX	GW212X03J	D	D	D	D	D	D	D	D	D	D	D	D	D	D	D	
<b>MW-216B</b>																			
	7/26/2004	XX	GW216B048	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
<b>MW-223A</b>																			
	7/28/2004	XX	GW223A04A	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	

SUMMARY REPORT  
 VOA (part 2 of 4)

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-223A)	trans-1,3-Dichloropropane	trans-1,2-Dichloroethene	Styrene	Methylene Chloride	Methyl Ethyl Ketone	Ethylbenzene	cis-1,3-Dichloropropane	cis-1,2-Dichloroethene	Carbon Disulfide	Acetone	1,4-Dichlorobenzene	1,2-Dichloropropane	1,2-Dichloroethane	1,1-Dichloroethane	1,1-Dichloroethane	
Date	Type	Sample ID	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	
7/28/2004	XD	GWDP1X04D	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
<b>MW-223B</b>																
5/6/2004	XX	GW223B00A	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
7/27/2004	XX	GW223B03I	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
<b>MW-227</b>																
7/26/2004	XX	GW227X04B	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
<b>MW-301</b>																
7/26/2004	XX	GW301X04C	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
<b>MW-302</b>																
1/26/1993	XX	GW302X03H	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
5/6/2004	XX	GW302X008	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
7/27/2004	XX	GW302XHD1	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
<b>MW-303</b>																
5/6/2004	XX	GW303X00C	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
7/28/2004	XX	GW303X040	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
<b>MW-304A</b>																
7/29/2004	XX	GW304AHD0	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
10/27/2004	XX	GW304A07B	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
<b>MW-401A</b>																
7/29/2004	XX	GW401A069	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
10/27/2004	XX	GW401A071	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
10/27/2004	XD	GWDP4X075	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
<b>MW-401B</b>																
7/29/2004	XX	GW401B06A	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
7/29/2004	XD	GWDP4X05D	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
10/27/2004	XX	GW401B072	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
9/21/2005	XD	GWDP4X19C	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
9/21/2005	XX	GW401B198	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
5/23/2006	XX	GW401B1E4	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
5/23/2006	XD	GWDP4X1E7	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
5/14/2007	XD	GWDP4X234	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
5/14/2007	XX	GW401B231	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
5/20/2008	XX	GW401B2D9	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
5/20/2008	XD	GWDP4X2DC	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	
4/13/2009	XD	GWDP4X32E	1 U	1 U	5 U	10 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	
4/13/2009	XX	GW401B32B	1 U	1 U	5 U	10 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	
4/27/2010	XX	GW401B3J9	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
4/27/2010	XD	GWDP4X3JC	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
4/25/2011	XX	GW401B46I	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
4/25/2011	XD	GWDP4X4A1	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
4/23/2012	XD	GWDP4X624	1 U	1 U	5 U	10 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	
4/23/2012	XX	GW401B521	1 U	1 U	5 U	10 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U	
<b>MW-402A</b>																
7/29/2004	XX	GW402A05B	2 U	2 U	5 U	10 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U	

**SUMMARY REPORT**  
 VOA (part 2 of 4)

REPORT PREPARED: 1/18/2013 13:09  
 FOR: Juniper Ridge Landfill

Date	Type	Sample ID	trans-1,3-Dichloropropene	Styrene	Methylene Chloride	Methyl Ethyl Ketone	Ethylbenzene	cis-1,3-Dichloropropene	cis-1,2-Dichloroethene	Carbon Disulfide	Acetone	1,4-Dichlorobenzene	1,2-Dichloropropane	1,2-Dichloroethane	1,1-Dichloroethane	1,1-Dichloroethane
			ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L

10/27/2004	XX	GW402A073	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
<b>MW-402B</b>																
7/29/2004	XX	GW402B06C	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
10/27/2004	XX	GW402B074	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U

<b>P-04-02</b>																
7/26/2004	XX	GWXXXX042	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
9/22/2005	XX	GWXXXX1A5	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
5/22/2006	XX	GWXXXX1F0	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
5/14/2007	XX	GWXXXX23H	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
5/21/2008	XX	GWXXXX2E5	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
4/13/2009	XX	GWXXXX337	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U
4/26/2010	XX	GWXXXX405	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U				
4/27/2011	XX	GWXXXX4AE	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U				
4/25/2012	XX	GWXXXX62H	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U

<b>P-04-04</b>																
7/26/2004	XX	GWXXXX043	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
5/22/2006	XX	GWXXXX1F1	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U

<b>SW-1</b>																
7/27/2004	XX	SWXX1X04E	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U

<b>SW-2</b>																
7/27/2004	XX	SWXX2X04F	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
7/27/2004	XD	SWDP2X050	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U

<b>SW-3</b>																
7/27/2004	XX	SWXX3X04G	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U

<b>SW-DP1</b>																
7/27/2004	XX	SWDP1X053	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U

<b>QCBT</b>																
5/4/2004	XX	BTXXXX00H	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
6/9/2004	XX	BTXXXX035	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
7/26/2004	XX	BTXXXX046	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
10/27/2004	XX	BTXXXX060	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
1/17/2005	XX	BTXXXX111	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
3/9/2005	XX	BTXXXX11E	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
3/21/2005	XX	BTXXXX142	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
5/11/2005	XX	BTXXXX121	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
7/25/2005	XX	BTXXXX176	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
7/27/2005	XX	BTXXXX187	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
9/20/2005	XX	BTXXXX1A7	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
9/21/2005	XX	BTXXXX1AI	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
9/22/2005	XX	BTXXXX1AJ	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
4/19/2006	XX	BTXXXX1FE	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
5/22/2006	XX	BTXXXX1F2	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
5/23/2006	XX	BTXXXX1FD	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
5/24/2006	XX	BTXXXX1ID	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U

SUMMARY REPORT  
 VOA (part 2 of 4)

(QCBT)	Date	Type	Sample ID	trans-1,3- Dichloropropen e	trans-1,2- Dichloroethene	Styrene	Methylene Chloride	Methyl Ethyl Ketone	Ethylbenzene	cis-1,3- Dichloropropen e	cis-1,2- Dichloroethene	Carbon Disulfide	Acetone	1,4- Dichlorobenzene e	1,2- Dichloropropan e	1,2- Dichloroethane	1,1- Dichloroethene	1,1- Dichloroethane
				ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
	7/25/2006	XX	BTXXXX1HJ	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
	9/13/2006	XX	BTXXXX20C	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
	5/14/2007	XX	BTXXXX23J	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
	5/15/2007	XX	BTXXXX244	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
	5/16/2007	XX	BTXXXX245	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
	7/24/2007	XX	BTXXXX283	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
	9/11/2007	XX	BTXXXX2AD	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
	5/19/2008	XX	BTXXXX2EC	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
	7/29/2008	XX	BTXXXX2HB	2 U	2 U	2 U	5 U	10 U	2 U	2 U	2 U	2 U	10 U	2 U	2 U	2 U	2 U	2 U
	10/29/2008	XX	BTXXXX301	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U
	4/13/2009	XX	BTXXXX33D	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U
	4/15/2009	XX	BTXXXX33E	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U
	7/7/2009	XX	BTXXXX37H	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U
	10/28/2009	XX	BTXXXX39J	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U
	4/26/2010	XX	BTXXXX40A	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
	4/27/2010	XX	BTXXXX40B	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
	4/28/2010	XX	BTXXXX4G1	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
	7/20/2010	XX	BTXXXX43F	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
	10/19/2010	XX	BTXXXX46I	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
	4/25/2011	XX	BTXXXX4AJ	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
	4/26/2011	XX	BTXXXX4B0	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
	4/27/2011	XX	BTXXXX4B5	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	14	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
	7/19/2011	XX	BTXXXX4F3	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
	10/26/2011	XX	BTXXXX4G8	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
	4/23/2012	XX	BTXXXX632	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U
	4/24/2012	XX	BTXXXX633	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U
	4/25/2012	XX	BTXXXX638	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U
	7/24/2012	XX	BTXXXX656	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U
	10/23/2012	XX	BTXXXX658	1 U	1 U	1 U	5 U	10 U	1 U	1 U	1 U	1 U	10 U	1 U	1 U	1 U	1 U	1 U

Notes: TYPE - Sample Type Qualifier where D = Duplicate Sample.

Blank Cells appear when a parameter was not analyzed.

Concentration Qualifier Notes:

- D - The sampling location was dry.
- F12 - Pipe under water, no sample taken.
- F6 - No flow. Sample not taken.
- H2 - Waterlevel higher than pipes. See LF-COMP for readings
- J - Analyte was positively identified/Associated value is an estimate below reporting limit.
- U - Not Detected above the reported sample detection limit.

**SUMMARY REPORT**  
**VOA (part 3 of 4)**

Page 1 of 6  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Vinyl Chloride	Trichlorofluoro methane	Trichloroethene	Toluene	Tetrachloroethene	o-Xylene	m,p-Xylene	Acrylonitrile	4-Methyl-2-Pentane	2-Hexanone	1,2,3-Trichloropropane	1,1,2-Trichloroethane	1,1,2-Trichloroethane	1,1,1-Trichloroethane	1,1,1,2-Tetrachloroethane	
			ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
<b>DP-4</b>																		
7/26/2004	XX	GWXXXX041	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
9/20/2005	XX	GWXXXX1A4	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/22/2006	XX	GWXXXX1EJ	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/14/2007	XX	GWXXXX23G	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/19/2008	XX	GWXXXX2E4	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
4/13/2009	XX	GWXXXX336	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U	1 U	1 U	1 U
4/26/2010	XX	GWXXXX404	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/25/2011	XX	GWXXXX4AD	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/25/2012	XX	GWXXXX62G	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U	1 U	1 U	1 U
<b>LF-COMP</b>																		
4/24/2012	XX	LFXXX53B	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U	1 U	1 U	1 U
<b>LF-UD-1</b>																		
7/28/2004	XX	LFUD1X08E	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
9/21/2005	XX	LFUD1X19D	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/24/2006	XX	LFUD1X1E8	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/16/2007	XX	LFUD1X235	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/20/2008	XX	LFUD1X2DD	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
4/15/2009	XX	LFUD1X32F	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U	1 U	1 U	1 U
4/27/2010	XX	LFUD1X3JD	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/26/2011	XX	LFUD1X4A2	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/24/2012	XX	LFUD1X525	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2
<b>LF-UD-2</b>																		
7/28/2004	XX	LFUD2X05F	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
9/21/2005	XX	LFUD2X19E	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/24/2006	XX	LFUD2X1E9	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/16/2007	XX	LFUD2X236	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/20/2008	XX	LFUD2X2DE	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
4/15/2009	XX	LFUD2X32G	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U	1 U	1 U	1 U
4/27/2010	XX	LFUD2X3JE	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/26/2011	XX	LFUD2X4A3	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/24/2012	XX	LFUD2X528	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2
<b>LF-UD-3A,B</b>																		
5/16/2007	XX	LFUD3X246	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
5/20/2008	XX	LFUD3X2EE	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U	2 U
4/15/2009	XX	LFXXX33F	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U	1 U	1 U	1 U
4/27/2010	XX	LFXXX40C	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/26/2011	XX	LFXXX4B1	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/24/2012	XX	LFXXX534	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2
<b>LF-UD-4</b>																		
4/15/2009	XX	LFXXX34A	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U	1 U	1 U	1 U
4/27/2010	XX	LFXXX40E	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6
4/26/2011	XX	LFXXX4B3	F12	F12	F12	F12	F12	F12	F12	F12	F12	F12	F12	F12	F12	F12	F12	F12
4/24/2012	XX	LFXXX536	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2
<b>LF-UD-5</b>																		

SUMMARY REPORT  
 VOA (part 3 of 4)

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	VOA (part 3 of 4)											
			Vinyl Chloride	Trichlorofluoro methane	Trichloroethylene	Toluene	Tetrachloroethene	o-Xylene	m,p-Xylene	Acrylonitrile	4-Methyl-2-Pentanone	2-Hexanone	1,2,3-Trichloropropane	1,1,2,2-Tetrachloroethane
ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
4/27/2010	XX	LFXXX40F	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U
<b>LF-UD-Sand6</b>														
4/26/2011	XX	LFXXX4B4	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U
4/24/2012	XX	LFXXX637	1 U	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U
<b>LF-UD-6</b>														
4/26/2011	XX	LFUD8486	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U
4/24/2012	XX	LFUD8539	1 U	1 U	1.5	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U
<b>LF-UD-7</b>														
4/24/2012	XX	LFUD7X53A	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2	H2
<b>LP-LD-1</b>														
7/28/2004	XX	LPUD1X05I	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U
9/21/2005	XX	LPUD1X19H	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U
5/24/2006	XX	LPUD1X1EC	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U
5/16/2007	XX	LPUD1X239	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U
5/20/2008	XX	LPUD1X2DH	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U
4/15/2009	XX	LPUD1X32J	1 U	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U
<b>LP-UD-1</b>														
7/28/2004	XX	LPUD1X06G	D	D	D	D	D	D	D	D	D	D	D	D
9/21/2005	XX	LPUD1X19F	D	D	D	D	D	D	D	D	D	D	D	D
5/24/2006	XX	LPUD1X1EA	D	D	D	D	D	D	D	D	D	D	D	D
5/16/2007	XX	LPUD1X237	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6
5/20/2008	XX	LPUD1X2DF	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6
4/15/2009	XX	LPUD1X32H	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6
4/27/2010	XX	LPUD1X3JF	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6
4/26/2011	XX	LPUD1X4A4	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6
4/24/2012	XX	LPUD1X527	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6	F6
<b>LP-UD-2</b>														
7/28/2004	XX	LPUD2X05H	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U
9/21/2005	XX	LPUD2X19G	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U
5/24/2006	XX	LPUD2X1EB	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U
5/16/2007	XX	LPUD2X238	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U
5/20/2008	XX	LPUD2X2DG	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U
4/15/2009	XX	LPUD2X32I	1 U	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U
4/27/2010	XX	LPUD2X3JG	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U
4/26/2011	XX	LPUD2X4A5	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U
4/24/2012	XX	LPUD2X528	1 U	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U
<b>LT-C4L</b>														
4/15/2009	XX	LTC4LX325	50 U	50 U	50 U	50 U	50 U	50 U	50 U	500 U	500 U	50 U	50 U	50 U
7/17/2009	XX	LTC4LX369	25 U	25 U	25 U	25 U	25 U	25 U	25 U	289	250 U	25 U	25 U	25 U
10/28/2009	XX	LTC4LX3EA	10 U	10 U	13	10 U	10 U	10 U	10 U	100 U	100 U	10 U	10 U	10 U
4/28/2010	XX	LTC4LX3J3	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	25 U	25 U	2.5 U	2.5 U	2.5 U
7/20/2010	XX	LTC4LX427	2.5 U	2.5 U	15	2.5 U	2.5 U	2.5 U	2.5 U	8.5	25 U	2.5 U	2.5 U	2.5 U
10/19/2010	XX	LTC4LX46B	0.75 J	0.5 U	18	0.5 U	0.5 U	0.5 U	0.5 U	12	5 U	0.5 U	0.5 U	0.5 U
4/27/2011	XX	LTC4LX49C	5 U	5 U	11	5 U	5 U	5 U	5 U	7.3 J	50 U	5 U	5 U	5 U
7/19/2011	XX	LTC4LX4DA	0.5 U	0.5 U	7.4	0.5 U	0.5 U	0.5 U	0.5 U	5.4	5 U	0.5 U	0.5 U	0.5 U

**SUMMARY REPORT**  
**VOA (part 3 of 4)**

Date	Type	Sample ID	Vinyl Chloride	Trichlorofluoro methane	Trichloroethene	Toluene	Tetrachloroethene	o-Xylene	m,p-Xylene	Acrylonitrile	4-Methyl-2-Pentanone	2-Hexanone	1,2,3-Trichloropropane	1,1,1-Trichloroethane	1,1,2,2-Tetrachloroethane	1,1,1,2-Tetrachloroethane	1,1,1,2-Tetrachloroethane
			ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
10/26/2011	XX	LTC4LX4H6	0.7 J	0.5 U	0.5 U	13	0.5 U	4.2	9.5	0.5 U	7.8 J	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/24/2012	XX	LTC4LX51F	5 U	6.4	5 U	13	5 U	5 U	6.9	5 U	50 U	50 U	5 U	5 U	5 U	5 U	5 U
7/24/2012	XX	LTC4LX58E	5 U	5 U	5 U	6.8	5 U	5 U	5	5 U	55	50 U	5 U	5 U	5 U	5 U	5 U
10/23/2012	XX	LTC4LX5D5	25 U	25 U	25 U	25 U	25 U	25 U	25 U	25 U	250 U	250 U	25 U	25 U	25 U	25 U	25 U
<b>MW04-102</b>																	
1/18/2005	XX	GW102X10C	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
3/21/2005	XX	GW102X144	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
7/25/2005	XX	GW102X171	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
9/20/2005	XX	GW102X1A9	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
<b>MW04-105</b>																	
1/17/2005	XX	GW105X10F	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
3/21/2005	XX	GW105X147	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
7/25/2005	XX	GW105X181	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
9/20/2005	XX	GW105X1AC	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
<b>MW04-109</b>																	
1/19/2005	XD	GWDFX110	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
1/19/2005	XX	GW109X101	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
3/23/2005	XX	GW109X14A	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
7/26/2005	XD	GWDFX186	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
7/26/2005	XX	GW109X184	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
9/20/2005	XD	GWDFX1AH	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
9/20/2005	XX	GW109X1AF	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
<b>MW-204</b>																	
5/4/2004	XX	GW204X008	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
7/27/2004	XX	GW204X03G	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
9/20/2005	XX	GW204X1A0	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
5/23/2006	XX	GW204X1EF	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
5/14/2007	XX	GW204X23C	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
5/21/2008	XX	GW204X2E0	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
4/13/2009	XX	GW204X332	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U	1 U	1 U
4/28/2010	XX	GW204X400	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/26/2011	XX	GW204X4A9	0.5 U	0.5 U	0.5 U	0.63 J	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/24/2012	XX	GW204X52C	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U	1 U	1 U
<b>MW-207</b>																	
7/28/2004	XX	GW207X048	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
<b>MW-206</b>																	
7/28/2004	XX	GW206X047	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
<b>MW-212</b>																	
5/5/2004	XX	GW212X00B	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
7/27/2004	XX	GW212X03J	D	D	D	D	D	D	D	D	D	D	D	D	D	D	D
<b>MW-216B</b>																	
7/26/2004	XX	GW216B049	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
<b>MW-223A</b>																	
7/28/2004	XX	GW223A04A	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U

**SUMMARY REPORT**  
**VOA (part 3 of 4)**

(MW-223A)	Vinyl Chloride	Trichloroethane	Trichloroethene	Toluene	Tetrachloroethene	o-Xylene	m,p-Xylene	Acrylonitrile	4-Methyl-2-Pentanone	2-Hexanone	1,2,3-Trichloropropane	1,1,2-Trichloroethane	1,1,1-Trichloroethane	1,1,1,2-Tetrachloroethane
Date	Type	Sample ID	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
7/28/2004	XD	GWDP1X04D	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
<b>MW-223B</b>														
5/5/2004	XX	GW223B00A	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
7/27/2004	XX	GW223B03I	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
<b>MW-227</b>														
7/26/2004	XX	GW227X04B	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
<b>MW-301</b>														
7/26/2004	XX	GW301X04C	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
<b>MW-302</b>														
1/26/1993	XX	GW302X03H	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
5/6/2004	XX	GW302X009	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
7/27/2004	XX	GW302X0D1	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
<b>MW-303</b>														
5/6/2004	XX	GW303X00C	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
7/28/2004	XX	GW303X040	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
<b>MW-304A</b>														
7/29/2004	XX	GW304AHD0	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
10/27/2004	XX	GW304A07B	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
<b>MW-401A</b>														
7/29/2004	XX	GW401A059	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
10/27/2004	XX	GW401A071	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
10/27/2004	XD	GWDP4X075	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
<b>MW-401B</b>														
7/29/2004	XX	GW401B05A	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
7/29/2004	XD	GWDP4X05D	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
10/27/2004	XX	GW401B072	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
9/21/2005	XD	GWDP4X19C	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
9/21/2005	XX	GW401B199	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
5/23/2006	XX	GW401B1E4	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
5/23/2006	XD	GWDP4X1E7	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
5/14/2007	XD	GWDP4X234	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
5/14/2007	XX	GW401B231	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
5/20/2008	XX	GW401B2D9	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
5/20/2008	XD	GWDP4X2DC	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U
4/13/2009	XD	GWDP4X32E	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U	1 U
4/13/2009	XX	GW401B32B	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U	1 U
4/27/2010	XX	GW401B3J9	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/27/2010	XD	GWDP4X3JC	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/25/2011	XX	GW401B48I	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/25/2011	XD	GWDP4X4A1	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/23/2012	XD	GWDP4X524	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U	1 U
4/23/2012	XX	GW401B521	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U	1 U
<b>MW-402A</b>														
7/29/2004	XX	GW402A05B	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U

**SUMMARY REPORT**  
**VOA (part 3 of 4)**

Page 5 of 6  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(MW-402A)	Vinyl Chloride	Trichlorofluoro methane	Trichloroethene	Toluene	Tetrachloroethene	o-Xylene	m,p-Xylene	Acrylonitrile	4-Methyl-2-Pentanone	2-Hexanone	1,2,3-Trichloropropane	1,1,2-Trichloroethane	1,1,2,2-Tetrachloroethane	1,1,1-Trichloroethane	1,1,1,2-Tetrachloroethane
Date	Type	Sample ID	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
10/27/2004	XX	GW402A073	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
<b>MW-402B</b>															
7/29/2004	XX	GW402B05C	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
10/27/2004	XX	GW402B074	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
<b>P-04-02</b>															
7/26/2004	XX	GWXXXX042	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
9/22/2005	XX	GWXXXX1A5	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
5/22/2006	XX	GWXXXX1F0	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
5/14/2007	XX	GWXXXX23H	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
5/21/2008	XX	GWXXXX2E5	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
4/13/2009	XX	GWXXXX337	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U	1 U	1 U
4/26/2010	XX	GWXXXX405	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/27/2011	XX	GWXXXX4AE	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	5 U	5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
4/25/2012	XX	GWXXXX62H	1 U	1 U	1 U	1 U	1 U	1 U	10 U	10 U	1 U	1 U	1 U	1 U	1 U
<b>P-04-04</b>															
7/26/2004	XX	GWXXXX043	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
5/22/2006	XX	GWXXXX1F1	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
<b>SW-1</b>															
7/27/2004	XX	SWXX1X04E	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
<b>SW-2</b>															
7/27/2004	XX	SWXX2X04F	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
7/27/2004	XD	SWDP2X050	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
<b>SW-3</b>															
7/27/2004	XX	SWXX3X04G	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
<b>SW-DP1</b>															
7/27/2004	XX	SWDP1X053	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
<b>QCBT</b>															
5/4/2004	XX	BTXXX00H	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
6/9/2004	XX	BTXXX035	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
7/26/2004	XX	BTXXX046	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
10/27/2004	XX	BTXXX060	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
1/17/2005	XX	BTXXX011	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
3/9/2005	XX	BTXXX11E	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
3/21/2005	XX	BTXXX142	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
5/11/2005	XX	BTXXX121	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
7/25/2005	XX	BTXXX17G	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
7/27/2005	XX	BTXXX187	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
9/20/2005	XX	BTXXX1A7	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
9/21/2005	XX	BTXXX1AI	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
9/22/2005	XX	BTXXX1AJ	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
4/19/2006	XX	BTXXX1FE	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
5/22/2006	XX	BTXXX1F2	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
5/23/2006	XX	BTXXX1FD	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U
5/24/2006	XX	BTXXX1ID	2 U	2 U	2 U	2 U	2 U	2 U	10 U	10 U	2 U	2 U	2 U	2 U	2 U

REPORT PREPARED: 1/18/2013 13:10  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**VOA (part 3 of 4)**

Page 6 of 6  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	VOCs											2-Hexanone		1,1,1,2-Tetrachloroethane		1,1,1,2-Tetrachloroethane		
			Vinyl Chloride	Trichlorofluoro methane	Trichloroethene	Toluene	Tetrachloroethene	o-Xylene	m,p-Xylene	Acrylonitrile	4-Methyl-2-Pentanone	1,2,3-Trichloropropane	1,1,2-Trichloroethane	1,1,2-Trichloroethane	1,1,1,2-Tetrachloroethane	1,1,1,2-Tetrachloroethane	ug/L	ug/L	ug/L	ug/L
7/25/2006	XX	BTXXXX1HJ	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
9/13/2006	XX	BTXXXX20C	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/14/2007	XX	BTXXXX23J	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/15/2007	XX	BTXXXX244	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/16/2007	XX	BTXXXX245	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
7/24/2007	XX	BTXXXX283	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
9/11/2007	XX	BTXXXX2AD	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/19/2008	XX	BTXXXX2EC	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
5/21/2008	XX	BTXXXX2ED	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
7/29/2008	XX	BTXXXX2HB	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U	2U
10/29/2008	XX	BTXXXX301	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
4/13/2009	XX	BTXXXX33D	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
4/15/2009	XX	BTXXXX33E	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
7/7/2009	XX	BTXXXX37H	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
10/28/2009	XX	BTXXXX3AJ	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
4/26/2010	XX	BTXXXX40A	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/27/2010	XX	BTXXXX40B	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/28/2010	XX	BTXXXX41G1	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
7/20/2010	XX	BTXXXX43F	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
10/19/2010	XX	BTXXXX46I	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/25/2011	XX	BTXXXX4AJ	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/26/2011	XX	BTXXXX4B0	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/27/2011	XX	BTXXXX4B5	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
7/19/2011	XX	BTXXXX4F3	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
10/26/2011	XX	BTXXXX4G8	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U	0.5U
4/23/2012	XX	BTXXXX532	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
4/24/2012	XX	BTXXXX533	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
4/25/2012	XX	BTXXXX538	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
7/24/2012	XX	BTXXXX565	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U
10/23/2012	XX	BTXXXX5C8	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U	1U

**Notes:** TYPE - Sample Type Qualifier where D = Duplicate Sample.

Blank Cells appear when a parameter was not analyzed.

**Concentration Qualifier Notes:**

- D - The sampling location was dry.
- F12 - Pipe under water, no sample taken.
- F6 - No flow. Sample not taken.
- H2 - Waterlevel higher than pipes. See LF-COMP for readings
- J - Analyte was positively identified/Associated value is an estimate below reporting limit.
- U - Not Detected above the reported sample detection limit.



(LF-UD-5) Vinyl Acetate trans-1,4-Dichloro-2-butene Iodomethane  
 ug/L ug/L ug/L

Date	Type	Sample ID	ug/L	ug/L	ug/L
4/27/2010	XX	LFXXX40F	0.5 U	0.5 U	0.5 U

**LF-UD-Sand6**

4/26/2011	XX	LFXXX4B4	0.5 U	0.5 U	0.5 U
4/24/2012	XX	LFXXX537	1 U	1 U	1 U

**LF-UD-6**

4/26/2011	XX	LFUD6X4B8	0.5 U	0.5 U	0.5 U
4/24/2012	XX	LFUD6X539	1 U	1 U	1 U

**LF-UD-7**

4/24/2012	XX	LFUD7X53A	H2	H2	H2
-----------	----	-----------	----	----	----

**LP-LD-1**

7/28/2004	XX	LPD1X05I	15 U	2 U	2 U
9/21/2005	XX	LPD1X19H	15 U	2 U	2 U
5/24/2006	XX	LPD1X1EC	15 U	2 U	2 U
5/16/2007	XX	LPD1X239	15 U	2 U	2 U
5/20/2008	XX	LPD1X2DH	15 U	2 U	2 U
4/15/2009	XX	LPD1X32J	1 U	1 U	1 U

**LP-UD-1**

7/28/2004	XX	LPUD1X05G	D	D	D
9/21/2005	XX	LPUD1X19F	D	D	D
5/24/2006	XX	LPUD1X1EA	D	D	D
5/16/2007	XX	LPUD1X237	F6	F6	F6
5/20/2008	XX	LPUD1X2DF	F6	F6	F6
4/15/2009	XX	LPUD1X32H	F6	F6	F6
4/27/2010	XX	LPUD1X3JF	F6	F6	F6
4/26/2011	XX	LPUD1X4A4	F6	F6	F6
4/24/2012	XX	LPUD1X527	F6	F6	F6

**LP-UD-2**

7/28/2004	XX	LPUD2X05H	15 U	2 U	2 U
9/21/2005	XX	LPUD2X19G	15 U	2 U	2 U
5/24/2006	XX	LPUD2X1EB	15 U	2 U	2 U
5/16/2007	XX	LPUD2X238	15 U	2 U	2 U
5/20/2008	XX	LPUD2X2DG	15 U	2 U	2 U
4/15/2009	XX	LPUD2X32I	1 U	1 U	1 U
4/27/2010	XX	LPUD2X3JG	0.5 U	0.5 U	0.5 U
4/26/2011	XX	LPUD2X4A5	0.5 U	0.5 U	0.5 U
4/24/2012	XX	LPUD2X528	2 U	1 U	1 U

**LT-C4L**

4/15/2009	XX	LTC4LX325	50 U	50 U	50 U
7/17/2009	XX	LTC4LX369	25 U	25 U	25 U
10/28/2009	XX	LTC4LX3EA	10 U	10 U	10 U
4/28/2010	XX	LTC4LX3J3	2.5 U	2.5 U	2.5 U
7/20/2010	XX	LTC4LX427	2.5 U	2.5 U	2.5 U
10/19/2010	XX	LTC4LX45B	0.5 U	0.5 U	0.5 U
4/27/2011	XX	LTC4LX49C	5 U	5 U	5 U
7/19/2011	XX	LTC4LX4DA	0.5 U	0.5 U	0.5 U

REPORT PREPARED: 1/18/2013 13:11  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT  
 VOA (part 4 of 4)

SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Vinyl Acetate		trans-1,4-Dichloro-2-butene		Iodomethane	
			ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
10/26/2011	XX	LTC4LX4H5	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
4/24/2012	XX	LTC4LX51F	5 U	5 U	5 U	5 U	5 U	
7/24/2012	XX	LTC4LX56E	5 U	5 U	5 U	5 U	35	
10/23/2012	XX	LTC4LX5D5	25 U	25 U	25 U	25 U	25 U	
<b>MW04-102</b>								
1/18/2005	XX	GW102X10C	15 U	2 U	2 U	2 U	2 U	
3/21/2005	XX	GW102X144	15 U	2 U	2 U	2 U	2 U	
7/25/2005	XX	GW102X171	15 U	2 U	2 U	2 U	2 U	
9/20/2005	XX	GW102X1A9	15 U	2 U	2 U	2 U	2 U	
<b>MW04-105</b>								
1/17/2005	XX	GW105X10F	15 U	2 U	2 U	2 U	2 U	
3/21/2005	XX	GW105X147	15 U	2 U	2 U	2 U	2 U	
7/25/2005	XX	GW105X181	15 U	2 U	2 U	2 U	2 U	
9/20/2005	XX	GW105X1AC	15 U	2 U	2 U	2 U	2 U	
<b>MW04-109</b>								
1/19/2005	XD	GWDP1X110	15 U	2 U	2 U	2 U	2 U	
1/19/2005	XX	GW109X101	15 U	2 U	2 U	2 U	2 U	
3/23/2005	XX	GW109X14A	15 U	2 U	2 U	2 U	2 U	
7/26/2005	XD	GWDF5X186	15 U	2 U	2 U	2 U	2 U	
7/26/2005	XX	GW109X184	15 U	2 U	2 U	2 U	2 U	
9/20/2005	XD	GWDF5X1AH	15 U	2 U	2 U	2 U	2 U	
9/20/2005	XX	GW109X1AF	15 U	2 U	2 U	2 U	2 U	
<b>MW-204</b>								
5/4/2004	XX	GW204X008	15 U	2 U	2 U	2 U	2 U	
7/27/2004	XX	GW204X03G	15 U	2 U	2 U	2 U	2 U	
9/20/2005	XX	GW204X1A0	15 U	2 U	2 U	2 U	2 U	
5/23/2006	XX	GW204X1EF	15 U	2 U	2 U	2 U	2 U	
5/14/2007	XX	GW204X23C	15 U	2 U	2 U	2 U	2 U	
5/21/2008	XX	GW204X2E0	15 U	2 U	2 U	2 U	2 U	
4/13/2009	XX	GW204X332	1 U	1 U	1 U	1 U	1 U	
4/28/2010	XX	GW204X400	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
4/26/2011	XX	GW204X4A9	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	
4/24/2012	XX	GW204X52C	1 U	1 U	1 U	1 U	1 U	
<b>MW-207</b>								
7/28/2004	XX	GW207X048	15 U	2 U	2 U	2 U	2 U	
<b>MW-206</b>								
7/28/2004	XX	GW206X047	15 U	2 U	2 U	2 U	2 U	
<b>MW-212</b>								
5/5/2004	XX	GW212X00B	15 U	2 U	2 U	2 U	2 U	
7/27/2004	XX	GW212X03J	D	D	D	D	D	
<b>MW-216B</b>								
7/26/2004	XX	GW216B049	15 U	2 U	2 U	2 U	2 U	
<b>MW-223A</b>								
7/28/2004	XX	GW223A04A	15 U	2 U	2 U	2 U	2 U	

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

SUMMARY REPORT  
VOA (part 4 of 4)

REPORT PREPARED: 1/18/2013 13:11  
FOR: Juniper Ridge Landfill

(MW-223 A) Vinyl Acetate Iodomethane  
trans-1,4-Dichloro-2-butene

Date Type Sample ID ug/L ug/L ug/L

7/28/2004	XD	GWDF1X04D	15 U	2 U	2 U
<b>MW-223B</b>					
5/5/2004	XX	GW223B00A	15 U	2 U	2 U
7/27/2004	XX	GW223B03I	15 U	2 U	2 U
<b>MW-227</b>					
7/26/2004	XX	GW227X04B	15 U	2 U	2 U
<b>MW-301</b>					
7/26/2004	XX	GW301X04C	15 U	2 U	2 U
<b>MW-302</b>					
1/26/1993	XX	GW302X03H	15 U	2 U	2 U
5/6/2004	XX	GW302X009	15 U	2 U	2 U
7/27/2004	XX	GW302XHD1	15 U	2 U	2 U
<b>MW-303</b>					
5/6/2004	XX	GW303X00C	15 U	2 U	2 U
7/28/2004	XX	GW303X040	15 U	2 U	2 U
<b>MW-304A</b>					
7/29/2004	XX	GW304AHD0	15 U	2 U	2 U
10/27/2004	XX	GW304A07B	15 U	2 U	2 U
<b>MW-401A</b>					
7/29/2004	XX	GW401A059	15 U	2 U	2 U
10/27/2004	XX	GW401A071	15 U	2 U	2 U
10/27/2004	XD	GWDF4X075	15 U	2 U	2 U
<b>MW-401B</b>					
7/29/2004	XX	GW401B05A	15 U	2 U	2 U
7/29/2004	XD	GWDF4X05D	15 U	2 U	2 U
10/27/2004	XX	GW401B072	15 U	2 U	2 U
9/21/2005	XD	GWDF4X19C	15 U	2 U	2 U
9/21/2005	XX	GW401B189	15 U	2 U	2 U
5/23/2006	XX	GW401B1E4	15 U	2 U	2 U
5/23/2006	XD	GWDF4X1E7	15 U	2 U	2 U
5/14/2007	XD	GWDF4X234	15 U	2 U	2 U
5/14/2007	XX	GW401B231	15 U	2 U	2 U
5/20/2008	XX	GW401B2D9	15 U	2 U	2 U
5/20/2008	XD	GWDF4X2DC	15 U	2 U	2 U
4/13/2009	XD	GWDF4X32E	1 U	1 U	1 U
4/13/2009	XX	GW401B32B	1 U	1 U	1 U
4/27/2010	XX	GW401B3J9	0.5 U	0.5 U	0.5 U
4/27/2010	XD	GWDF4X3JC	0.5 U	0.5 U	0.5 U
4/25/2011	XX	GW401B49I	0.5 U	0.5 U	0.5 U
4/25/2011	XD	GWDF4X4A1	0.5 U	0.5 U	0.5 U
4/23/2012	XD	GWDF4X524	2 U	1 U	1 U
4/23/2012	XX	GW401B521	2 U	1 U	1 U
<b>MW-402A</b>					
7/29/2004	XX	GW402A05B	15 U	2 U	2 U

SUMMARY REPORT  
 VOA (part 4 of 4)

(MW-402A)		Vinyl Acetate	trans-1,4-Dichloro-2-butene	Iodomethane
Date	Type	Sample ID	ug/L	ug/L
10/27/2004	XX	GW402A073	15 U	2 U
<b>MW-402B</b>				
7/29/2004	XX	GW402B06C	15 U	2 U
10/27/2004	XX	GW402B074	15 U	2 U
<b>P-04-02</b>				
7/26/2004	XX	GWXXXX042	15 U	2 U
9/22/2005	XX	GWXXXX1A5	15 U	2 U
5/22/2006	XX	GWXXXX1F0	15 U	2 U
5/14/2007	XX	GWXXXX23H	15 U	2 U
5/21/2008	XX	GWXXXX2E5	15 U	2 U
4/13/2009	XX	GWXXXX337	1 U	1 U
4/26/2010	XX	GWXXXX405	0.5 U	0.5 U
4/27/2011	XX	GWXXXX4AE	0.5 U	0.5 U
4/25/2012	XX	GWXXXX62H	2 U	1 U
<b>P-04-04</b>				
7/26/2004	XX	GWXXXX043	15 U	2 U
5/22/2006	XX	GWXXXX1F1	15 U	2 U
<b>SW-1</b>				
7/27/2004	XX	SWXX1X04E	15 U	2 U
<b>SW-2</b>				
7/27/2004	XX	SWXX2X04F	15 U	2 U
7/27/2004	XD	SWDP2X050	15 U	2 U
<b>SW-3</b>				
7/27/2004	XX	SWXX3X04G	15 U	2 U
<b>SW-DP1</b>				
7/27/2004	XX	SWDP1X053	15 U	2 U
<b>QCBT</b>				
5/4/2004	XX	BTXXXX00H	15 U	2 U
6/9/2004	XX	BTXXXX035	15 U	2 U
7/26/2004	XX	BTXXXX046	15 U	2 U
10/27/2004	XX	BTXXXX060	15 U	2 U
1/17/2005	XX	BTXXXX111	15 U	2 U
3/9/2005	XX	BTXXXX11E	15 U	2 U
3/21/2005	XX	BTXXXX142	15 U	2 U
5/11/2005	XX	BTXXXX121	15 U	2 U
7/25/2005	XX	BTXXXX17G	15 U	2 U
7/27/2005	XX	BTXXXX187	15 U	2 U
9/20/2005	XX	BTXXXX1A7	15 U	2 U
9/21/2005	XX	BTXXXX1A1	15 U	2 U
9/22/2005	XX	BTXXXX1AJ	15 U	2 U
4/19/2006	XX	BTXXXX1FE	15 U	2 U
5/22/2006	XX	BTXXXX1F2	15 U	2 U
5/23/2006	XX	BTXXXX1FD	15 U	2 U
5/24/2006	XX	BTXXXX1ID	15 U	2 U

REPORT PREPARED: 1/18/2013 13:11

FOR: Juniper Ridge Landfill

SUMMARY REPORT  
VOA (part 4 of 4)

Page 6 of 6

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

(QCBT)		Vinyl Acetate	trans-1,4-Dichloro-2-butene	Iodomethane																
Date	Type	Sample ID	ug/L	ug/L	ug/L															
7/25/2006	XX	BTXXXX1HJ	15 U	2 U	2 U															
9/13/2006	XX	BTXXXX20C	15 U	2 U	2 U															
5/14/2007	XX	BTXXXX23J	15 U	2 U	2 U															
5/15/2007	XX	BTXXXX244	15 U	2 U	2 U															
5/16/2007	XX	BTXXXX245	15 U	2 U	2 U															
7/24/2007	XX	BTXXXX283	15 U	2 U	2 U															
9/11/2007	XX	BTXXXX2AD	15 U	2 U	2 U															
5/19/2008	XX	BTXXXX2EC	15 U	2 U	2 U															
5/21/2008	XX	BTXXXX2ED	15 U	2 U	2 U															
7/29/2008	XX	BTXXXX2HB	15 U	2 U	2 U															
10/29/2008	XX	BTXXXX301	1 U	1 U	1 U															
4/13/2009	XX	BTXXXX33D	1 U	1 U	1 U															
4/15/2009	XX	BTXXXX33E	1 U	1 U	1 U															
7/7/2009	XX	BTXXXX37H	1 U	1 U	1 U															
10/28/2009	XX	BTXXXX3AJ	1 U	1 U	1 U															
4/26/2010	XX	BTXXXX40A	0.5 U	0.5 U	0.5 U															
4/27/2010	XX	BTXXXX40B	0.5 U	0.5 U	0.5 U															
4/28/2010	XX	BTXXXX4G1	0.5 U	0.5 U	0.5 U															
7/20/2010	XX	BTXXXX43F	0.5 U	0.5 U	0.5 U															
10/19/2010	XX	BTXXXX46I	0.5 U	0.5 U	0.5 U															
4/25/2011	XX	BTXXXX4AJ	0.5 U	0.5 U	0.5 U															
4/26/2011	XX	BTXXXX4B0	0.5 U	0.5 U	0.5 U															
4/27/2011	XX	BTXXXX4B5	0.5 U	0.5 U	0.5 U															
7/19/2011	XX	BTXXXX4F3	0.5 U	0.5 U	0.5 U															
10/26/2011	XX	BTXXXX4G8	0.5 U	0.5 U	0.5 U															
4/23/2012	XX	BTXXXX532	2 U	1 U	1 U															
4/24/2012	XX	BTXXXX533	2 U	1 U	1 U															
4/25/2012	XX	BTXXXX538	2 U	1 U	1 U															
7/24/2012	XX	BTXXXX585	1 U	1 U	1.5															
10/23/2012	XX	BTXXXX5C8	1 U	1 U	1 U															

**Notes:** TYPE - Sample Type Qualifier where D = Duplicate Sample.

Blank Cells appear when a parameter was not analyzed.

**Concentration Qualifier Notes:**

- D - The sampling location was dry.
- F12 - Pipe under water, no sample taken.
- F6 - No flow. Sample not taken.
- H2 - Waterlevel higher than pipes. See LF-COMP for readings
- U - Not Detected above the reported sample detection limit.

REPORT PREPARED: 6/14/2012 09:39  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
 Pesticides, Herbicides and PCB's (part 1 of 4)

Page 1 of 1  
 SEVVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Pesticides, Herbicides and PCB's (part 1 of 4)													
			Aldrin ug/L	alpha-BHC ug/L	beta-BHC ug/L	delta-BHC ug/L	gamma-BHC (Lindane) ug/L	Chloroane (technical) ug/L	Chlorobenzilate ug/L	4,4'-DDD ug/L	4,4'-DDE ug/L	4,4'-DDT ug/L	Diallate ug/L	Dieldrin ug/L	Endosulfan I ug/L	Endosulfan II ug/L
<b>SW-LCH</b>																
5/4/2004	XX	SWLCHX01F	5 U	5 U	5 U	5 U	5 U	10 U	20 U	2 U	2 U	20 U	2 U	1 U	2 U	2 U
5/11/2005	XX	SWLCHX12H	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	10 U	1 U	1 U	10 U	1 U	0.5 U	1 U	1 U
5/24/2006	XX	SWLCHX1DI	0.05 U	0.05 U	0.131 B	0.05 U	0.05 U	1 U	1 U	0.1 U	0.1 U	1 U	0.1 U	0.05 U	0.1 U	0.1 U
5/15/2007	XX	SWLCHX22F	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	10 U	10 U	1 U	1 U	10 U	1 U	0.5 U	1 U	1 U
5/21/2008	XX	SWLCHX2D3	0.05 U	0.05 U	0.05 U	0.05 U	0.5 U	20 U	20 U	0.1 U	0.1 U	20 U	0.1 U	0.05 U	0.1 U	0.1 U
<b>LT-C4L</b>																
4/15/2009	XX	LTC4LX325	0.047 U	0.047 U	0.047 U	0.047 U	0.47 U	0.47 U	57 U	0.094 U	0.094 U	57 U	0.094 U	0.047 U	0.094 U	0.094 U
4/28/2010	XX	LTC4LX315	0.047 U	0.047 U	0.047 U	0.047 U	0.47 U	0.47 U	9 U	0.094 U	0.094 U	9 U	0.094 U	0.047 U	0.094 U	0.094 U
4/27/2011	XX	LTC4LX49C	0.007 U	0.0065 U	0.0059 U	0.012 U	0.0068 U			0.0085 U	0.0046 U		0.0061 U	0.006 U	0.0054 U	0.0063 U
4/24/2012	XX	LTC4LX51F	0.047 U	0.047 U	0.047 U	0.047 U	0.47 U	0.47 U	9.5 U	0.094 U	0.094 U	9.5 U	0.094 U	0.047 U	0.094 U	0.094 U

**Notes:**  
 TYPE - Sample Type Qualifier where D = Duplicate Sample.  
 Blank Cells appear when a parameter was not analyzed.

**Concentration Qualifier Notes:**

- B - Compound is found in the associated method blank as well as sample.
- U - Not Detected above the reported sample detection limit.

REPORT PREPARED: 6/14/2012 09:40  
 FOR: Juniper Ridge Landfill

SUMMARY REPORT

Page 1 of 1  
 SEVREE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Pesticides, Herbicides and PCB's (part 2 of 4)

Date	Type	Sample ID	Endrin		Heptachlor		Heptachlor Epoxide		Isodrin		Kepone		Methoxychlor		Toxaphene		Aroclor-1016		Aroclor-1221		Aroclor-1232		Aroclor-1242		Aroclor-1248		Aroclor-1254		Aroclor-1260			
			ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	
<b>(SW-LCH)</b>																																
<b>SW-LCH</b>																																
5/4/2004	XX	SWLCHX01F	2 U	2 U	5 U	1 U	1 U	2 U	2 U	2 U	20 U	10 U	10 U	100 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U		
5/11/2005	XX	SWLCHX12H	0.5 U	1 U	0.5 U	0.5 U	0.5 U	1 U	1 U	10 U	10 U	2 U	50 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U		
5/24/2006	XX	SWLCHX1DI	0.1 U	0.1 U	0.05 U	0.05 U	0.05 U	0.1 U	0.1 U	1 U	1 U	0.5 U	2 U	2 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U	20 U		
5/15/2007	XX	SWLCHX22F	0.5 U	1 U	0.5 U	0.5 U	0.5 U	1 U	1 U	10 U	10 U	2 U	20 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U		
5/21/2008	XX	SWLCHX203	0.1 U	0.1 U	0.05 U	0.05 U	0.05 U	20 U	20 U	10 U	10 U	0.5 U	1 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U		
<b>LT-C4L</b>																																
4/15/2009	XX	LTC4LX325	0.094 U	0.094 U	0.047 U	0.047 U	0.047 U	57 U	57 U	71 U	71 U	0.47 U	0.94 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	
4/28/2010	XX	LTC4LX318	0.094 U	0.094 U	0.047 U	0.047 U	0.047 U	9 U	9 U	24 U	24 U	0.47 U	0.94 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	
4/27/2011	XX	LTC4LX49C	0.0079 U	0.0056 U	0.0075 U	0.43	0.43					0.0079 U	0.16 U	0.14 U	0.14 U	0.14 U	0.14 U	0.14 U	0.14 U	0.14 U	0.14 U	0.14 U	0.14 U	0.14 U	0.14 U	0.14 U	0.14 U	0.14 U	0.14 U	0.14 U	0.14 U	
4/24/2012	XX	LTC4LX51F	0.094 U	0.094 U	0.047 U	0.047 U	0.047 U	9.5 U	9.5 U	24 U	24 U	0.47 U	0.94 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U	0.47 U

**Notes:** TYPE - Sample Type Qualifier where D = Duplicate Sample.  
 Blank Cells appear when a parameter was not analyzed.

**Concentration Qualifier Notes:**  
 U - Not Detected above the reported sample detection limit.

REPORT PREPARED: 6/14/2012 09:40  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Pesticides, Herbicides and PCB's (part 3 of 4)**

Page 1 of 1  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Dimethoate	Dsulfoton	Famphur	Methyl Parathion	Parathion	Phorate	Sulfotepp	Thiomazin	o,o,o'-Triethylphosphorothioate	2,4-Dichlorophenoxyacetic Acid	2,4,5,-T Trichlorobenzoxypropionic Acid	alpha-Chlordane	gamma-Chlordane
			ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
5/4/2004	XX	SWLGHX01F	2 U	2 U	1 U	2 U	2 U	2 U	2 U	1 U	1 U	2 U	0.5 U	0.5 U	0.5 U
5/11/2005	XX	SWLCHK12H	2 U	2 U	1 U	2 U	2 U	2 U	2 U	1 U	1 U	1 U	0.5 U	0.5 U	0.5 U
5/24/2006	XX	SWLGHX1DI	2 U	2 U	1 U	2 U	2 U	2 U	2 U	1 U	1 U	1 U	0.5 U	0.05 U	0.05 U
5/15/2007	XX	SWLCHK22F	2 U	2 U	1 U	2 U	2 U	2 U	2 U	1 U	1 U	1 U	1 U	0.5 U	0.5 U
5/21/2008	XX	SWLGHX2D3	10 U	10 U	25 U	10 U	25 U	10 U	20 U	20 U	20 U	28 U	28 U	28 U	28 U

**LT-C4L**

4/15/2009	XX	LTC4LX25	28 U	28 U	71 U	28 U	71 U	28 U	57 U	57 U	14 U	14 U	14 U	14 U	14 U
4/28/2010	XX	LTC4LX3J	9 U	9 U	28 U	9 U	24 U	9 U	19 U	19 U	2.8 U	2.8 U	2.8 U	0.0072 U	0.0057 U
4/27/2011	XX	LTC4LX4C													
4/24/2012	XX	LTC4LX51F	9.5 U	9.5 U	28 U	9.5 U	24 U	9.5 U			9.5 U	2.8 U	2.8 U	2.8 U	2.8 U

**Notes:** TYPE - Sample Type Qualifier where D = Duplicate Sample.  
 Blank Cells appear when a parameter was not analyzed.

**Concentration Qualifier Notes:**

U - Not Detected above the reported sample detection limit.

REPORT PREPARED: 6/14/2012 09:40  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
 Pesticides, Herbicides and PCB's (part 4 of 4)

Page 1 of 1  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

(LT-C4L)	DALAPON	DICAMBA	DICHLOROPR OF	MCPA	MCPA	MCPP	2,4-DB	Endrin Kerone pyridyl phosphorothioat e	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
Date	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L

**LT-C4L**

4/27/2011	XX	LTC4LX49C	0.31 U	0.14 U	0.26 U	32 U	48 U	0.51 U	0.0074 U	19 U				
4/24/2012	XX	LTC4LX51F												

**Notes:**  
 TYPE - Sample Type Qualifier where D = Duplicate Sample.  
 Blank Cells appear when a parameter was not analyzed.

**Concentration Qualifier Notes:**

U - Not Detected above the reported sample detection limit.

REPORT PREPARED: 6/14/2012 09:40  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
 Semi-VOA (part 1 of 8)

Page 1 of 1  
 SEVVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Acenaphthene		Acenaphthylene		Acetophenone		2-Acetylaminofluorene		4-Aminobiphenyl		Aniline		Anthracene		Aramite		Benzo(a)Anthracene		Benzo(b)Fluoranthene		Benzo(k)Fluoranthene		Benzo(g,h,i)perylene		Benzo(a)Pyrene		Benzyl Alcohol		4-Bromophenylphenylether			
			ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		
5/4/2004	XX	SWLCHX01F	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U		
5/11/2005	XX	SWLCHX10H	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U		
5/24/2006	XX	SWLCHX1DI	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U		
5/15/2007	XX	SWLCHX22F	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U		
5/21/2008	XX	SWLCHX2D3	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	
<b>LT-C4L</b>																																		
4/15/2009	XX	LTC4LX325	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	
4/28/2010	XX	LTC4LX3L3	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	
4/27/2011	XX	LTC4LX46C	2 J	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U	1 U
4/24/2012	XX	LTC4LX51F	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	

**Notes:**  
 TYPE - Sample Type Qualifier where D = Duplicate Sample.  
 Blank Cells appear when a parameter was not analyzed.

**Concentration Qualifier Notes:**

- J - Analyte was positively identified/Associated value is an estimate below reporting limit.
- U - Not Detected above the reported sample detection limit.

REPORT PREPARED: 6/14/2012 09:40  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
**Semi-VOA (part 2 of 8)**

Page 1 of 1  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Butylbenzylphth. 2-sec-Butyl-4-6- diisopropenol (Dinoset)	4-Chloroaniline	Bis(2- Chloroethoxy)me thane	Bis(2- Chloroethyl)eth er	Bis(2- Chloroisopropyl )ether	4-Chloro-3- Methylphenol	2- Chloronaphthalene	2-Chlorophenol	4-Chlorophenyl- phenylether	Chrysene	Dibenz(a,h)Anth racene	Dibenzofuran	Dt-er- butylphthalate	1,2- Dichlorobenzene
			ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L

**SW-LCH**

5/4/2004	XX	SWLCHK01F	10 U	2 U												
7/28/2004	XX	SWLCHK051	10 U	2 U												
5/11/2005	XX	SWLCHK12H	10 U	2 U												
7/27/2005	XX	SWLCHK185														2 U
9/21/2005	XX	SWLCHK183	10 U	2 U												
5/24/2006	XX	SWLCHK10I	10 U	20 U												
7/25/2006	XX	SWLCHK16F														10 U
9/13/2006	XX	SWLCHK1J8														10 U
5/15/2007	XX	SWLCHK22F	100 U	20 U												
7/24/2007	XX	SWLCHK26J														10 U
9/11/2007	XX	SWLCHK299														2 U
5/21/2008	XX	SWLCHK203	10 U	10 U												
7/29/2008	XX	SWLCHK267														20 U
10/29/2008	XX	SWLCHK21H														2 U

**LT-C4L**

4/15/2008	XX	LTC4LX325	28 U	28 U												
7/7/2008	XX	LTC4LX369														25 U
10/28/2008	XX	LTC4LX3E4	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	10 U
4/28/2010	XX	LTC4LX3J5	4.7 U	2.5 U												
7/20/2010	XX	LTC4LX427														0.5 U
10/19/2010	XX	LTC4LX45B	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
4/27/2011	XX	LTC4LX49C	0.21 U	0.5 U												
7/19/2011	XX	LTC4LX4DA														0.5 U
10/26/2011	XX	LTC4LX4H6	9.5 U	5 U												
4/24/2012	XX	LTC4LX51F	4.8 U	5 U												

**Notes:**

TYPE - Sample Type Qualifier where D = Duplicate Sample.  
 Blank Cells appear when a parameter was not analyzed.

**Concentration Qualifier Notes:**

J - Analyte was positively identified/Associated value is an estimate below reporting limit.  
 U - Not Detected above the reported sample detection limit.

REPORT PREPARED: 6/14/2012 09:40  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
 Semi-VOA (part 3 of 8)

Page 1 of 1  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Concentration Qualifier Notes:														
			1,3-Dichlorobenzene	1,4-Dichlorobenzene	3,3'-Dichlorobenzene	2,4-Dichlorophenol	2,6-Dichlorophenol	Diethylphthalate	P-Dimethylaminoazobenzene	7,12-Dimethylbenzanthracene	3,3'-Dimethylbenzidine	alpha, alpha-Dimethylphenethylamine	2,4-Dimethylphenol	Dimethylphthalate	1,3-Dinitrobenzene (m-)	4,6-Dinitro-2-methylphenol	2,4-Dinitrophenol
			ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
<b>SW-LCH</b>																	
5/4/2004	XX	SWLCHX01F	10 U	2 U	20 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	25 U
7/28/2004	XX	SWLCHX061	10 U	2 U	20 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	25 U
5/11/2005	XX	SWLCHX12H	10 U	2 U	20 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	25 U
7/27/2005	XX	SWLCHX166	10 U	2 U	20 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	25 U
9/21/2005	XX	SWLCHX169	10 U	2 U	20 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	25 U
5/24/2006	XX	SWLCHX1DI	10 U	2 U	20 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	25 U
7/25/2006	XX	SWLCHX1GF	10 U	2 U	20 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	25 U
9/13/2006	XX	SWLCHX1J8	10 U	2 U	20 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	25 U
5/15/2007	XX	SWLCHX2ZF	100 U	20 U	200 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U
7/24/2007	XX	SWLCHX26J	10 U	2 U	20 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	25 U
9/11/2007	XX	SWLCHX289	10 U	2 U	20 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	25 U
5/21/2008	XX	SWLCHX2D3	10 U	2 U	20 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	25 U
7/29/2008	XX	SWLCHX267	10 U	2 U	20 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	25 U
10/29/2008	XX	SWLCHX29H	10 U	2 U	20 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	25 U
<b>LT-C4L</b>																	
4/15/2009	XX	LTCALX325	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	71 U
7/7/2009	XX	LTCALX369	25 U	25 U	25 U	25 U	25 U	25 U	25 U	25 U	25 U	25 U	25 U	25 U	25 U	25 U	71 U
10/28/2009	XX	LTCALX3E4	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	25 U
4/28/2010	XX	LTCALX3J5	9 U	2.5 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	24 U
7/20/2010	XX	LTCALX427	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	2.5 U	24 U
10/19/2010	XX	LTCALX45B	1.3	1.3	1.3	1.3	1.3	1.3	1.3	1.3	1.3	1.3	1.3	1.3	1.3	1.3	24 U
4/27/2011	XX	LTCALX49C	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	24 U
7/19/2011	XX	LTCALX4DA	0.69 J	0.69 J	0.69 J	0.69 J	0.69 J	0.69 J	0.69 J	0.69 J	0.69 J	0.69 J	0.69 J	0.69 J	0.69 J	0.69 J	24 U
10/26/2011	XX	LTCALX4H6	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	24 U
4/24/2012	XX	LTCALX51F	9.5 U	5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	24 U

**Notes:**  
 TYPE - Sample Type Qualifier where D = Duplicate Sample.  
 Blank Cells appear when a parameter was not analyzed.

**Concentration Qualifier Notes:**

- J - Analyte was positively identified/Associated value is an estimate below reporting limit.
- U - Not Detected above the reported sample detection limit.

REPORT PREPARED: 6/14/2012 09:40  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
 Semi-VOA (part 4 of 8)

Page 1 of 1  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	2,4-Dinitrotoluene ug/L	2,6-Dinitrotoluene ug/L	Dh-p-octylphthalate ug/L	Bis(2-Ethylhexyl)phthalate ug/L	Ethyl methacrylate (2-Propenoic acid) ug/L	Ethyl methanesulfonate ug/L	Fluoranthene ug/L	Fluorene ug/L	Hexachlorobenzene ug/L	Hexachlorobutadiene ug/L	Hexachlorocyclopentadiene ug/L	Hexachloroethane ug/L	Hexachloroethene ug/L	Hexachlorocyclopentadiene ug/L	Hexachloroethene ug/L	Hexachloroethene ug/L	Indeno(1,2,3-c,d)Pyrene ug/L
5/4/2004	XX	SWLCHX01F	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U
5/11/2005	XX	SWLCHX12H	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U
5/24/2006	XX	SWLCHX1DI	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U
5/15/2007	XX	SWLCHX22F	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U	100 U
5/21/2008	XX	SWLCHX2D3	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U
<b>LT-C4L</b>																			
4/15/2009	XX	LTCALX325	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U	28 U
4/28/2010	XX	LTCALX3J8	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U	9 U
4/27/2011	XX	LTCALX49C	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U	2 U
4/24/2012	XX	LTCALX61F	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U

**Notes:** TYPE - Sample Type Qualifier where D = Duplicate Sample.  
 Blank Cells appear when a parameter was not analyzed.

**Concentration Qualifier Notes:**  
 U - Not Detected above the reported sample detection limit.





REPORT PREPARED: 6/14/2012 09:40  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**  
 Semi-VOA (part 7 of 8)

Page 1 of 1  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

Date	Type	Sample ID	Pentachlorobenzene										1,2,4,5-Tetrachlorobenzene			
			N-Nitrosopyrrolidine	Pentachlorobenzene	Pentachloroethane	Pentachloronitrobenzene	Pentachlorophenol	Phenacetin	Phenanthrene	Phenol	P-Phenylenediamine	2-Picolone (2-Methylpyridine)	Promamide	Pyrene	Pyridine	
			ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
<b>SW-LCH</b>																
5/4/2004	XX	SWLCHX01F	10 U	10 U	10 U	25 U	10 U	10 U	30.7	10 U	10 U	10 U	10 U	10 U	10 U	10 U
5/11/2005	XX	SWLCHX12H	10 U	10 U	10 U	25 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U
5/24/2006	XX	SWLCHX10I	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U	10 U
5/15/2007	XX	SWLCHX22F	100 U	100 U	100 U	100 U	100 U	114	114	100 U	100 U	100 U	100 U	100 U	100 U	100 U
5/21/2008	XX	SWLCHX203	10 U	10 U	10 U	25 U	10 U	11	11	10 U	10 U	10 U	10 U	10 U	10 U	10 U
<b>LT-C4L</b>																
4/15/2009	XX	LTCAIX325	28 U	28 U	28 U	71 U	28 U	410 E	410 E	28 U	28 U	28 U	28 U	28 U	28 U	28 U
4/28/2010	XX	LTCAIX318	9 U	9 U	9 U	24 U	9 U	70	70	9 U	9 U	9 U	9 U	9 U	9 U	9 U
4/27/2011	XX	LTCAIX46C				2 U		13	13	2 U			2 U			
4/24/2012	XX	LTCAIX51F	9.5 U	9.5 U	9.5 U	24 U	9.5 U	9.5 U	9.5 U	24 U	24 U	9.5 U	9.5 U	9.5 U	9.5 U	9.5 U

**Notes:**  
 TYPE - Sample Type Qualifier where D = Duplicate Sample.  
 Blank Cells appear when a parameter was not analyzed.

**Concentration Qualifier Notes:**  
 E - Compound exceeded upper level of calibration range and required dilution.  
 U - Not Detected above the reported sample detection limit.

**SUMMARY REPORT**  
 Semi-VOA (part 8 of 8)

(SW-LCH)	2,3,4,6-Tetrachlorophenol	O-Toluidine	1,2,4-Trichlorobenzene	2,4,5-Trichlorophenol	2,4,6-Trichlorophenol	1,3,5-Trinitrobenzene (sym-Trinitrobenzene)	Safrole
Date	Type	Sample ID	ug/L	ug/L	ug/L	ug/L	ug/L

**SW-LCH**

5/4/2004	XX	SWLCHX01F	10 U				
5/11/2005	XX	SWLCHX12H	10 U				
5/24/2006	XX	SWLCHX1DI	10 U				
5/15/2007	XX	SWLCHX2ZF	100 U				
5/21/2008	XX	SWLCHX2D3	10 U				

**LT-C4L**

4/15/2009	XX	LTC4LX325	28 U	28 U	28 U	28 U	28 U
4/28/2010	XX	LTC4LX348	9 U	24 U	9 U	9 U	9 U
4/27/2011	XX	LTC4LX49C		2 U	3 U		
4/24/2012	XX	LTC4LX51F	9.5 U	24 U	24 U	9.5 U	9.5 U

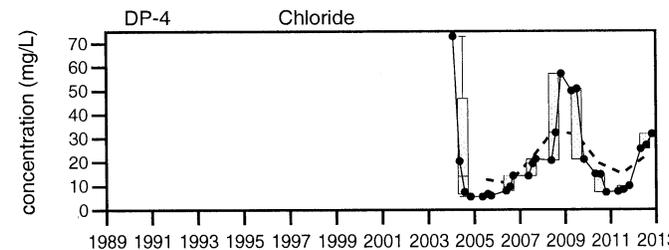
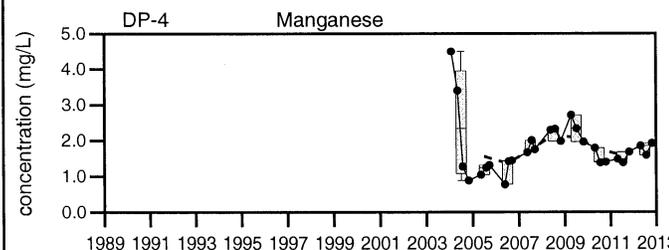
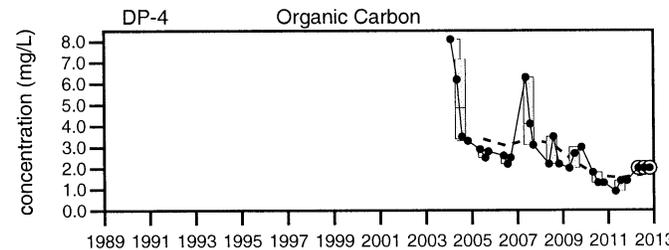
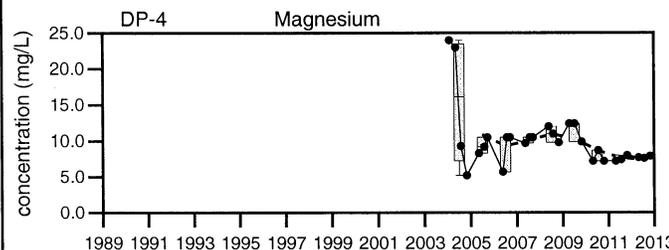
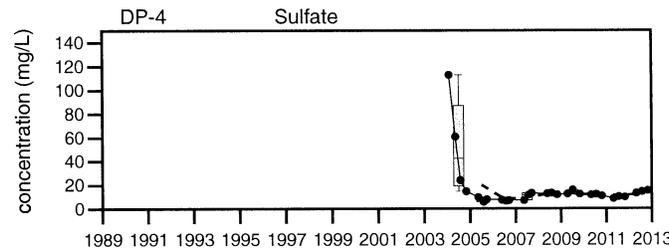
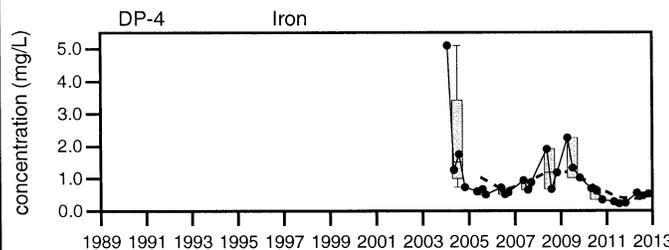
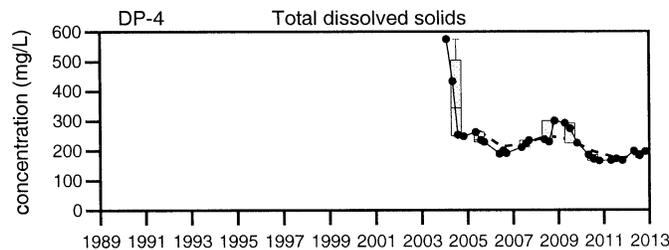
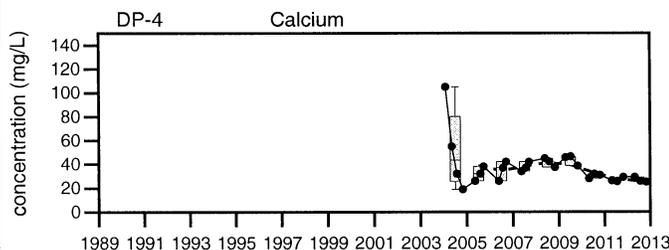
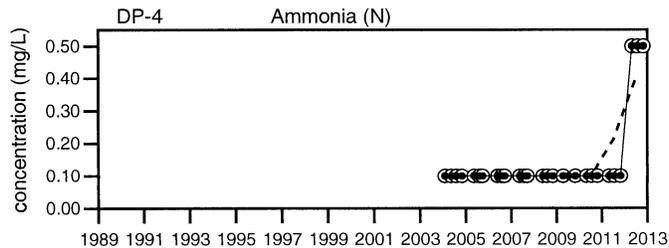
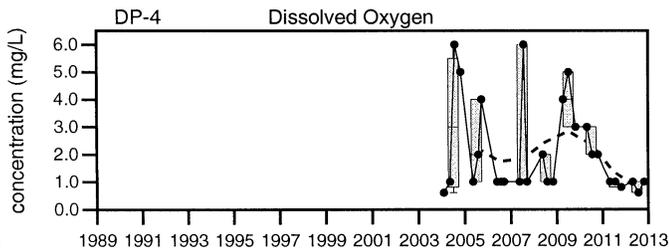
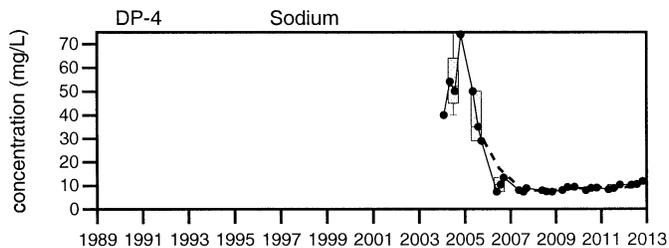
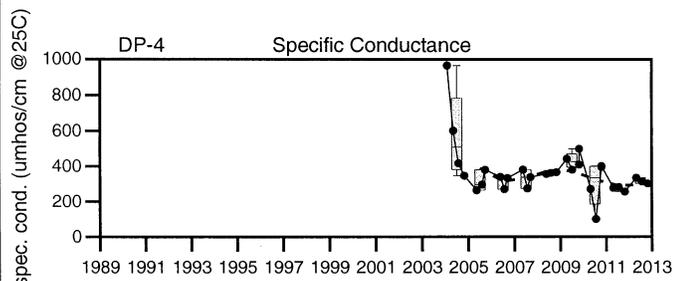
**Notes:** TYPE - Sample Type Qualifier where D = Duplicate Sample.  
 Blank Cells appear when a parameter was not analyzed.

**Concentration Qualifier Notes:**  
 U - Not Detected above the reported sample detection limit.

**APPENDIX C**

**2012 WATER QUALITY EVALUATION SHEETS  
AND BOX & WHISKER PLOTS**





**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
DP-4

Sevee & Maher Engineers, Inc.

# MW04-102

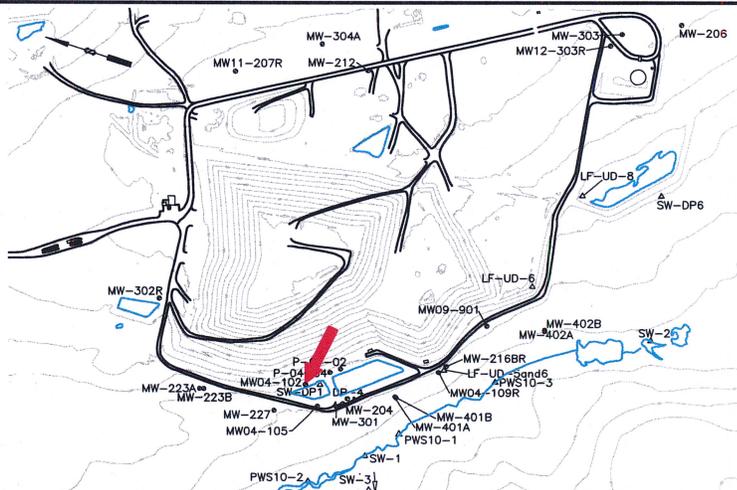
Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

MW04-102 monitors groundwater in the overburden downgradient of the landfill and upgradient of Stormwater Detention Pond-1.

Screen Interval: **10 ft. to 15 ft.**  
 Sampled: **3 Times Annually**  
 Sampled Since: **01/18/2005**  
 Material Screened: **Overburden**  
 Well Condition: **Good**  
 Sampling Method: **Low Flow**



## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Water Level Elevation (Feet)		164.22	<b>↓</b> 162.22	164.44	162.64	to 165.42	160 ± 0.16		22
Specific Conductance (µmhos/cm @25°C)		227	230	221	193	to 249	220 ± 3.6		22
pH (Standard Units)		8.1	7.9	7.7	7.1	to 8.2	7.8 ± 0.06		22
Alkalinity (CaCO3) (field) (mg/L)		120	100	45	40	to 170	98 ± 6.8		22
Arsenic (mg/L)		0.005	0.005 U	0.005 U	0.001 U	to 0.006	0.0027 ± 0.000		22
Cadmium (mg/L)		0.0006 U	0.0006 U	0.0006	0.0002 U	to 0.001	0.00035 ± 6E-05		22
Calcium (mg/L)		<b>↓</b> 23.5	25	<b>↑</b> 31.2	24	to 29	26 ± 0.29		22
Copper (mg/L)		0.003 U	0.003 U	0.003 U	0.001 U	to 0.004	0.0018 ± 0.000		22
Iron (mg/L)		0.05 U	0.05 U	0.05 U	0.02 U	to 0.13	0.04 ± 0.007		22
Magnesium (mg/L)		7.8	7.6	<b>↑</b> 8.1	6.4	to 8	7.1 ± 0.08		22
Manganese (mg/L)		0.05 U	0.05 U	0.05 U	0.02 U	to 0.09	0.026 ± 0.004		22
Nickel (mg/L)		0.005 U	0.005 U	0.005 U	0.002 U	to 0.012	0.0028 ± 0.000		22
Potassium (mg/L)		1.7	1.9	2	1.2	to 3.2	1.9 ± 0.1		22
Sodium (mg/L)		6.9	7.9	8.9	6.4	to 11	8 ± 0.27		22
Total Kjeldahl Nitrogen (mg/L)		0.35	<b>↑</b> 3.8	0.98	0.3 U	to 1.3	0.44 ± 0.06		22
Ammonia (N) (mg/L)		<b>↑</b> 0.5 U	<b>↑</b> 0.5 U	<b>↑</b> 0.5 U	0.1 U	to 0.1 U	0.1 ± 3E-10		22
Nitrate (N) (mg/L)		0.3 U	0.3 U	0.3 U	0.1 U	to 0.3	0.15 ± 0.01		22
Total Dissolved Solids (mg/L)		119	122	141	116	to 148	130 ± 1.9		22
Total Suspended Solids (mg/L)		4 U	4 U	4 U	4 U	to 5	4 ± 0.05		22
Sulfate (mg/L)		11.4	11.4	<b>↓</b> 6.7	7.3	to 14	9.3 ± 0.36		22
Bicarbonate (CaCO3) (mg/L)		102	101	107	73	to 109	100 ± 1.5		22
Organic Carbon (mg/L)		2 U	2 U	2 U	0.5	to 5.3	1.6 ± 0.25		22
Chemical Oxygen Demand (mg/L)		<b>↑</b> 10 U	<b>↑</b> 10 U	<b>↑</b> 10 U	3 U	to 9	3.5 ± 0.31		22
Chloride (mg/L)		2	1 U	1.1	1	to 3.5	2 ± 0.14		22
Turbidity (field) (NTU)		3.2	1.4	1.5	0	to 3.8	0.7 ± 0.2		22
Tannin & Lignins (Tannic Acid) (mg/L)		0.2 U	0.2 U	0.2 U	0.2 U	to 0.25	0.2 ± 0.003		18

**underlined/bold** - values exceed a regulatory standard listed below.

### Applicable Limits:

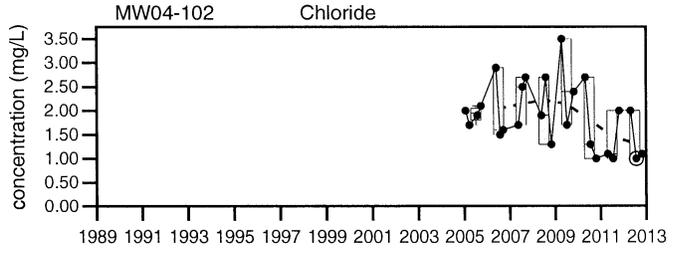
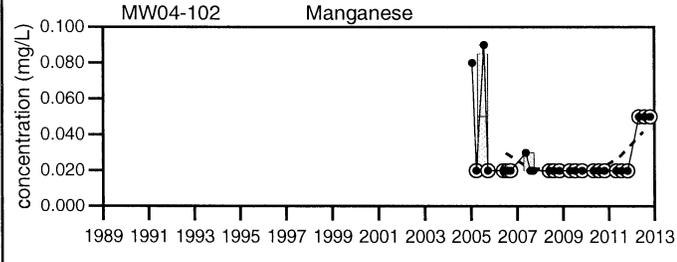
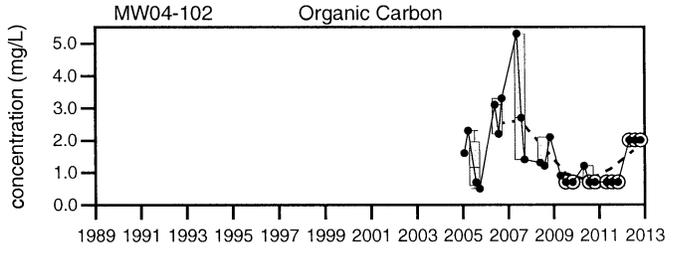
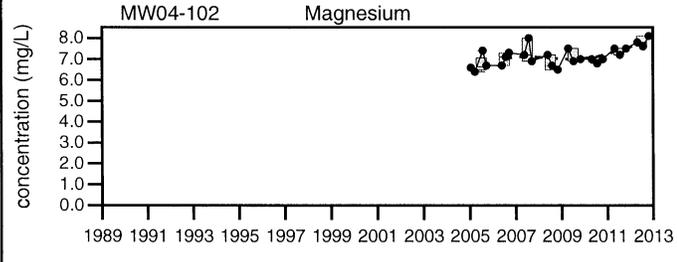
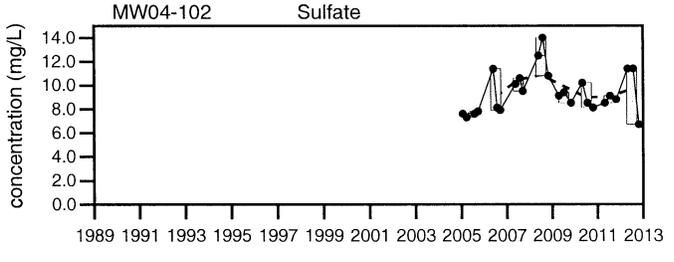
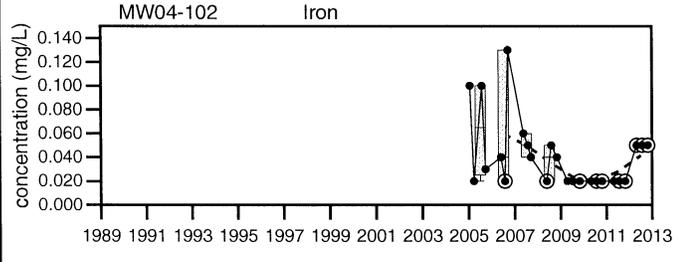
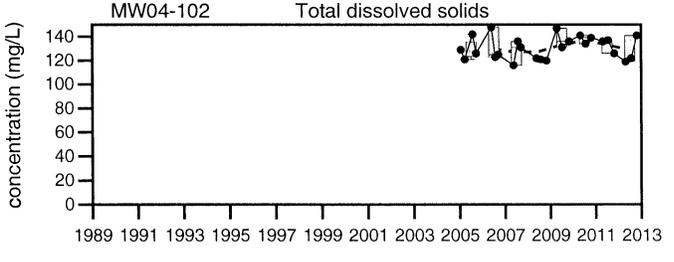
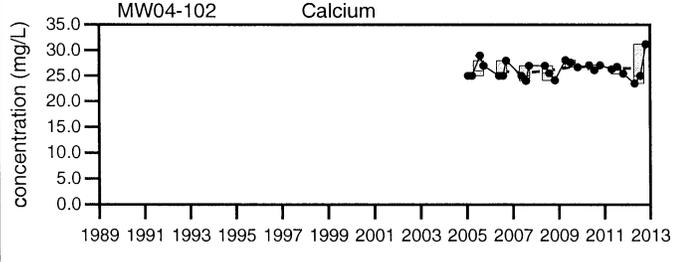
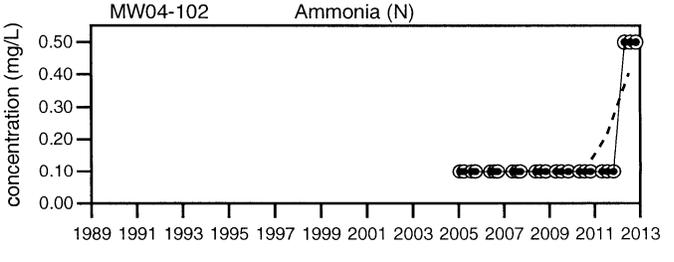
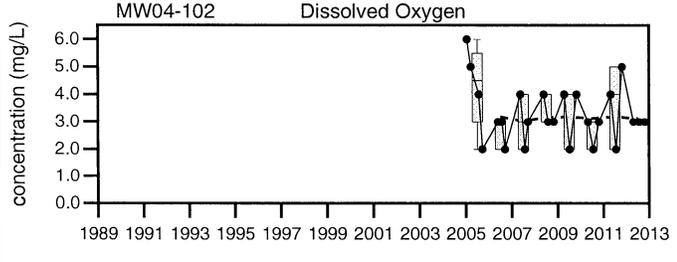
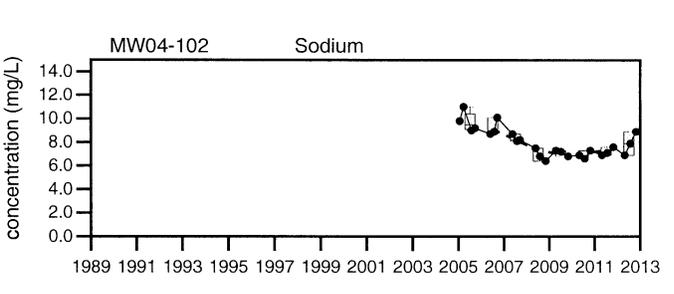
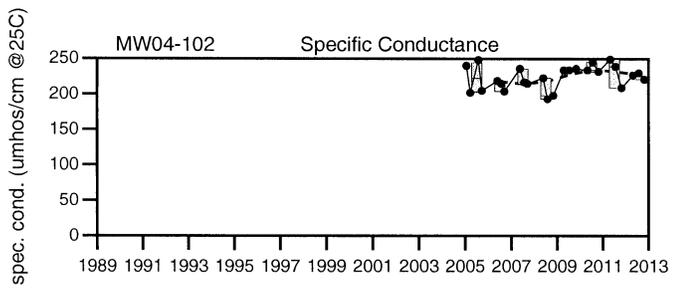
Nitrate (N) MCL=10 mg/L, MEG12=10 mg/L, Cadmium MCL=0.005 mg/L, MEG12=0.001 mg/L, Copper MCL=1.3 mg/L, MEG12=0.5 mg/L, Iron MEG12=5 mg/L, Manganese MEG12=0.5 mg/L, Nickel MEG12=0.02 mg/L, Arsenic MCL=0.01 mg/L, MEG12=0.01 mg/L, Ammonia (N) MEG12=30 mg/L, Sodium MEG12=20 mg/L

**↑** indicates a value greater than the historical maximum value; **↓** indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed.



**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- FFT smoothing of yearly mean values.
- Sample Event
- BDL

Juniper Ridge Landfill  
MW04-102

Sevee & Maher Engineers, Inc.

# MW04-105

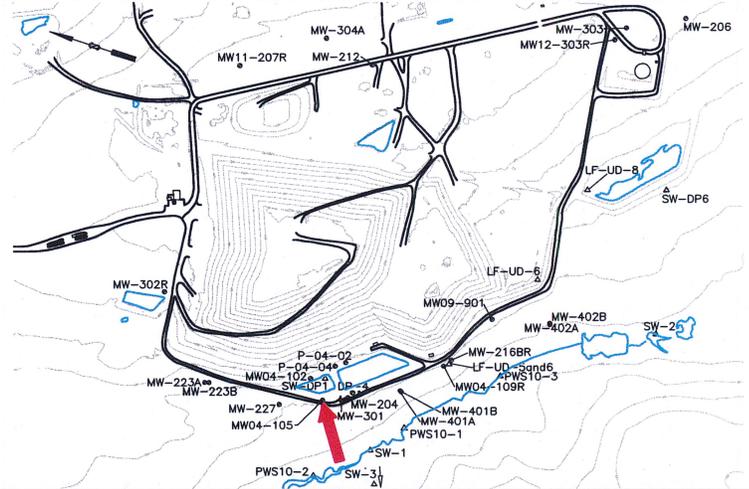
Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

MW04-105 monitors groundwater in the overburden downgradient of the landfill and Stormwater Detention Pond-1.

Screen Interval: **14.8 ft. to 19.8 ft.**  
 Sampled: **3 Times Annually**  
 Sampled Since: **01/17/2005**  
 Material Screened: **Overburden**  
 Well Condition: **Good**  
 Sampling Method: **Low Flow**



## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Water Level Elevation (Feet)		157.99	↓ 156.99	158.99	157.11	to 159.79	160 ± 0.14		22
Specific Conductance (µmhos/cm @25°C)		240	299	252	217	to 703	400 ± 24		22
pH (Standard Units)		7.4	7.1	7.2	6.1	to 7.7	6.9 ± 0.09		22
Alkalinity (CaCO3) (field) (mg/L)		160	160	70	70	to 240	150 ± 11		22
Arsenic (mg/L)		0.005 U	0.005 U	0.007	0.001 U	to 0.014	0.0043 ± 0.000		22
Cadmium (mg/L)		0.0006 U	0.0006 U	0.0006 U	0.0002 U	to 0.0021	0.00041 ± 1E-04		22
Calcium (mg/L)		23.7	27	27	22.7	to 75	44 ± 3.3		22
Copper (mg/L)		0.003 U	0.003 U	0.003 U	0.001 U	to 0.005	0.002 ± 0.000		22
Iron (mg/L)		0.05 U	0.05 U	0.05 U	0.02 U	to 0.11	0.046 ± 0.006		22
Magnesium (mg/L)		9.1	11.3	9.2	8.4	to 30	15 ± 1.2		22
Manganese (mg/L)		0.05 U	0.08	<b>0.59</b>	0.02 U	to 0.98	0.15 ± 0.05		22
Nickel (mg/L)		↑ 0.005 U	↑ 0.005 U	↑ 0.005 U	0.002 U	to 0.004	0.0023 ± 0.000		22
Potassium (mg/L)		1.5	1.4	1.3	1.3	to 2.8	1.7 ± 0.08		22
Sodium (mg/L)		12.1	12.4	↓ 8.7	11	to 32	19 ± 1.2		22
Total Kjeldahl Nitrogen (mg/L)		0.3 U	↑ 1	↑ 1	0.3 U	to 0.92	0.4 ± 0.03		22
Ammonia (N) (mg/L)		↑ 0.5 U	↑ 0.5 U	↑ 0.5 U	0.1 U	to 0.1	0.1 ± 3E-10		22
Nitrate (N) (mg/L)		↑ 0.3 U	↑ 0.3 U	↑ 0.3 U	0.1 U	to 0.2	0.11 ± 0.006		22
Total Dissolved Solids (mg/L)		164	156	160	141	to 432	250 ± 18		22
Total Suspended Solids (mg/L)		4 U	4 U	4 U	4 U	to 5	4 ± 0.05		22
Sulfate (mg/L)		6.4	7.7	↓ 4.2	4.5	to 115	30 ± 7.5		22
Bicarbonate (CaCO3) (mg/L)		105	125	117	100	to 225	160 ± 7.1		22
Organic Carbon (mg/L)		2 U	2 U	2 U	0.8	to 7.5	2.9 ± 0.35		22
Chemical Oxygen Demand (mg/L)		10 U	10 U	10 U	3 U	to 12	5.6 ± 0.66		22
Chloride (mg/L)		5.6	↓ 2.9	↓ 3	5	to 30.9	12 ± 1.2		22
Turbidity (field) (NTU)		1.7	1.1	1.3	0	to 1.8	0.55 ± 0.13		22
Tannin & Lignins (Tannic Acid) (mg/L)		0.2 U	0.2 U	0.2 U	0.2 U	to 0.22	0.2 ± 0.001		18

**underlined/bold** - values exceed a regulatory standard listed below.

### Applicable Limits:

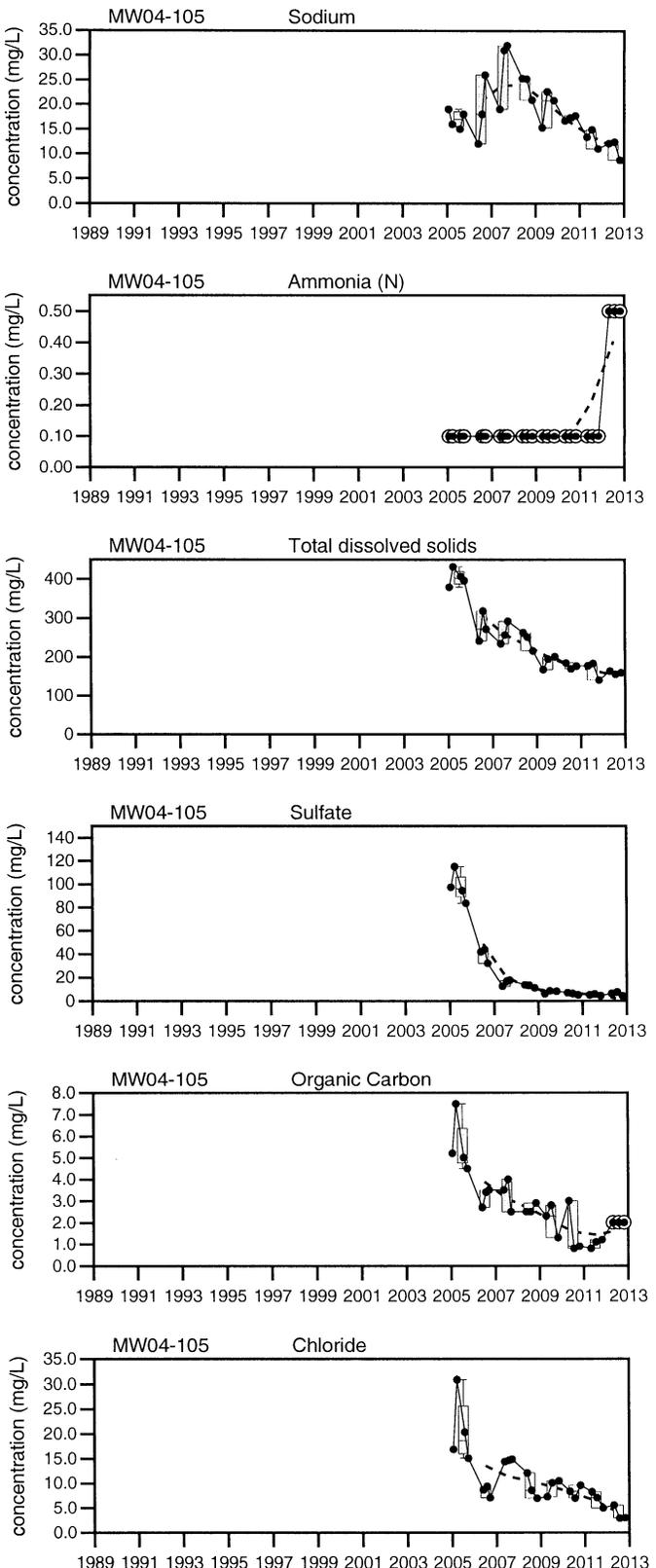
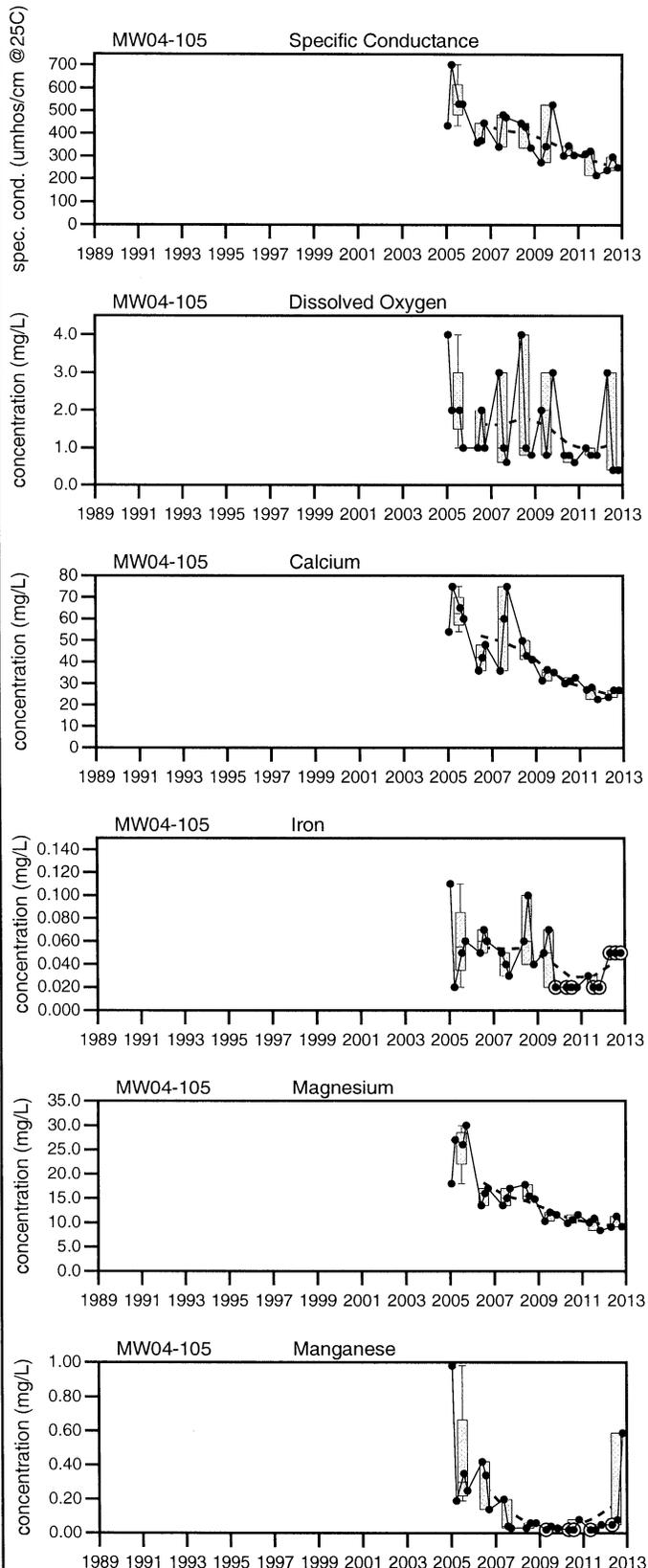
Nitrate (N) MCL=10 mg/L, MEG12=10 mg/L, Cadmium MCL=0.005 mg/L, MEG12=0.001 mg/L, Copper MCL=1.3 mg/L, MEG12=0.5 mg/L, Iron MEG12=5 mg/L, Manganese MEG12=0.5 mg/L, Nickel MEG12=0.02 mg/L, Arsenic MCL=0.01 mg/L, MEG12=0.01 mg/L, Ammonia (N) MEG12=30 mg/L, Sodium MEG12=20 mg/L

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed.



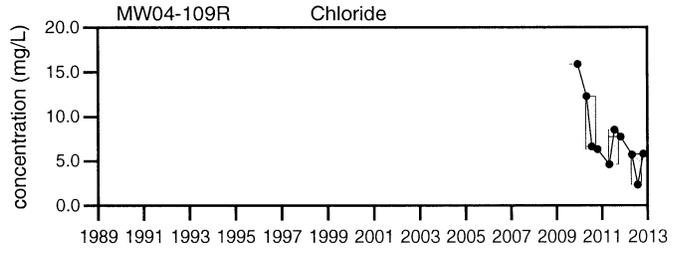
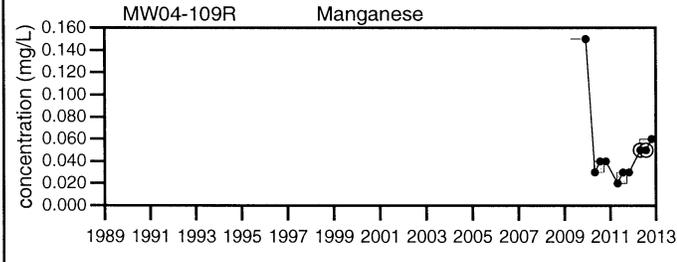
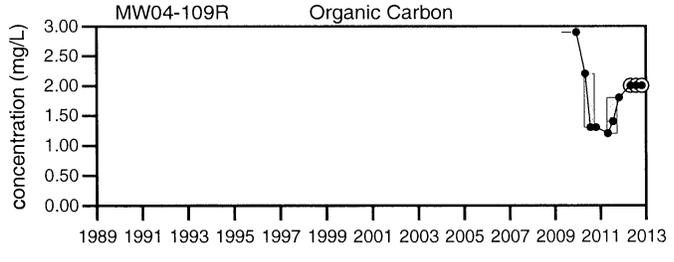
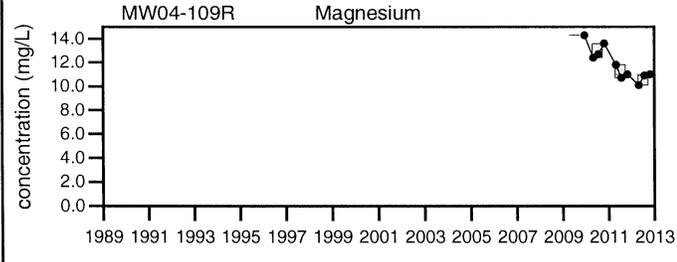
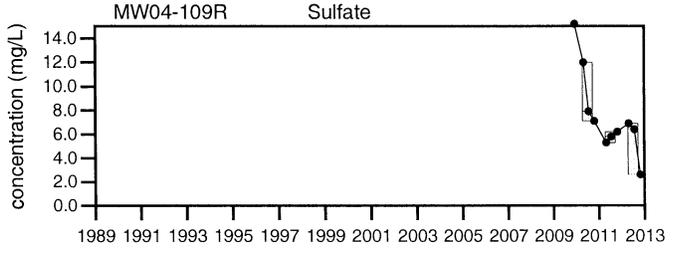
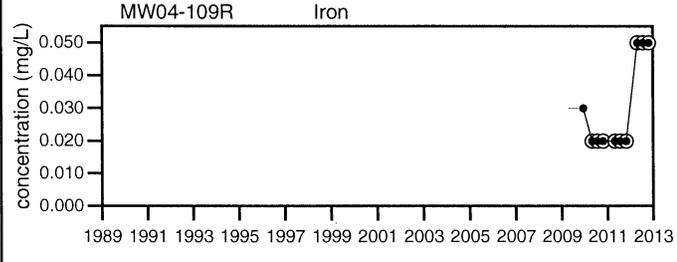
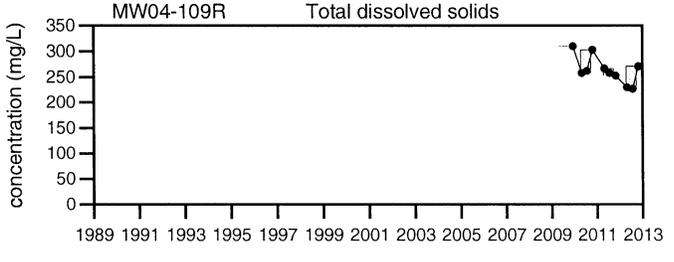
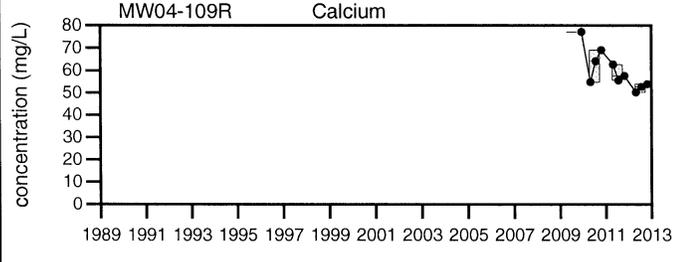
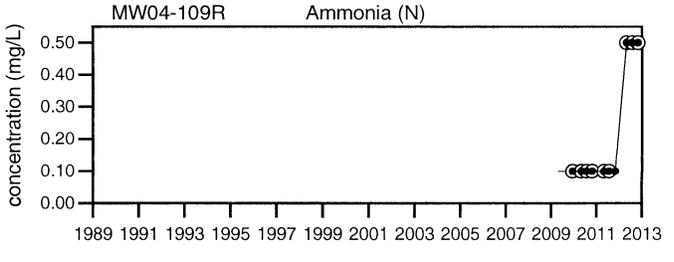
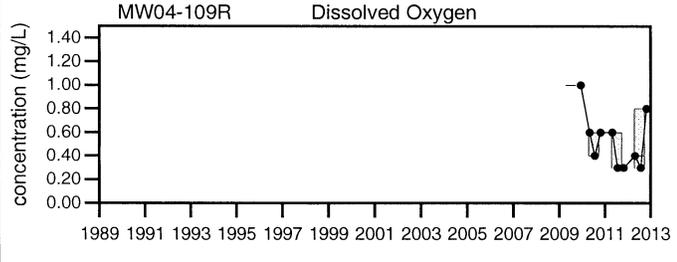
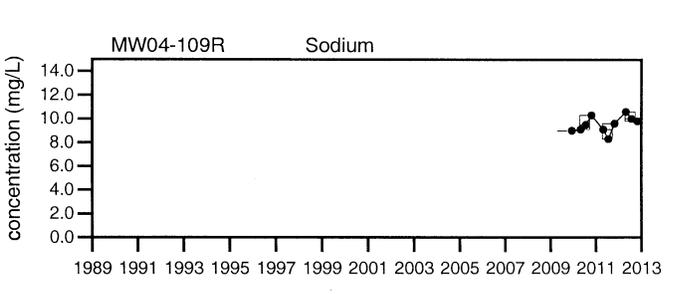
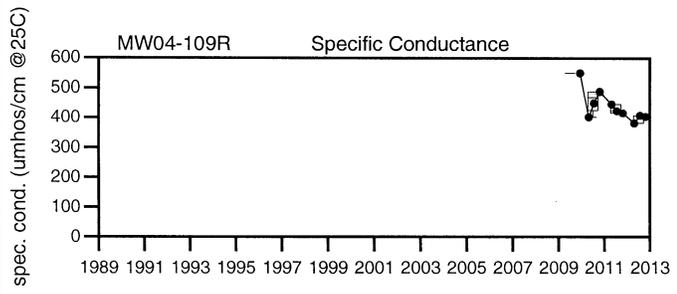
**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- - Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
MW04-105

Sevee & Maher Engineers, Inc.





**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- Sample Event
- BDL

Juniper Ridge Landfill  
MW04-109R

Sevee & Maher Engineers, Inc.

# MW09-901

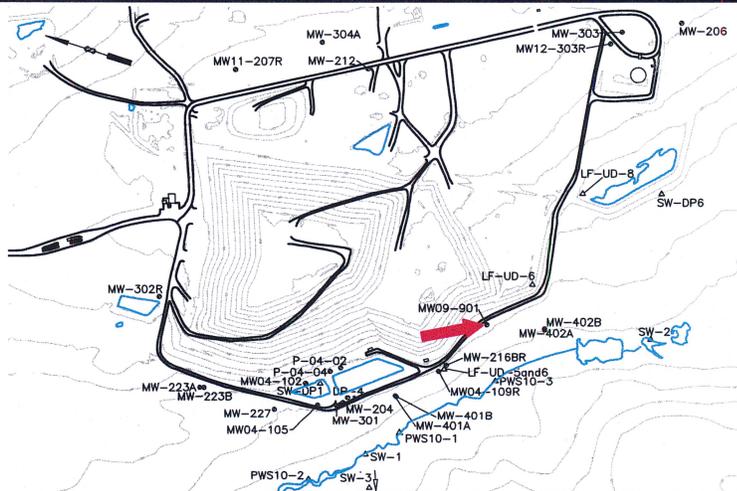
Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

MW09-901 is located to the south of Cell #5 and detention pond #2 of the expansion landfill. This well monitors water quality within the overburden downgradient of the landfill.

Screen Interval: **15 ft. to 20 ft.**  
 Sampled: **3 Times Annually**  
 Sampled Since: **12/08/2009**  
 Material Screened: **Overburden**  
 Well Condition: **Good**  
 Sampling Method: **Low Flow**



## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Water Level Elevation (Feet)		156.5	154.5	156.3	154.3 to 157.15		160 ± 0.38		7
Specific Conductance (µmhos/cm @25°C)	↓ 189	194	197		192 to 300		250 ± 15		7
pH (Standard Units)	↑ 8.4	7.9	7.6		7.4 to 8.2		7.8 ± 0.12		7
Alkalinity (CaCO3) (field) (mg/L)	100	↑ 120	100		50 to 105		76 ± 6.9		7
Arsenic (mg/L)	0.005	0.005	0.008		0.002 U to 0.013		0.0067 ± 0.002		7
Cadmium (mg/L)	↑ 0.0006 U	↑ 0.0006	↑ 0.0006 U		0.0002 U to 0.0003		0.00021 ± 1E-05		7
Calcium (mg/L)	↓ 18.8	21.2	↓ 19.9		21 to 29.6		26 ± 1.4		7
Copper (mg/L)	↑ 0.003 U	↑ 0.003	↑ 0.003 U		0.001 U to 0.001		0.001 ± 7E-12		7
Iron (mg/L)	0.05 U	0.05 U	0.05 U		0.02 U to 0.18		0.049 ± 0.02		7
Magnesium (mg/L)	↓ 5.4	6	6		5.9 to 8		6.7 ± 0.28		7
Manganese (mg/L)	0.05 U	0.05 U	0.05 U		0.02 U to 0.39		0.097 ± 0.05		7
Nickel (mg/L)	↑ 0.005 U	↑ 0.005 U	↑ 0.005 U		0.002 U to 0.003		0.0021 ± 0.000		7
Potassium (mg/L)	↓ 1.6	1.8	1.8		1.8 to 2.6		2.3 ± 0.11		7
Sodium (mg/L)	↓ 5.2	↓ 5.5	6.4		5.9 to 17.4		9 ± 1.6		7
Total Kjeldahl Nitrogen (mg/L)	0.3 U	0.3 U	0.3 U		0.3 U to 0.3 U		0.3 ± 2E-09		7
Ammonia (N) (mg/L)	↑ 0.5 U	↑ 0.5 U	↑ 0.5 U		0.1 U to 0.1 U		0.1 ± 6E-10		7
Nitrate (N) (mg/L)	↑ 0.3 U	↑ 0.3 U	↑ 0.3 U		0.1 U to 0.1 U		0.1 ± 6E-10		7
Total Dissolved Solids (mg/L)	↓ 103	↓ 108	118		109 to 193		140 ± 11		7
Total Suspended Solids (mg/L)	4 U	4 U	4 U		4 U to 4		4 ± 0		7
Sulfate (mg/L)	8.3	9.5	9		7 to 27.4		13 ± 2.6		7
Bicarbonate (CaCO3) (mg/L)	↓ 75	↓ 77	↓ 82		86 to 110		98 ± 3.8		7
Organic Carbon (mg/L)	↑ 2 U	↑ 2 U	↑ 2 U		0.7 U to 1.9		1.1 ± 0.2		7
Chemical Oxygen Demand (mg/L)	↑ 10 U	↑ 10 U	↑ 12		3 U to 4		3.1 ± 0.14		7
Chloride (mg/L)	2.2	↓ 1 U	2.5		1.2 to 5.1		2.6 ± 0.58		7
Turbidity (field) (NTU)	3.3	1	1.4		0.3 to 10.1		2.9 ± 1.3		7
Tannin & Lignins (Tannic Acid) (mg/L)	0.2 U	0.2 U	0.2 U		0.2 U to 0.2 U		0.2 ± 1E-09		7

underlined/bold - values exceed a regulatory standard listed below.

### Applicable Limits:

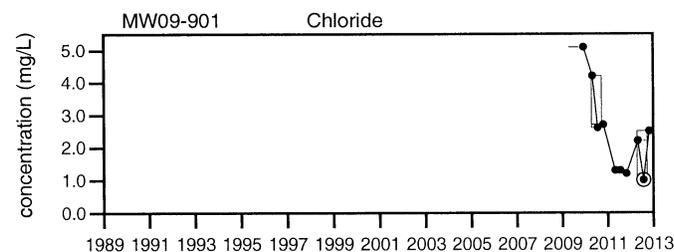
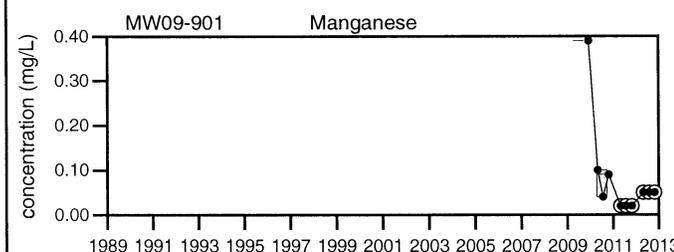
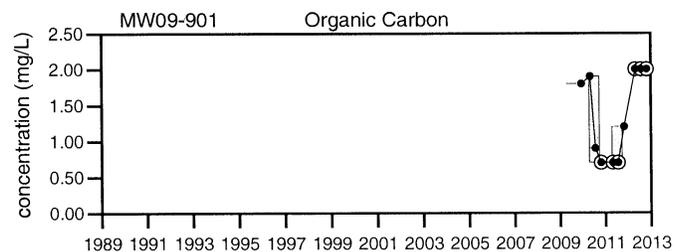
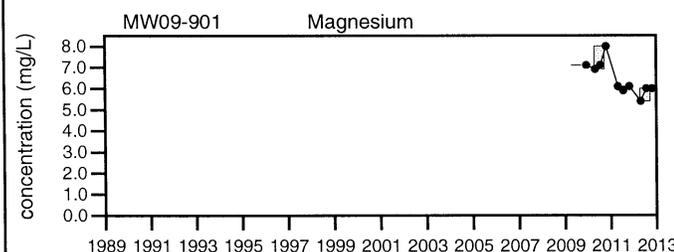
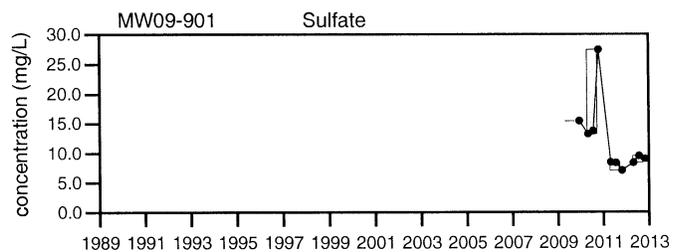
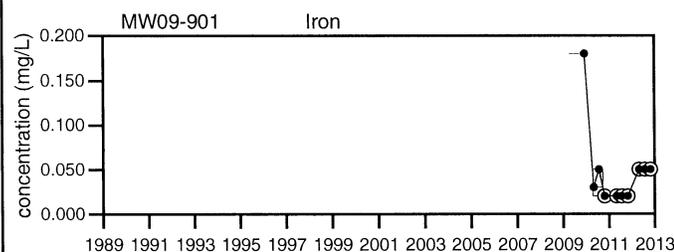
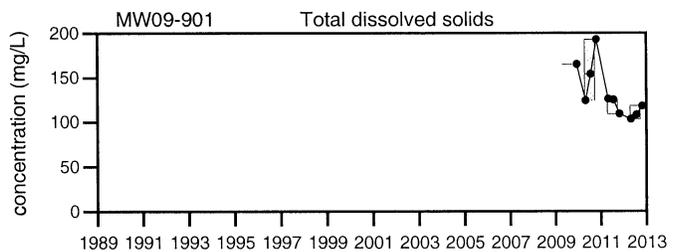
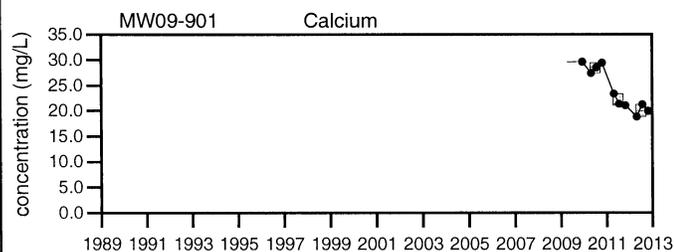
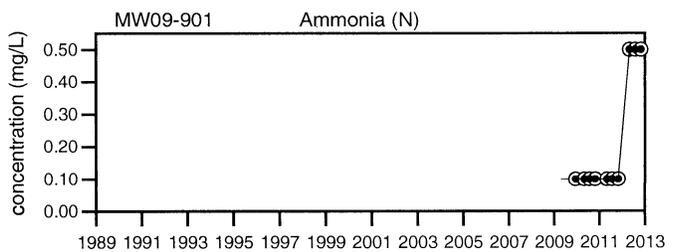
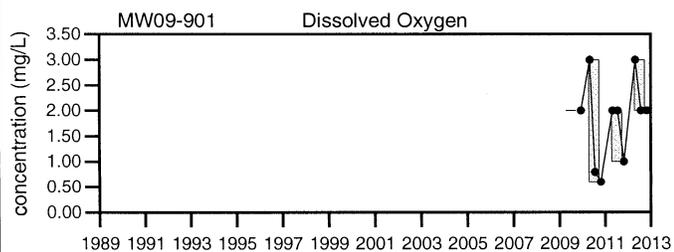
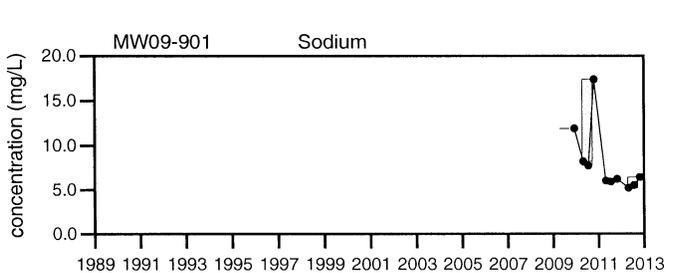
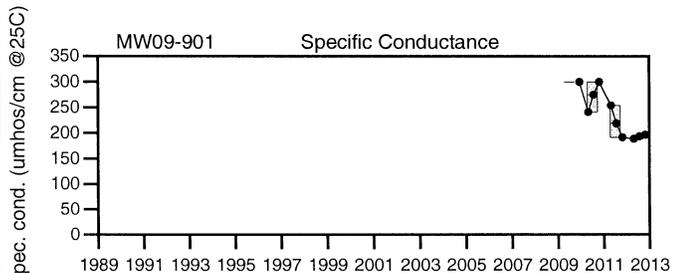
Nitrate (N) MCL=10 mg/L, MEG12=10 mg/L, Cadmium MCL=0.005 mg/L, MEG12=0.001 mg/L, Copper MCL=1.3 mg/L, MEG12=0.5 mg/L, Iron MEG12=5 mg/L, Manganese MEG12=0.5 mg/L, Nickel MEG12=0.02 mg/L, Arsenic MCL=0.01 mg/L, MEG12=0.01 mg/L, Ammonia (N) MEG12=30 mg/L, Sodium MEG12=20 mg/L

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed.



**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- Sample Event
- BDL

Juniper Ridge Landfill  
MW09-901

Sevee & Maher Engineers, Inc.

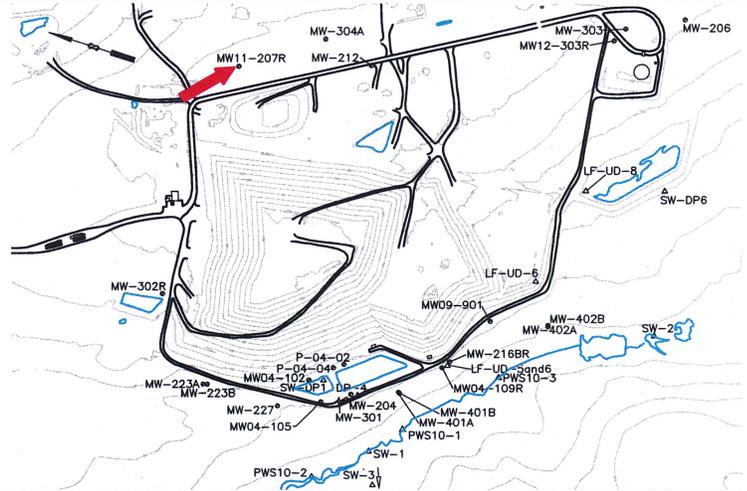
# MW11-207R

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

MW11-207R monitors bedrock groundwater quality upgradient of the landfill. This well replaced MW-207.



Screen Interval: **39.5 ft. to 44.5 ft.**  
 Sampled: **3 Times Annually**  
 Sampled Since: **07/20/2011**  
 Material Screened: **Bedrock**  
 Well Condition: **Good**  
 Sampling Method: **Low Flow**

## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Water Level Elevation (Feet)			↓ 203.03	↑ 208.56	203.13 to 203.63		200 ± 0.25		2
Specific Conductance (µmhos/cm @25°C)	↑ 103	85		↑ 88	83 to 87		85 ± 2		2
pH (Standard Units)	↑ 8.1	↓ 7.7		↓ 7.7	7.9 to 8		8 ± 0.05		2
Alkalinity (CaCO3) (field) (mg/L)	↑ 40	↑ 40		↓ 25	30 to 35		33 ± 2.5		2
Arsenic (mg/L)		0.005 U	0.005 U	0.005 U	0.004 to 0.008		0.006 ± 0.002		2
Cadmium (mg/L)	↑ 0.0006 U	↑ 0.0006 U	↑ 0.0006 U	↑ 0.0006 U	0.0002 U to 0.0005		0.00035 ± 0.000		2
Calcium (mg/L)	↓ 7.9	8.3		↑ 9.3	8.2 to 8.5		8.4 ± 0.15		2
Copper (mg/L)	↑ 0.003 U	↑ 0.003 U	↑ 0.003 U	↑ 0.003 U	0.001 U to 0.001 U		0.001 ± 0		2
Iron (mg/L)	↑ 0.05 U	↑ 0.05 U	↑ 0.05 U	↑ 0.05 U	0.02 U to 0.02 U		0.02 ± 0		2
Magnesium (mg/L)	2.9	2.7		↑ 3.3	2.6 to 2.9		2.8 ± 0.15		2
Manganese (mg/L)	↑ 0.05 U	↑ 0.05 U	↑ 0.05 U	↑ 0.05 U	0.02 U to 0.02 U		0.02 ± 0		2
Nickel (mg/L)	↑ 0.005 U	↑ 0.005 U	↑ 0.005 U	↑ 0.005 U	0.002 U to 0.002 U		0.002 ± 0		2
Potassium (mg/L)	0.5	↓ 0.4		0.5	0.5 to 0.5		0.5 ± 0		2
Sodium (mg/L)	↑ 3.7	↓ 3.3		↑ 3.9	3.6 to 3.6		3.6 ± 0		2
Total Kjeldahl Nitrogen (mg/L)	0.3 U	0.3 U		↑ 0.93	0.3 U to 0.48		0.39 ± 0.09		2
Ammonia (N) (mg/L)	↑ 0.5 U	↑ 0.5 U	↑ 0.5 U	↑ 0.5 U	0.1 U to 0.1 U		0.1 ± 0		2
Nitrate (N) (mg/L)	↑ 0.3 U	↑ 0.3 U	↑ 0.3 U	↑ 0.3 U	0.2 to 0.2		0.2 ± 0		2
Total Dissolved Solids (mg/L)	69	↑ 72		69	61 to 70		66 ± 4.5		2
Total Suspended Solids (mg/L)	4 U	4 U		4 U	4 U to 4 U		4 ± 0		2
Sulfate (mg/L)	↑ 2 U	↑ 2 U		↑ 2 U	1 to 1.3		1.2 ± 0.15		2
Bicarbonate (CaCO3) (mg/L)	↑ 40	↑ 42		↑ 39	36 to 37		37 ± 0.5		2
Organic Carbon (mg/L)	↑ 2 U	↑ 2 U		↑ 2 U	0.7 U to 0.7 U		0.7 ± 0		2
Chemical Oxygen Demand (mg/L)	↑ 10 U	↑ 10 U		↑ 10 U	3 U to 3 U		3 ± 0		2
Chloride (mg/L)	2.1	↓ 1.3		2	1.4 to 2.1		1.8 ± 0.35		2
Turbidity (field) (NTU)	↑ 3	↑ 2.5		1.7	1.6 to 1.7		1.7 ± 0.05		2
Tannin & Lignins (Tannic Acid) (mg/L)		0.2 U	0.2 U	0.2 U	0.2 U to 0.2 U		0.2 ± 0		2

underlined/bold - values exceed a regulatory standard listed below.

### Applicable Limits:

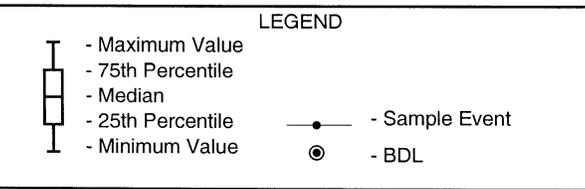
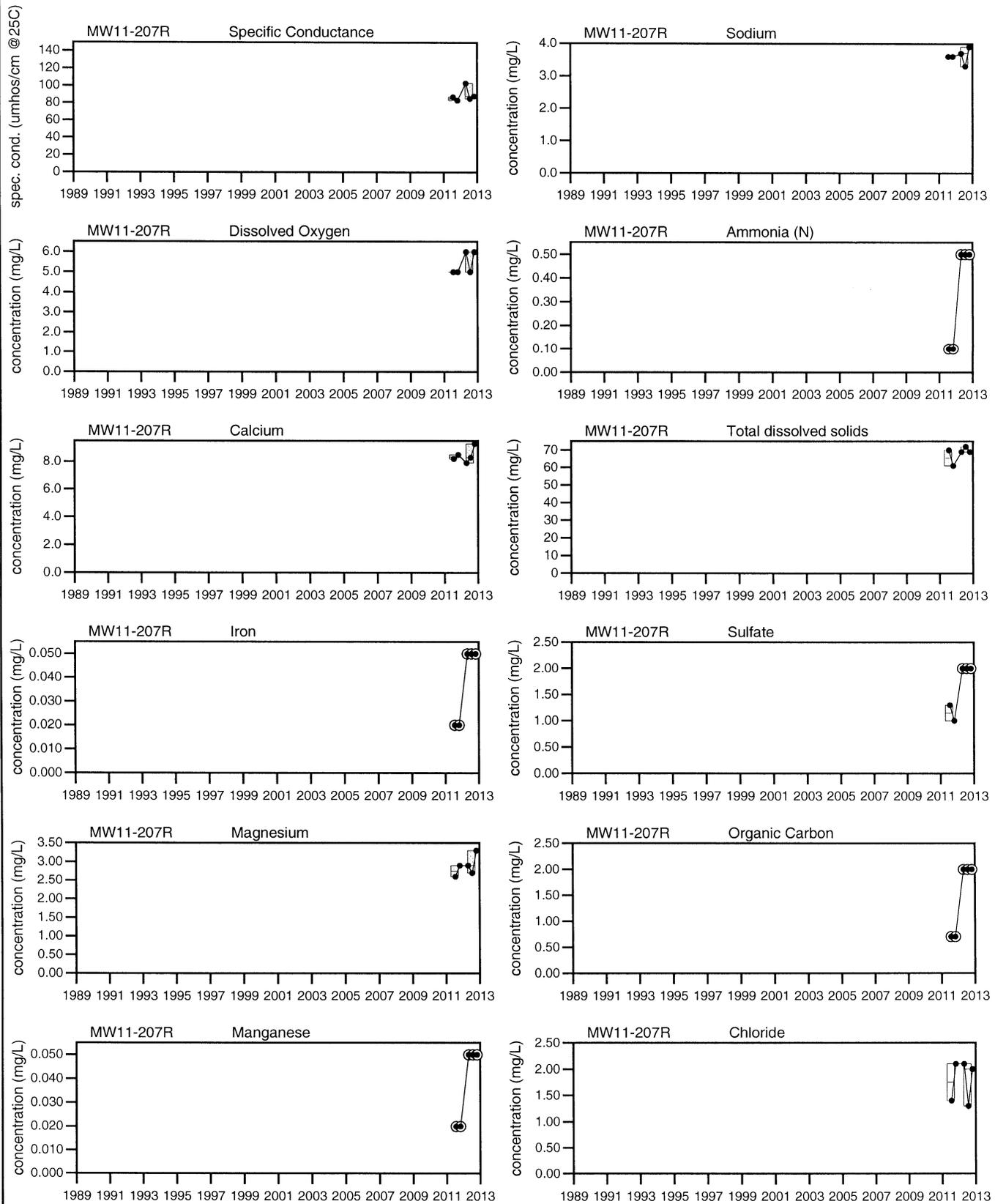
Nitrate (N) MCL=10 mg/L, MEG12=10 mg/L, Cadmium MCL=0.005 mg/L, MEG12=0.001 mg/L, Copper MCL=1.3 mg/L, MEG12=0.5 mg/L, Iron MEG12=5 mg/L, Manganese MEG12=0.5 mg/L, Nickel MEG12=0.02 mg/L, Arsenic MCL=0.01 mg/L, MEG12=0.01 mg/L, Ammonia (N) MEG12=30 mg/L, Sodium MEG12=20 mg/L

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed.



Juniper Ridge Landfill  
MW11-207R

Sevee & Maher Engineers, Inc.

# MW12-303R

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

MW12-303R was installed in September 2012 to replace MW-303. MW12-303R monitors the background water quality at the site upgradient of the landfill.

Screen Interval: **30.4 ft. to 40.4 ft.**

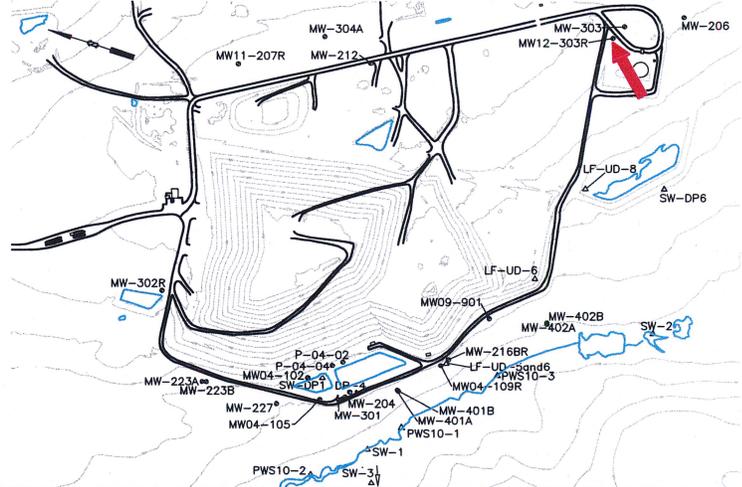
Sampled: **3 Times Annually**

Sampled Since: **10/23/12**

Material Screened: **Overburden**

Well Condition: **Good**

Sampling Method: **Low Flow**



## Chemical Summary

### 2012

### Historical

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance (µmhos/cm @25°C)				189	No historical data for Specific Conductance.				
pH (Standard Units)				7	No historical data for pH.				
Alkalinity (CaCO3) (field) (mg/L)				80	No historical data for Alkalinity (CaCO3) (field).				
Arsenic (mg/L)				0.005 U	No historical data for Arsenic.				
Cadmium (mg/L)				0.0006 U	No historical data for Cadmium.				
Calcium (mg/L)				16.6	No historical data for Calcium.				
Copper (mg/L)				0.003 U	No historical data for Copper.				
Iron (mg/L)				0.1	No historical data for Iron.				
Magnesium (mg/L)				7.8	No historical data for Magnesium.				
Manganese (mg/L)				0.32	No historical data for Manganese.				
Nickel (mg/L)				0.005 U	No historical data for Nickel.				
Potassium (mg/L)				1.5	No historical data for Potassium.				
Sodium (mg/L)				10.4	No historical data for Sodium.				
Total Kjeldahl Nitrogen (mg/L)				0.3 U	No historical data for Total Kjeldahl Nitrogen.				
Ammonia (N) (mg/L)				0.5 U	No historical data for Ammonia (N).				
Nitrate (N) (mg/L)				0.3 U	No historical data for Nitrate (N).				
Total Dissolved Solids (mg/L)				143	No historical data for Total Dissolved Solids.				
Total Suspended Solids (mg/L)				4 U	No historical data for Total Suspended Solids.				
Sulfate (mg/L)				4.2	No historical data for Sulfate.				
Bicarbonate (CaCO3) (mg/L)				92	No historical data for Bicarbonate (CaCO3).				
Organic Carbon (mg/L)				2 U	No historical data for Organic Carbon.				
Chemical Oxygen Demand (mg/L)				10 U	No historical data for Chemical Oxygen Demand.				
Chloride (mg/L)				4.9	No historical data for Chloride.				
Turbidity (field) (NTU)				9.3	No historical data for Turbidity (field).				
Tannin & Lignins (Tannic Acid) (mg/L)				0.2 U	No historical data for Tannin & Lignins (Tannic Acid).				

underlined/bold - values exceed a regulatory standard listed below.

### Applicable Limits:

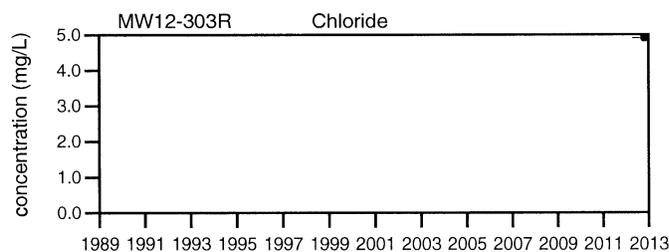
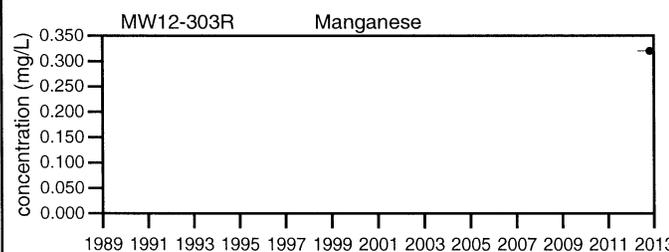
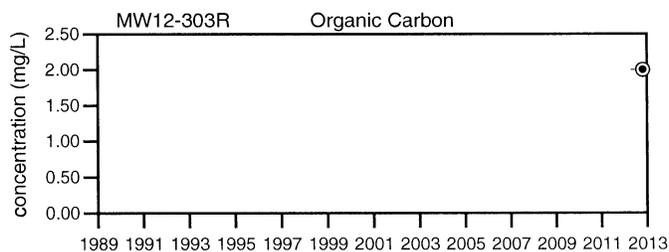
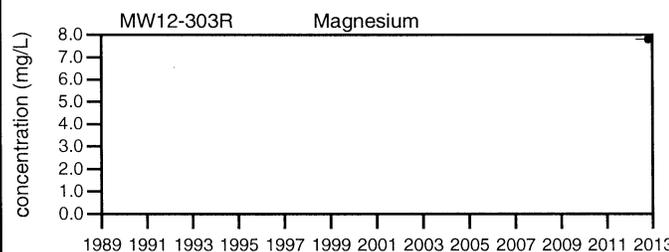
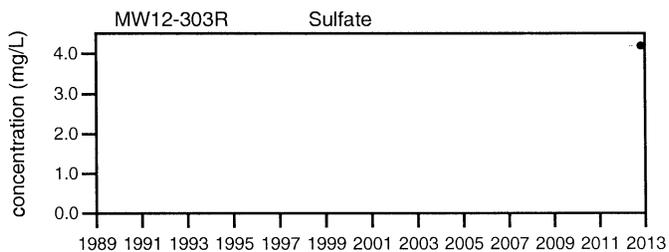
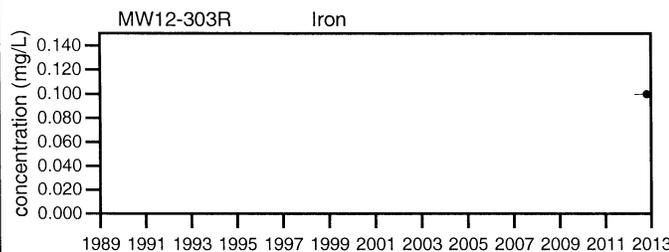
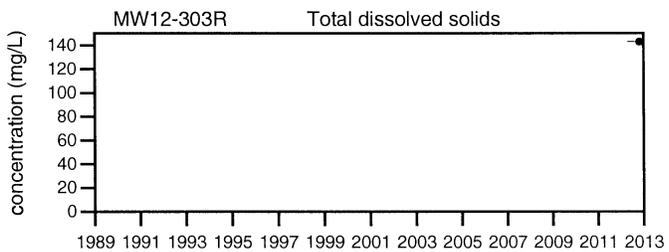
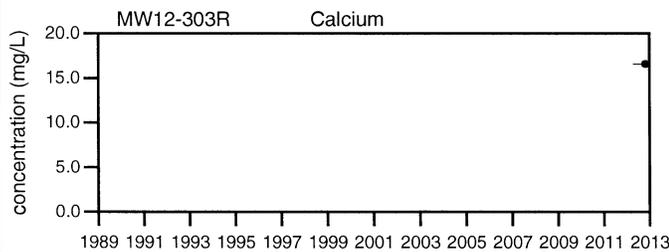
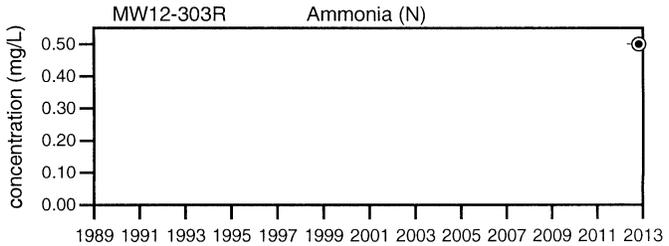
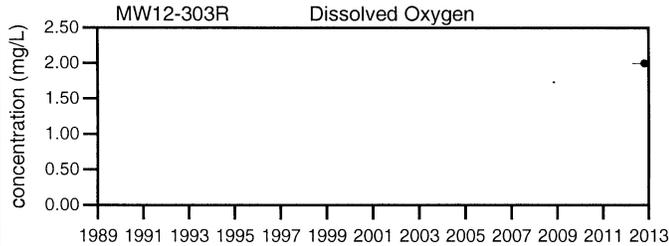
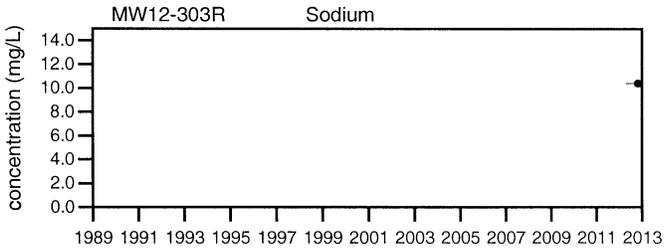
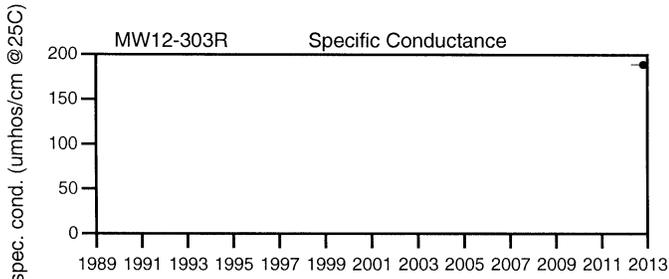
Nitrate (N) MCL=10 mg/L, MEG12=10 mg/L, Cadmium MCL=0.005 mg/L, MEG12=0.001 mg/L, Copper MCL=1.3 mg/L, MEG12=0.5 mg/L, Iron MEG12=5 mg/L, Manganese MEG12=0.5 mg/L, Nickel MEG12=0.02 mg/L, Arsenic MCL=0.01 mg/L, MEG12=0.01 mg/L, Ammonia (N) MEG12=30 mg/L, Sodium MEG12=20 mg/L

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed.



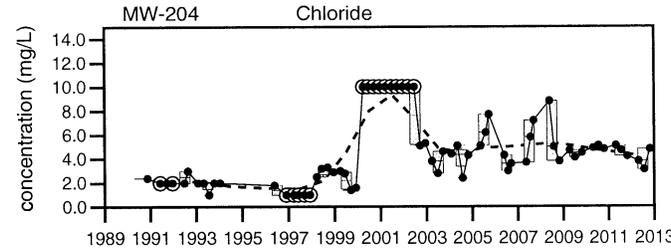
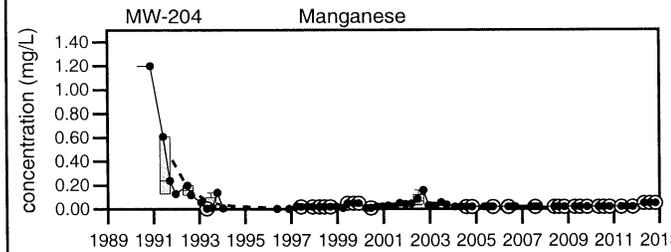
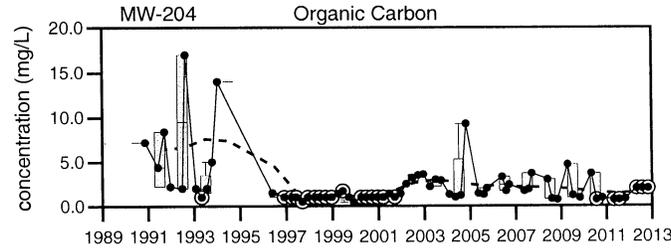
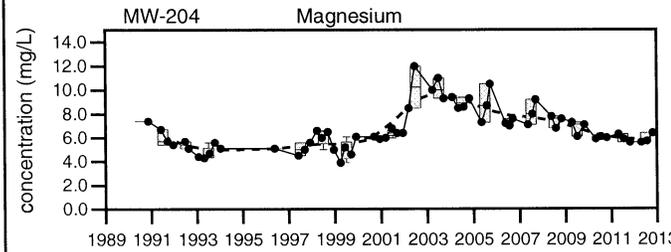
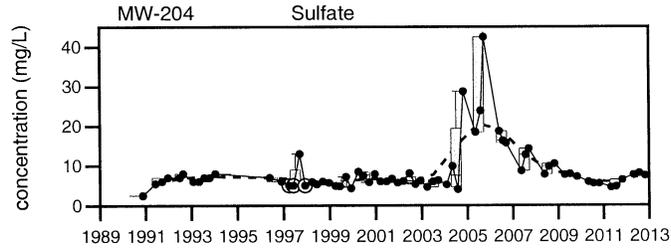
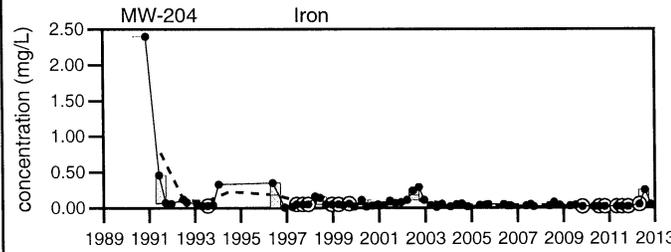
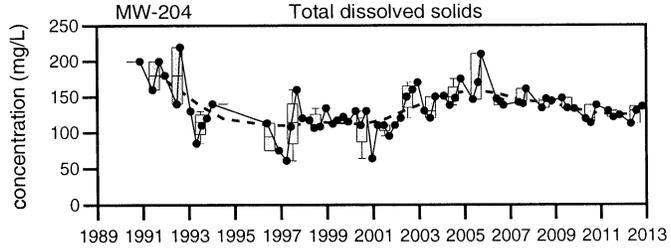
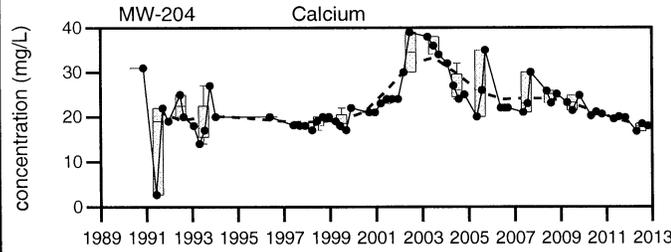
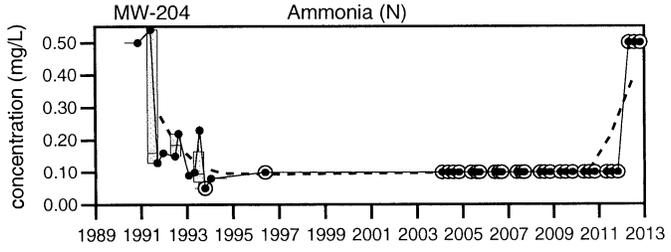
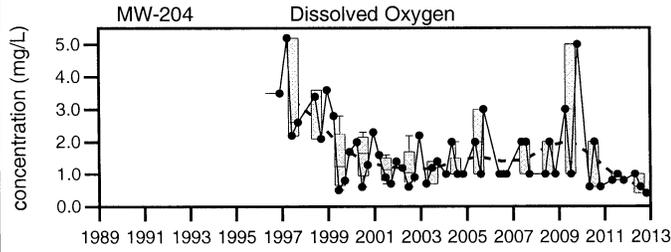
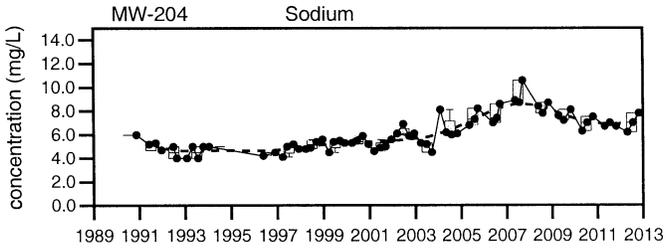
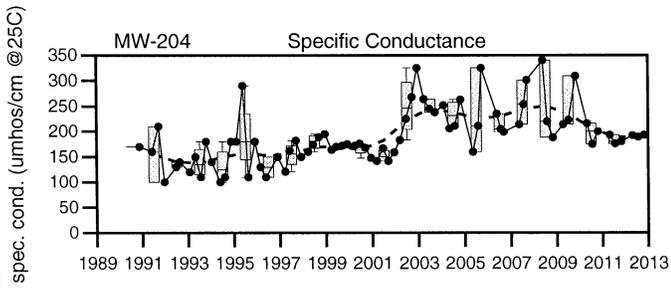
**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- Sample Event
- BDL

Juniper Ridge Landfill  
MW12-303R

Sevee & Maher Engineers, Inc.





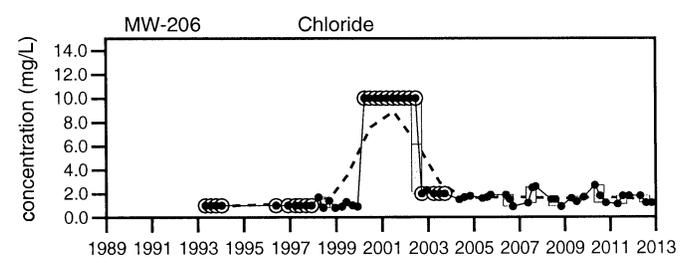
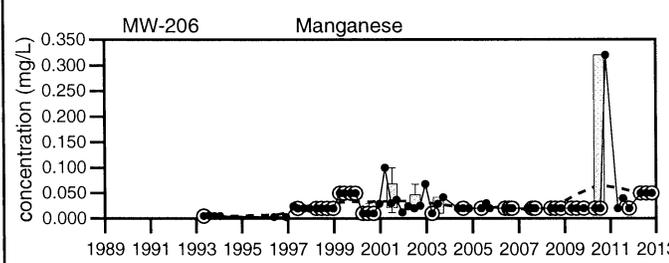
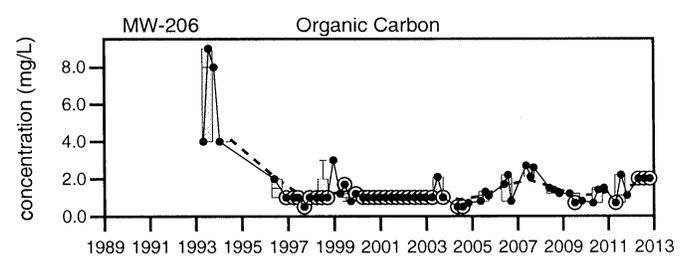
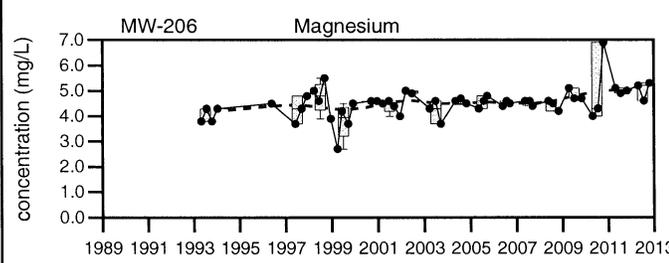
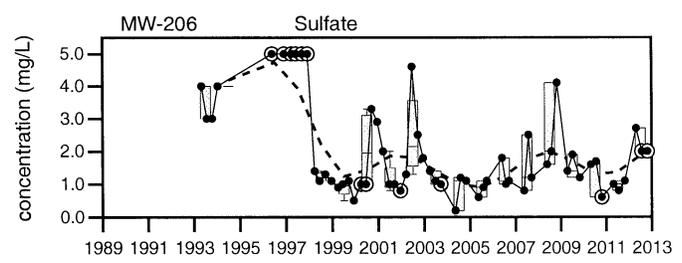
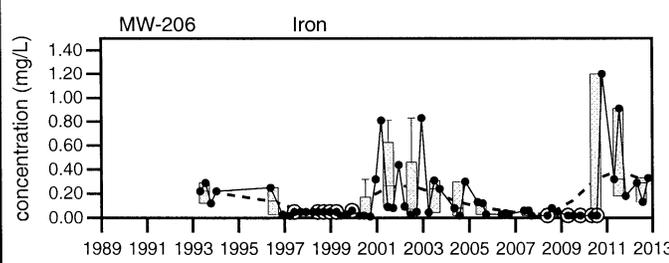
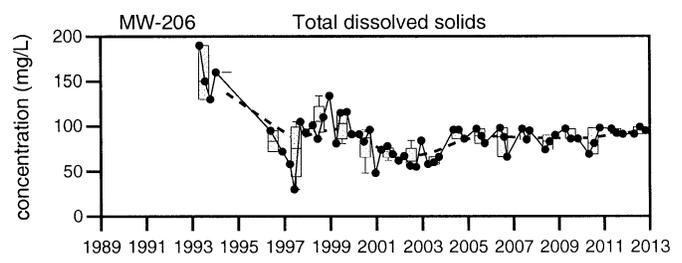
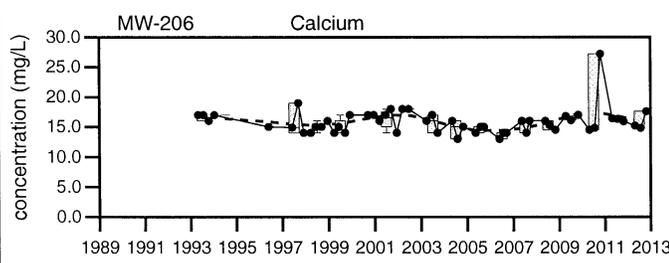
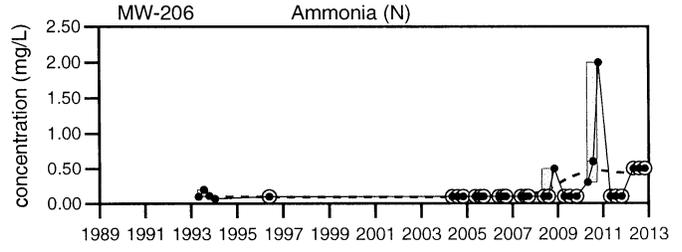
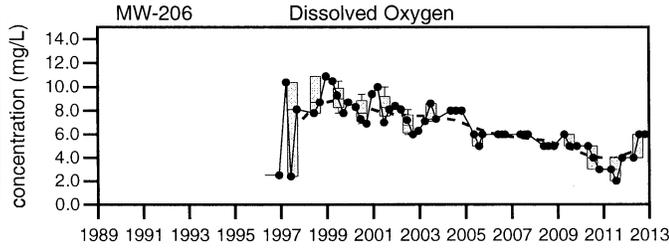
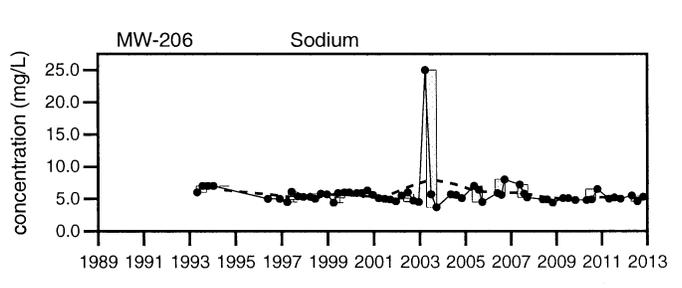
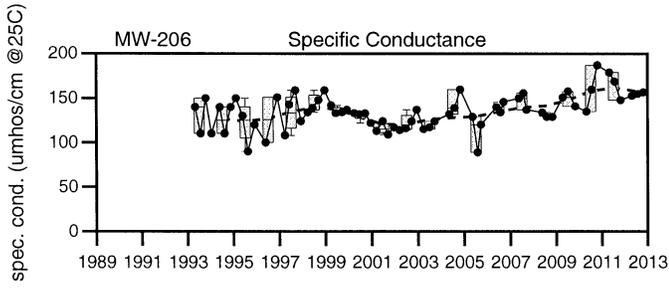
**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- FFT smoothing of yearly mean values.
- Sample Event
- BDL

Juniper Ridge Landfill  
MW-204

Sevee & Maher Engineers, Inc.





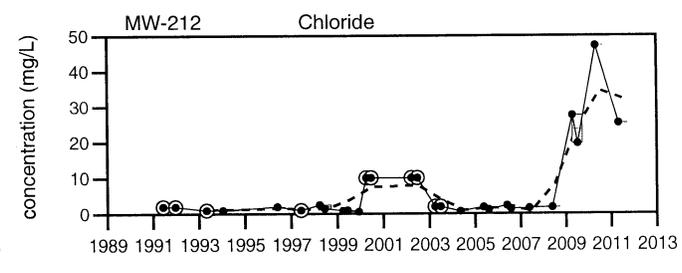
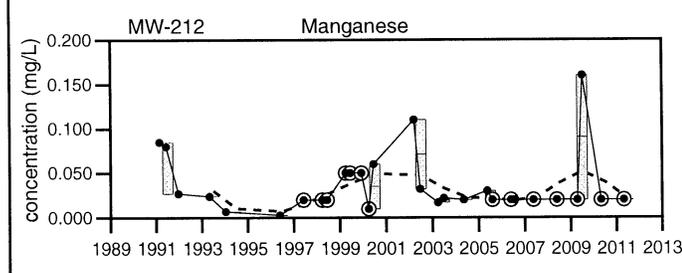
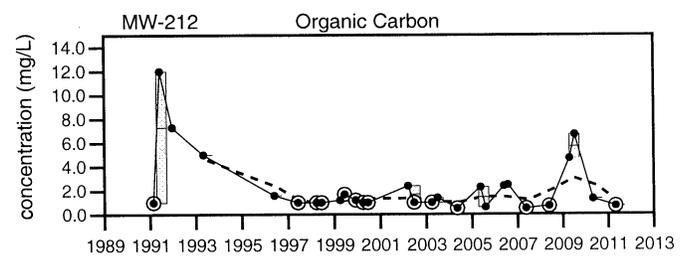
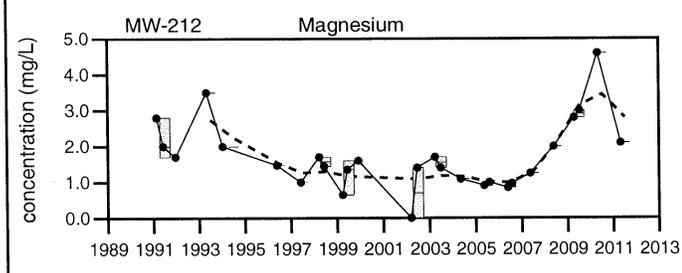
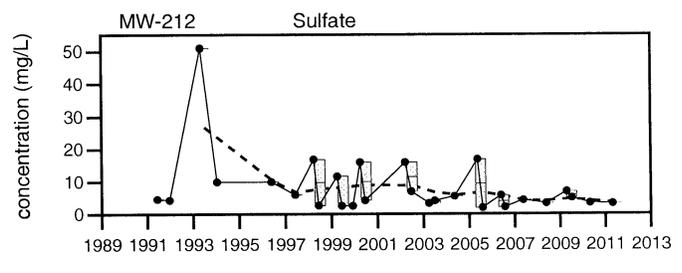
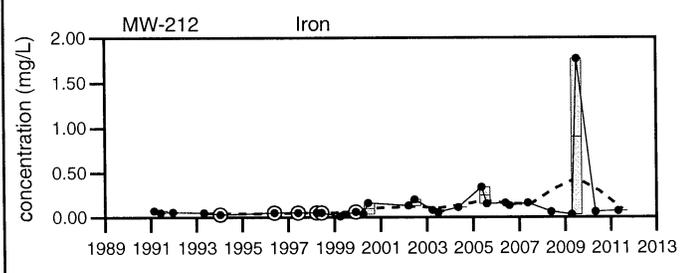
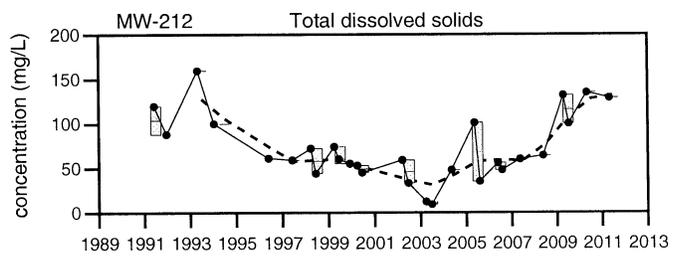
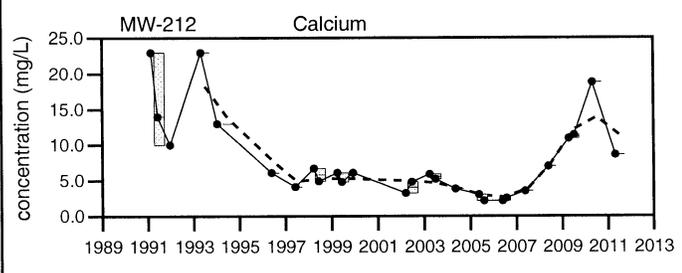
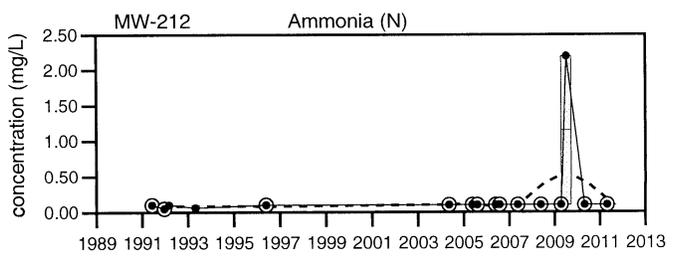
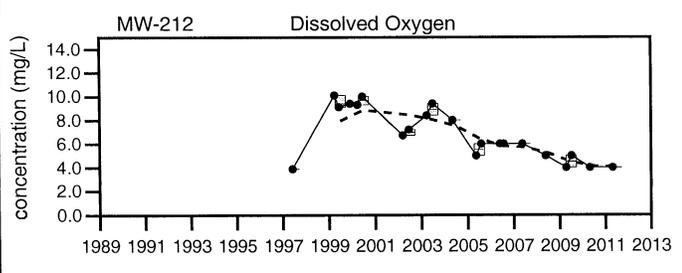
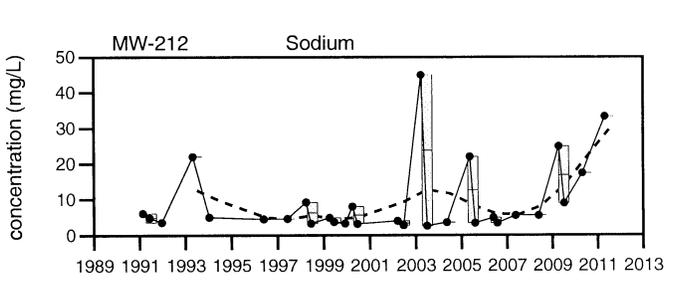
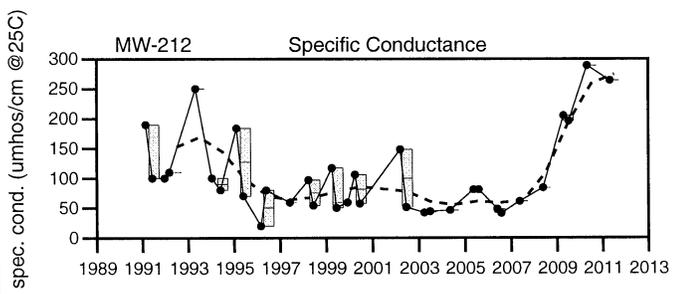
**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- Sample Event
- ⊙ - BDL

## Juniper Ridge Landfill MW-206

Sevee & Maher Engineers, Inc.





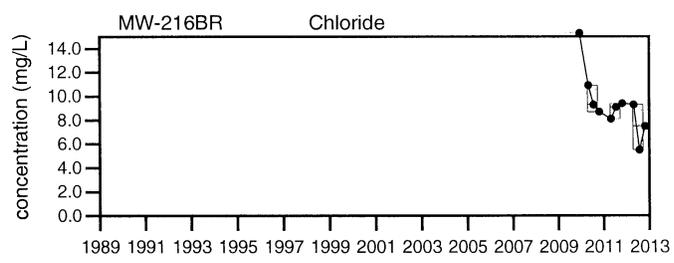
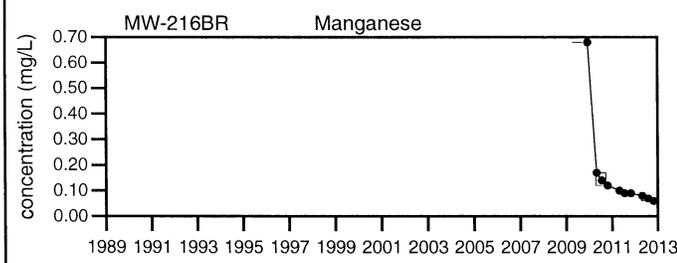
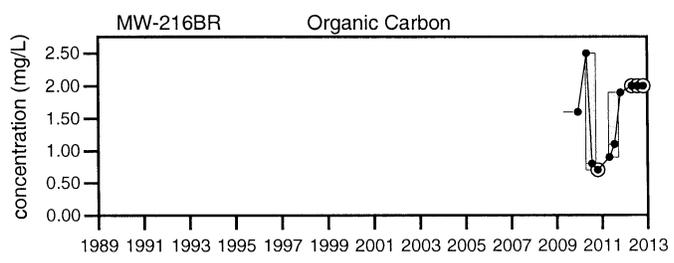
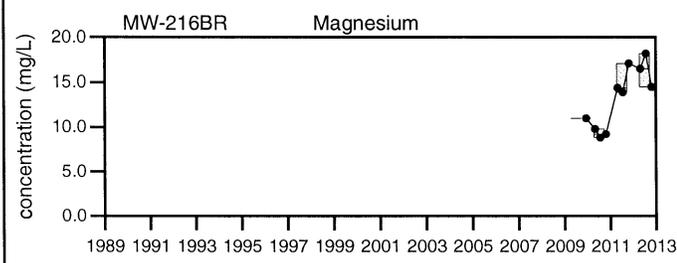
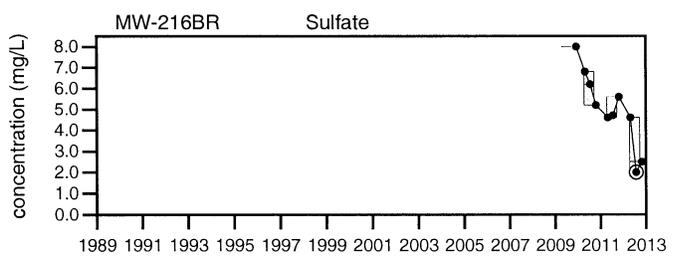
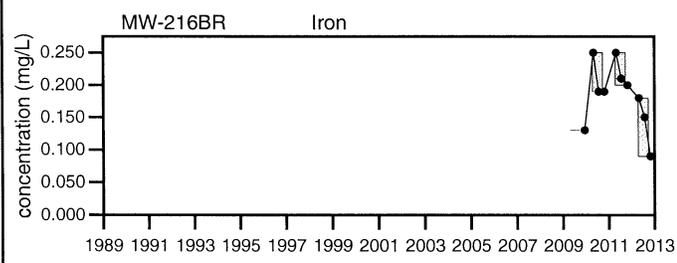
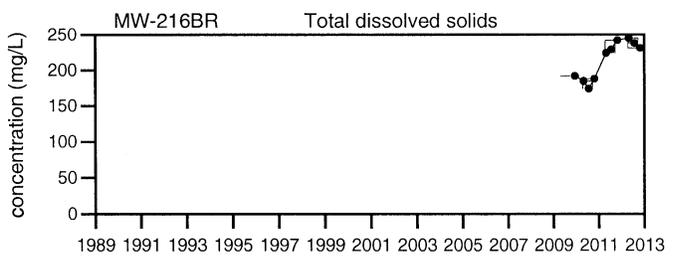
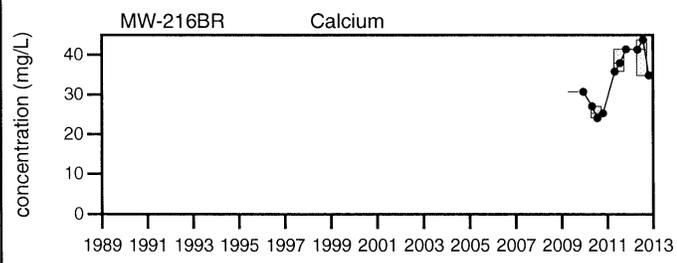
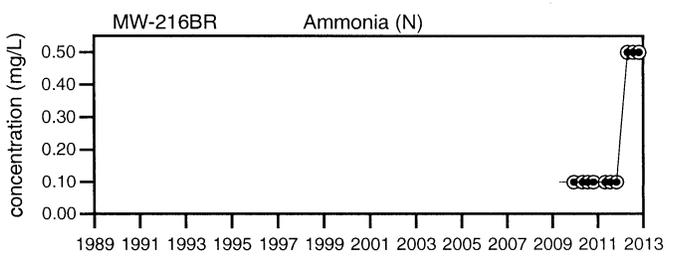
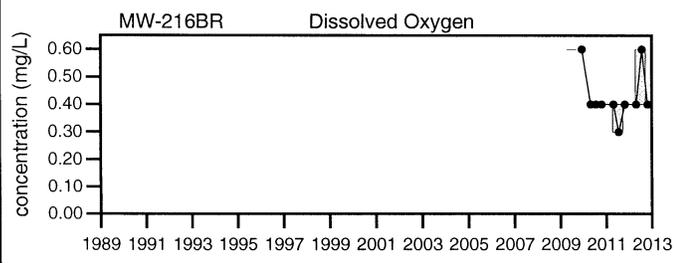
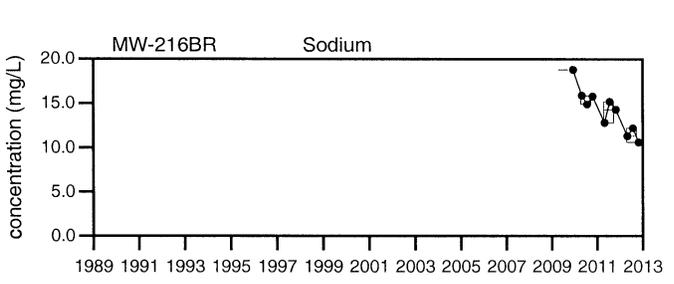
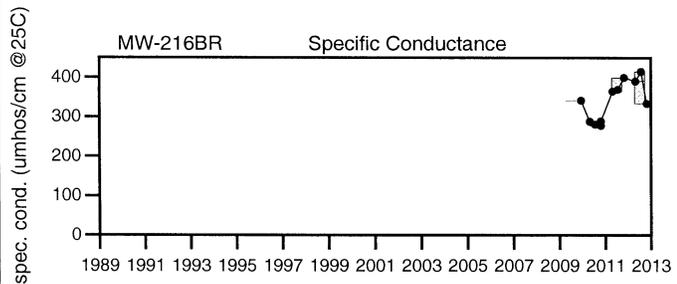
**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- - Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
MW-212

Sevee & Maher Engineers, Inc.





**LEGEND**

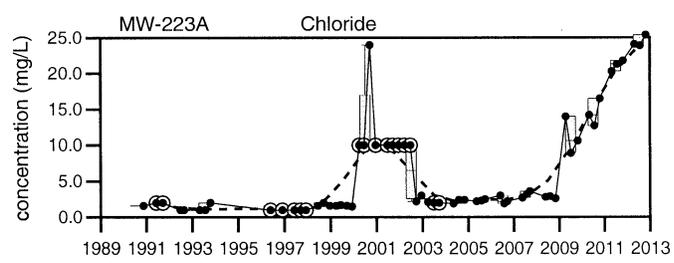
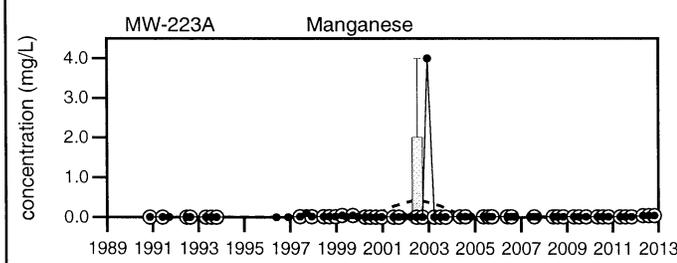
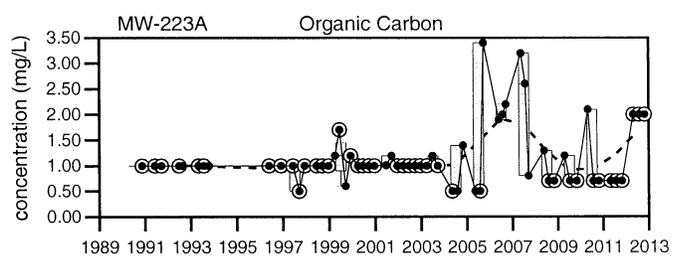
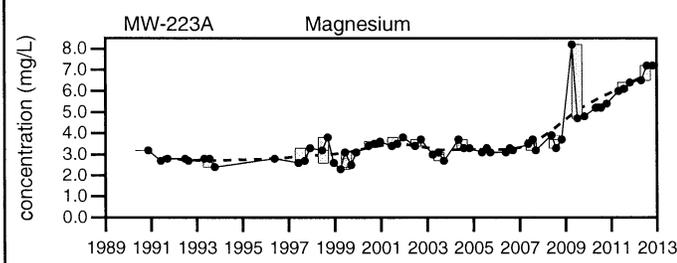
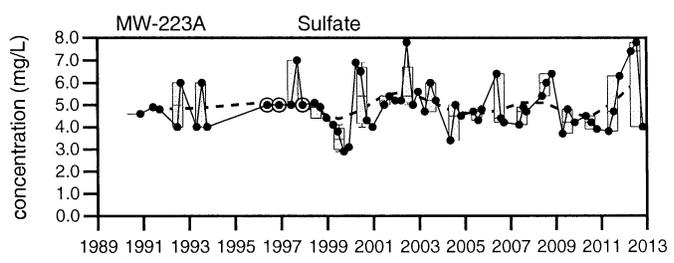
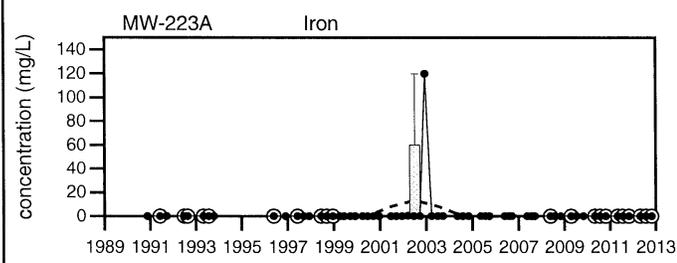
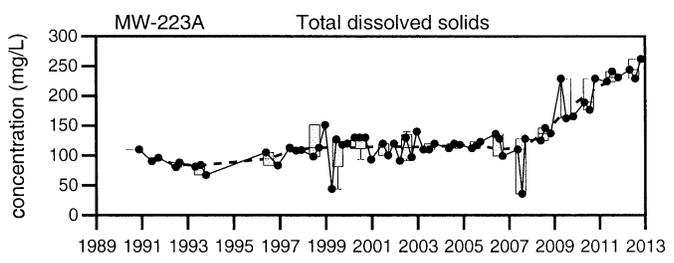
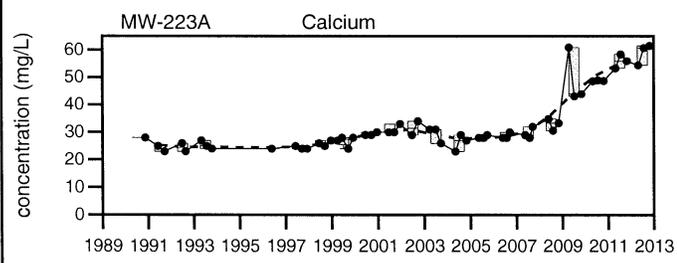
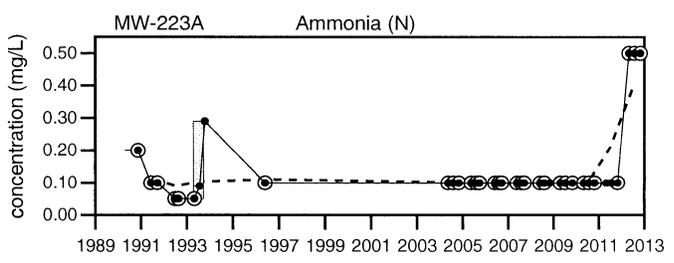
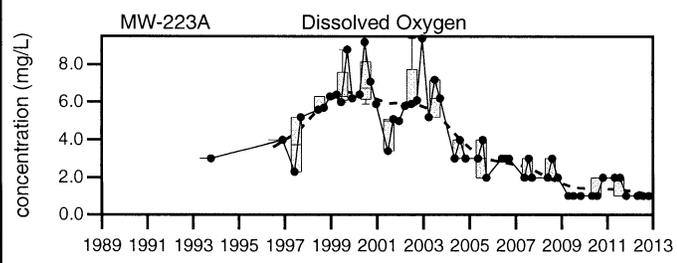
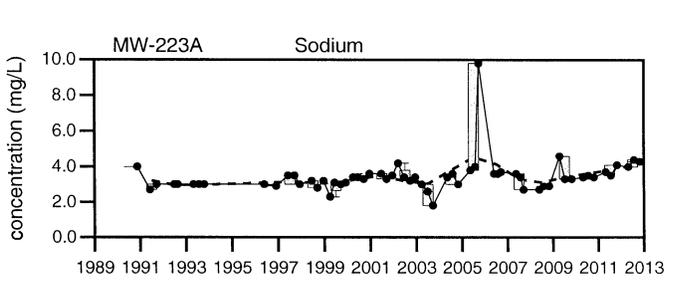
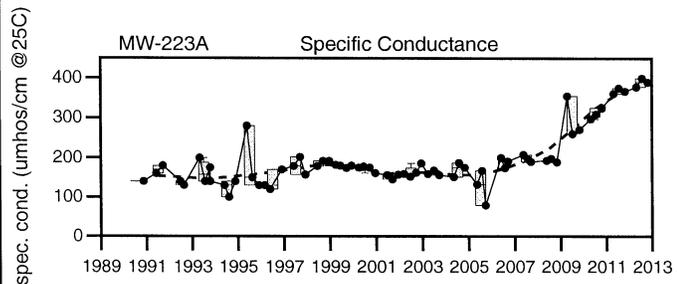
- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- Sample Event
- BDL

Juniper Ridge Landfill  
MW-216BR

Sevee & Maher Engineers, Inc.





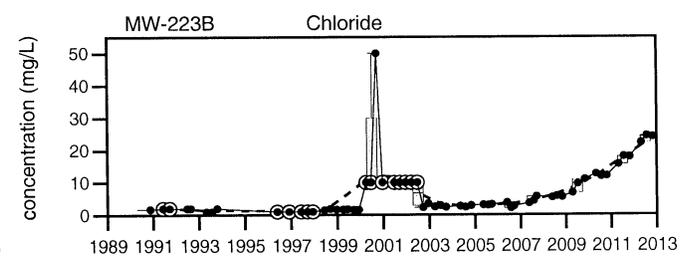
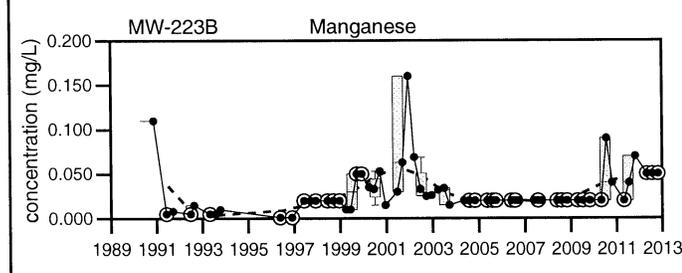
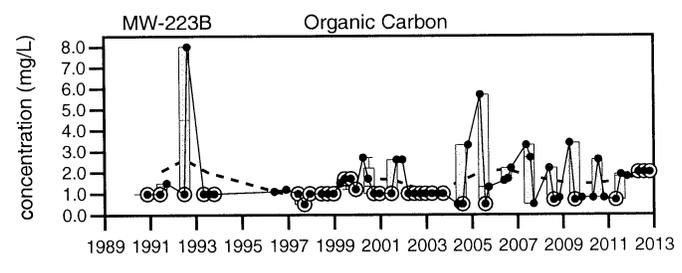
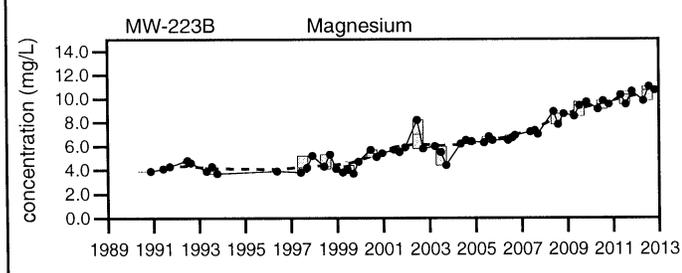
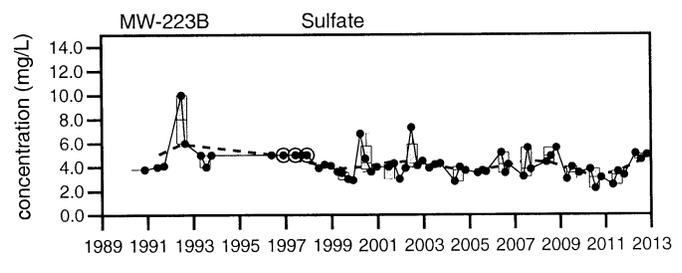
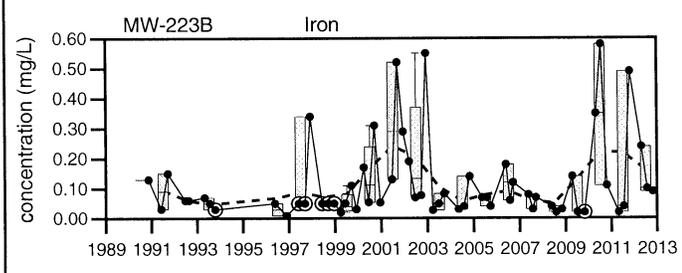
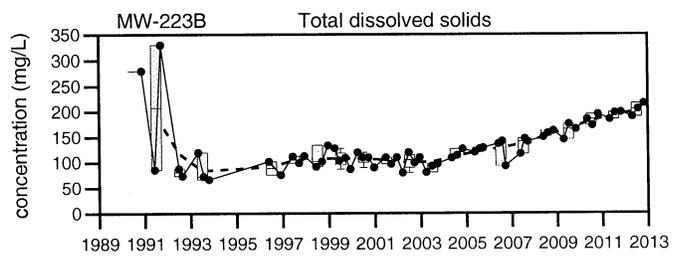
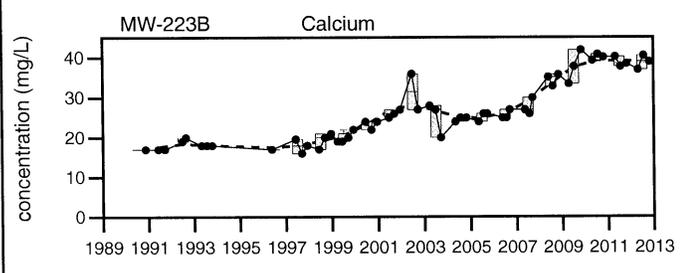
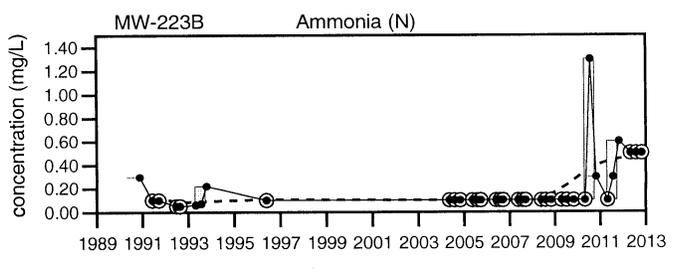
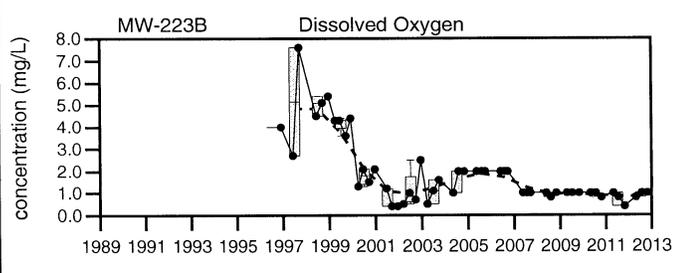
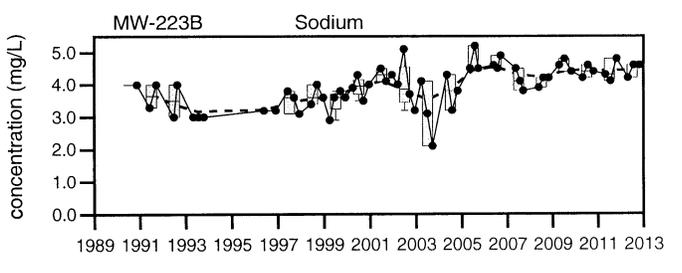
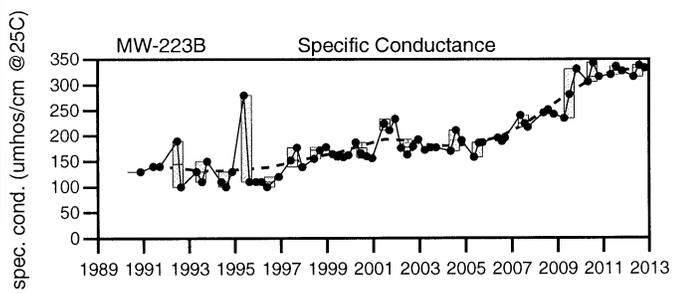


**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
MW-223A

Sevee & Maher Engineers, Inc.



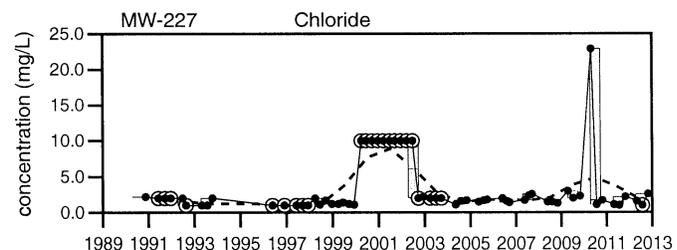
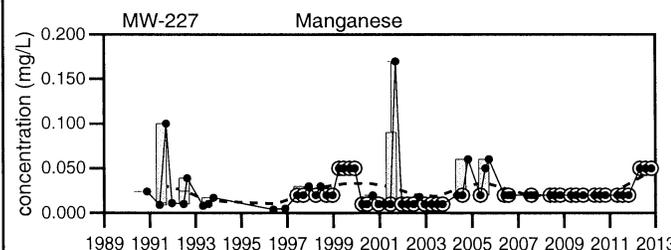
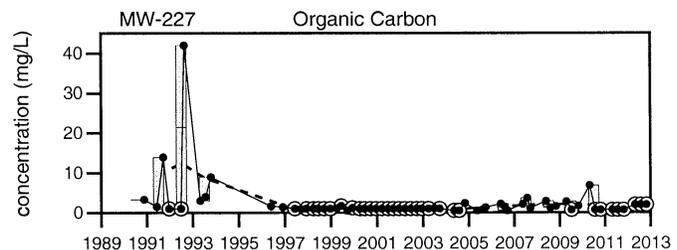
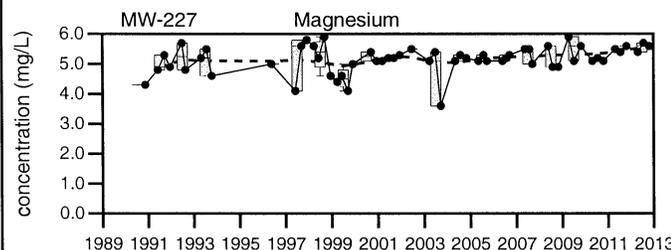
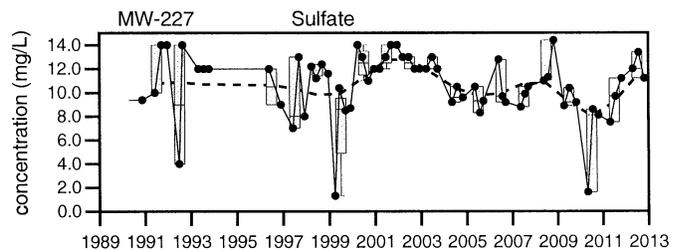
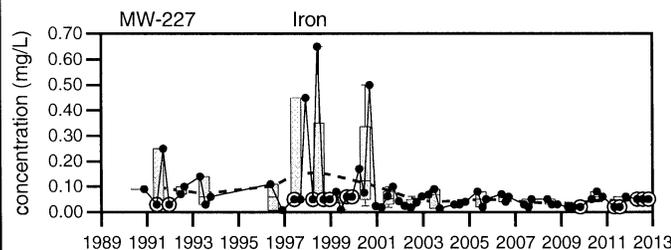
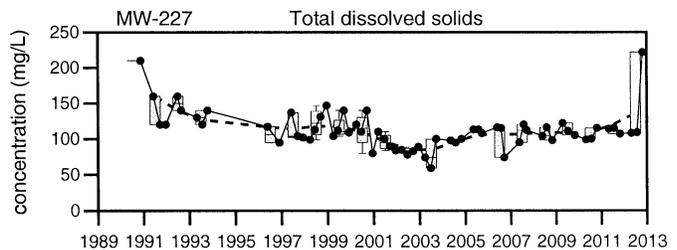
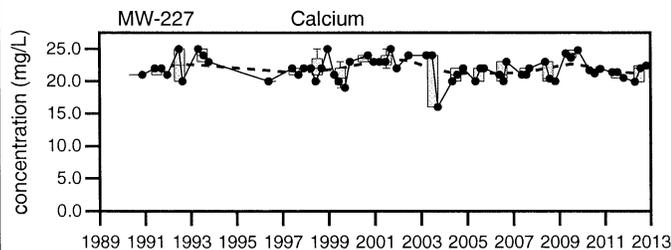
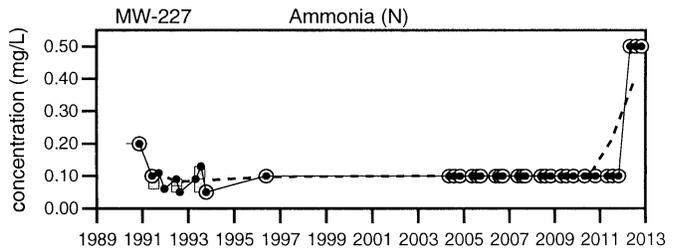
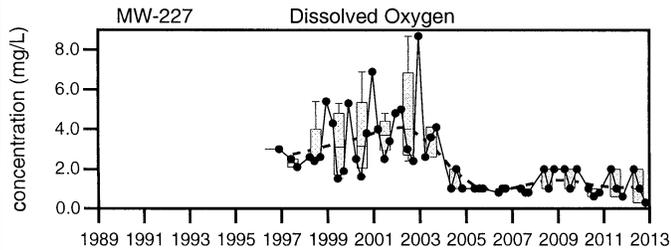
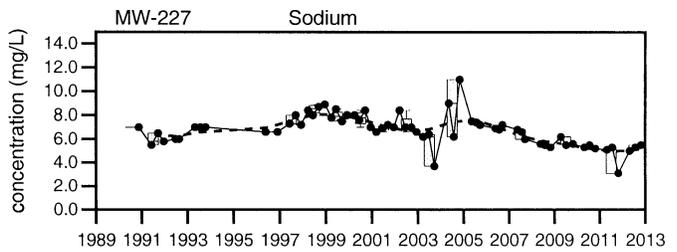
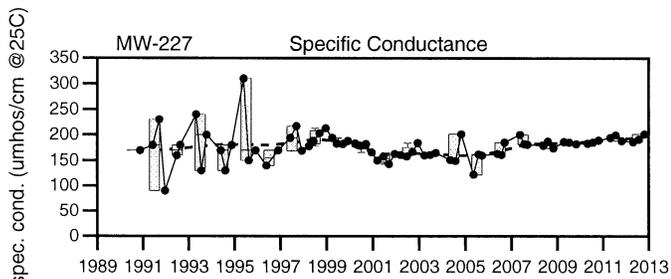
**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
MW-223B

Sevee & Maher Engineers, Inc.





**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- Sample Event
- ⊙ - BDL

## Juniper Ridge Landfill MW-227

Sevee & Maher Engineers, Inc.

# MW-301

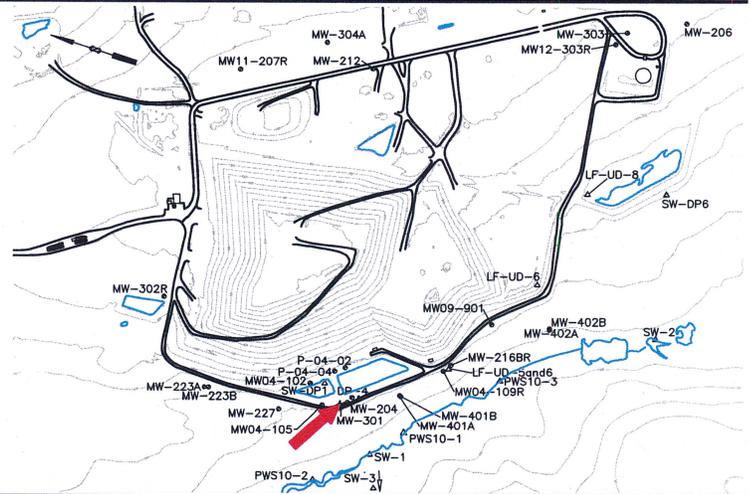
Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

MW-301 monitors the water quality within the bedrock downgradient of the landfill.

Screen Interval: **162.7 ft. to 182.7 ft.**  
 Sampled: **3 Times Annually**  
 Sampled Since: **11/25/96**  
 Material Screened: **Bedrock**  
 Well Condition: **Good**  
 Sampling Method: **Low Flow**



## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Water Level Elevation (Feet)		162.43	161.36	161.8	161.16	to 166.36	160 ± 0.32		44
Specific Conductance (µmhos/cm @25°C)		194	202	171	82	to 340	170 ± 5.7		48
pH (Standard Units)		8.1	7.4	7.2	7	to 8.36	7.9 ± 0.05		48
Alkalinity (CaCO3) (field) (mg/L)		100	120	55	45	to 120	78 ± 4		24
Arsenic (mg/L)		0.009	0.006	0.006	0.001	to 0.012	0.0043 ± 0.000		24
Cadmium (mg/L)		0.0006 U	0.0006 U	0.0006 U	0.0002 U	to 0.0006	0.00028 ± 4E-05		21
Calcium (mg/L)		16.9	↓ 14.9	16.7	15	to 31.4	18 ± 0.39		44
Copper (mg/L)		0.003 U	0.003 U	0.003 U	0.001 U	to 0.003	0.0022 ± 0.000		21
Iron (mg/L)		0.15	0.05 U	0.32	0.011	to 1.59	0.16 ± 0.04		48
Magnesium (mg/L)		4.4	4.5	4.3	2.5	to 5.7	4.3 ± 0.08		44
Manganese (mg/L)		0.05 U	0.05 U	0.05 U	0.001	to 0.05	0.022 ± 0.002		48
Nickel (mg/L)		↑ 0.005 U	↑ 0.005 U	↑ 0.005 U	0.002 U	to 0.002	0.002 ± 5E-05		21
Potassium (mg/L)		0.7	0.7	0.6	0.5	to 1.2	0.79 ± 0.03		24
Sodium (mg/L)		11.1	11.8	10.3	6.8	to 14.2	10 ± 0.32		48
Total Kjeldahl Nitrogen (mg/L)		0.3 U	0.3 U	0.3 U	0.15 U	to 0.6	0.37 ± 0.02		24
Ammonia (N) (mg/L)		↑ 0.5 U	↑ 0.5 U	↑ 0.5 U	0.1 U	to 0.1 U	0.1 ± 3E-10		24
Nitrate (N) (mg/L)		0.3 U	0.3 U	0.3 U	0.1 U	to 0.7	0.13 ± 0.03		24
Total Dissolved Solids (mg/L)		123	118	130	66	to 160	110 ± 2.7		48
Total Suspended Solids (mg/L)		13	4 U	20	4 U	to 21	5.9 ± 0.89		24
Sulfate (mg/L)		↑ 15	14.3	↑ 15.1	4.9	to 14.8	10 ± 0.37		48
Bicarbonate (CaCO3) (mg/L)		76	74	77	72	to 91	76 ± 0.92		24
Organic Carbon (mg/L)		2 U	2 U	2 U	0.5 U	to 5.7	1.3 ± 0.13		48
Chemical Oxygen Demand (mg/L)		10 U	10 U	10 U	2 U	to 12	5.5 ± 0.55		48
Chloride (mg/L)		2.3	2.3	2.3	1 U	to 6	3.1 ± 0.46		48
Turbidity (field) (NTU)		7.6	1.5	8.5	0	to 18	1.8 ± 0.56		45
Tannin & Lignins (Tannic Acid) (mg/L)		0.2 U	0.2 U	0.2 U	0.2 U	to 0.21	0.2 ± 0.000		24

**underlined/bold** - values exceed a regulatory standard listed below.

### Applicable Limits:

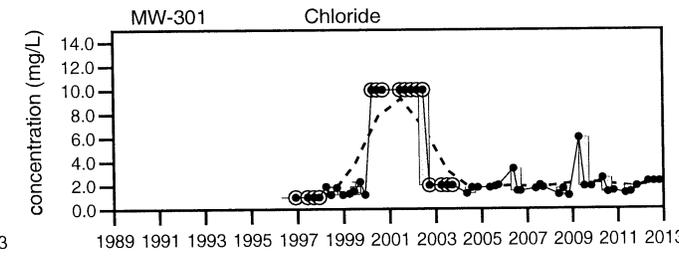
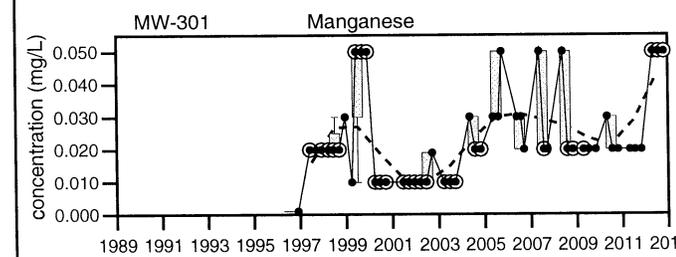
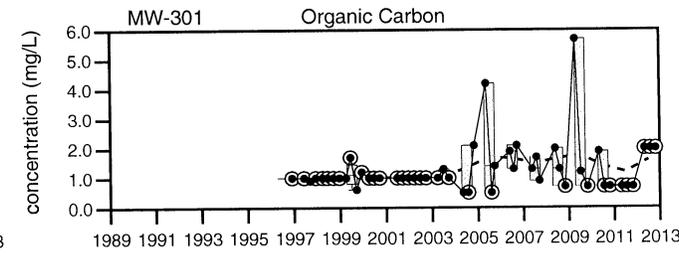
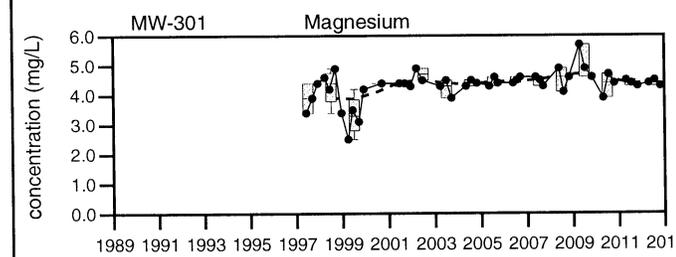
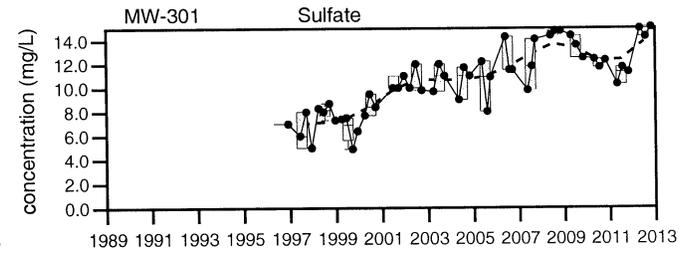
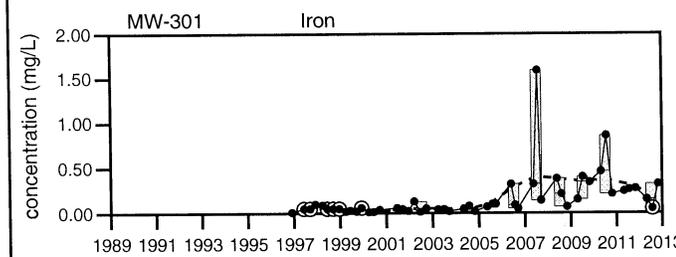
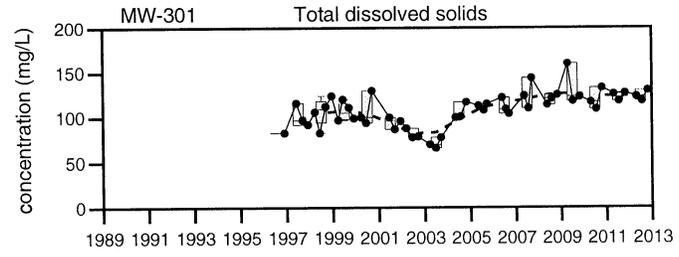
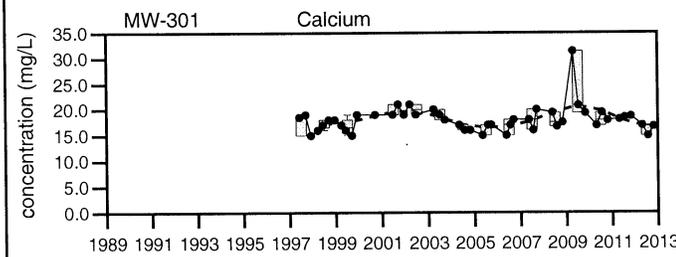
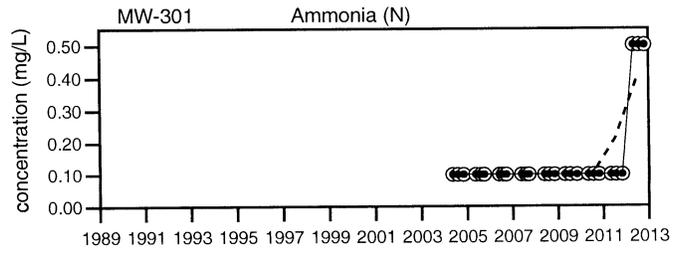
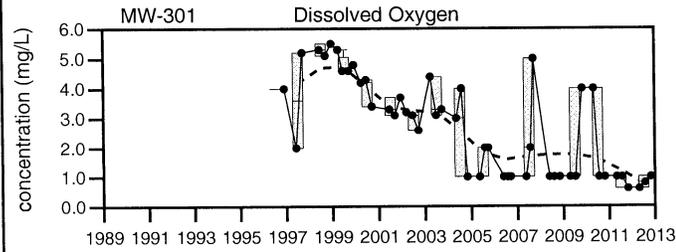
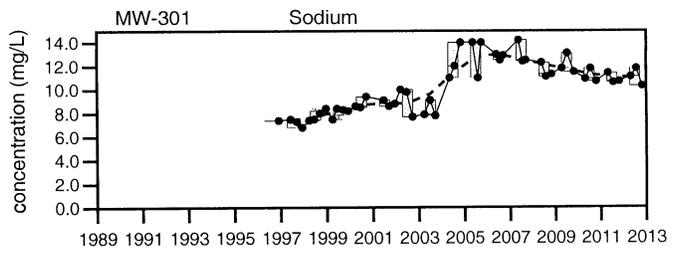
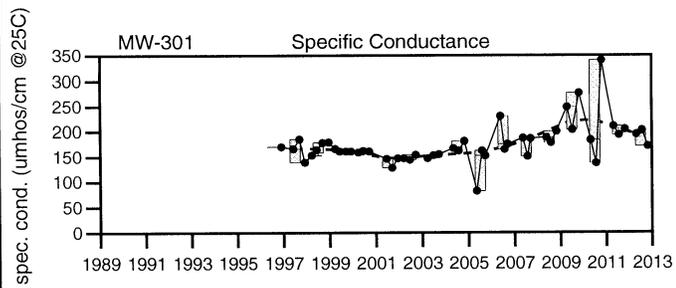
Nitrate (N) MCL=10 mg/L, MEG12=10 mg/L, Cadmium MCL=0.005 mg/L, MEG12=0.001 mg/L, Copper MCL=1.3 mg/L, MEG12=0.5 mg/L, Iron MEG12=5 mg/L, Manganese MEG12=0.5 mg/L, Nickel MEG12=0.02 mg/L, Arsenic MCL=0.01 mg/L, MEG12=0.01 mg/L, Ammonia (N) MEG12=30 mg/L, Sodium MEG12=20 mg/L

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed.



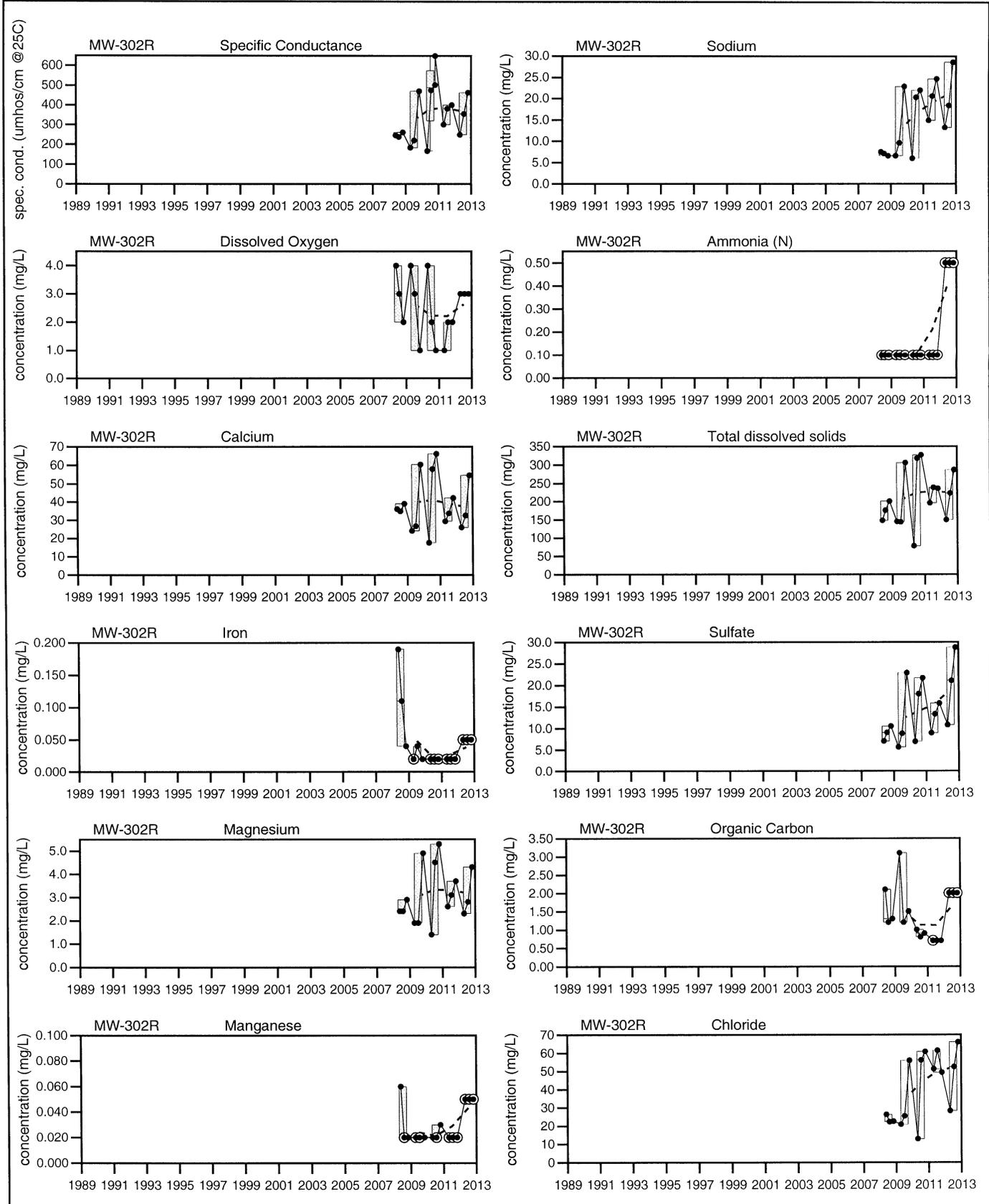
**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- - Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
MW-301

Sevee & Maher Engineers, Inc.





**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- - Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
**MW-302R**

Sevee & Maher Engineers, Inc.

# MW-303

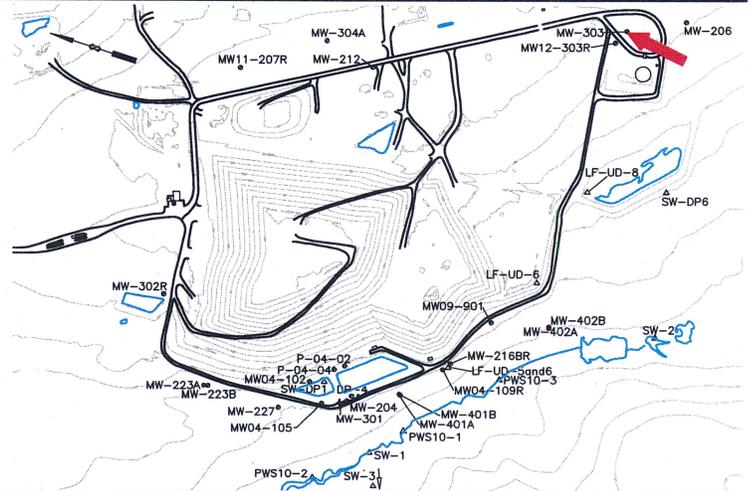
Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

MW-303 monitors the background overburden water quality at the site upgradient of the landfill. MW-303 was not sampled after the April 2012 round and was replaced with MW12-303R in 2012.

Screen Interval: **34.7 ft. to 44.7 ft.**  
 Sampled: **3 Times Annually**  
 Sampled Since: **11/26/96**  
 Material Screened: **Overburden**  
 Well Condition: **Good**  
 Sampling Method: **Low Flow**



## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Water Level Elevation (Feet)		182.92			176.7	to 188.12	180 ± 0.47		49
Specific Conductance (µmhos/cm @25°C)		↑ 243	!		33	to 223	80 ± 7.6		52
pH (Standard Units)		6.1	!		5.8	to 7.5	6.8 ± 0.05		52
Alkalinity (CaCO3) (field) (mg/L)		180	!		20	to 200	56 ± 9.4		24
Arsenic (mg/L)		0.005 U	!		0.001 U	to 0.017	0.0035 ± 0.000		24
Cadmium (mg/L)		0.0006 U	!		0.0002 U	to 0.0006	0.00025 ± 4E-05		23
Calcium (mg/L)		↑ 25.2	!		2.8	to 23.3	7.6 ± 0.85		47
Copper (mg/L)		0.003 U	!		0.001 U	to 0.007	0.0024 ± 0.000		23
Iron (mg/L)		0.07	!		0.018	to 1	0.11 ± 0.03		52
Magnesium (mg/L)		↑ 12.1	!		0.61	to 10.9	3.3 ± 0.4		47
Manganese (mg/L)		↑ 0.05 U	!		0.01 U	to 0.03	0.019 ± 0.001		52
Nickel (mg/L)		↑ 0.005 U	!		0.002 U	to 0.002	0.002 ± 4E-05		23
Potassium (mg/L)		1	!		0.2	to 1	0.61 ± 0.04		24
Sodium (mg/L)		↑ 8.5	!		1.9	to 7.6	4.1 ± 0.19		52
Total Kjeldahl Nitrogen (mg/L)		0.3 U	!		0.15 U	to 0.66	0.46 ± 0.08		24
Ammonia (N) (mg/L)		↑ 0.5 U	!		0.1 U	to 0.1	0.1 ± 3E-10		24
Nitrate (N) (mg/L)		↑ 0.3 U	!		0.1 U	to 0.2	0.1 ± 0.004		24
Total Dissolved Solids (mg/L)		↑ 162	!		11	to 139	62 ± 4.5		52
Total Suspended Solids (mg/L)		5	!		4 U	to 6	4.1 ± 0.09		24
Sulfate (mg/L)		2.1	!		0.8	to 10	2.4 ± 0.23		52
Bicarbonate (CaCO3) (mg/L)		↑ 113	!		22	to 105	52 ± 6.4		24
Organic Carbon (mg/L)		2 U	!		0.5 U	to 2.2	1.1 ± 0.05		52
Chemical Oxygen Demand (mg/L)		10 U	!		2 U	to 10	6 ± 0.55		52
Chloride (mg/L)		7.5	!		1 U	to 8.3	3.9 ± 0.46		52
Turbidity (field) (NTU)		5.6	!		0	to 999	32 ± 20		49
Tannin & Lignins (Tannic Acid) (mg/L)		0.2 U	!		0.2 U	to 0.2 U	0.2 ± 6E-10		22

**underlined/bold** - values exceed a regulatory standard listed below.

### Applicable Limits:

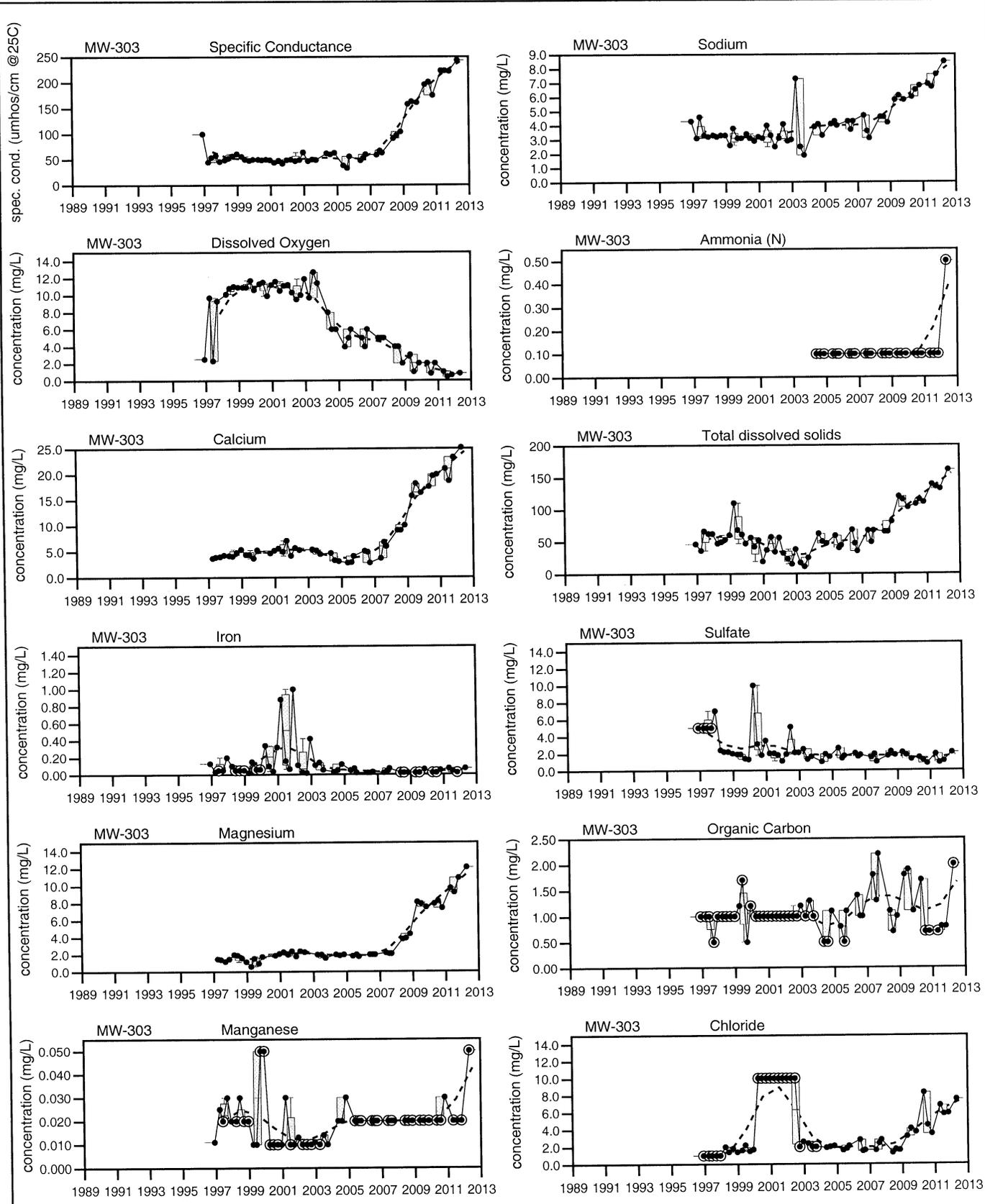
Nitrate (N) MCL=10 mg/L, MEG12=10 mg/L, Cadmium MCL=0.005 mg/L, MEG12=0.001 mg/L, Copper MCL=1.3 mg/L, MEG12=0.5 mg/L, Iron MEG12=5 mg/L, Manganese MEG12=0.5 mg/L, Nickel MEG12=0.02 mg/L, Arsenic MCL=0.01 mg/L, MEG12=0.01 mg/L, Ammonia (N) MEG12=30 mg/L, Sodium MEG12=20 mg/L

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed.



**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- - Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
**MW-303**

Sevee & Maher Engineers, Inc.

# MW-304A

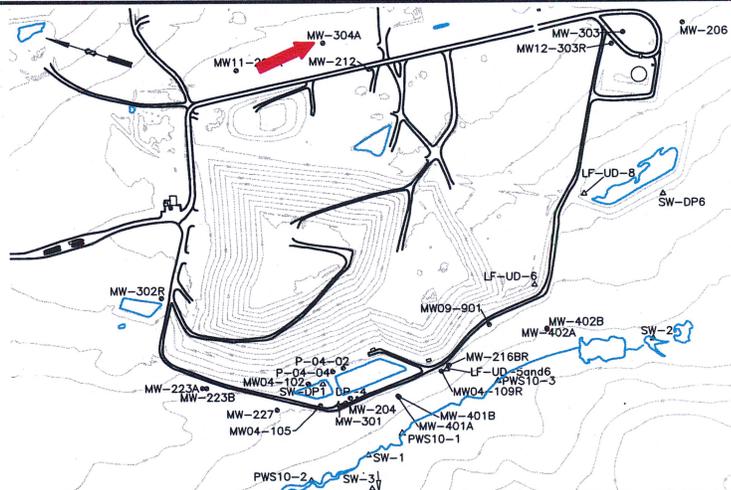
Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

MW-304A monitors the water quality in the upper portion of the bedrock upgradient of the landfill.

Screen Interval: **29.5 ft. to 39.5 ft.**  
 Sampled: **3 Times Annually**  
 Sampled Since: **07/29/04**  
 Material Screened: **Bedrock**  
 Well Condition: **Good**  
 Sampling Method: **Low Flow**



## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Water Level Elevation (Feet)		188.01	188.46	187.56	184.5 to 194.32		190 ± 0.48		23
Specific Conductance (µmhos/cm @25°C)		122	141	114	58 to 207		110 ± 6.8		23
pH (Standard Units)		7	7	7.3	6.3 to 7.8		7 ± 0.08		23
Alkalinity (CaCO3) (field) (mg/L)		60	60	45	20 to 100		56 ± 4.2		23
Arsenic (mg/L)		↑ 0.006	0.005 U	↑ 0.006	0.001 U to 0.005		0.0022 ± 0.000		23
Cadmium (mg/L)		0.0006 U	0.0006 U	0.0006 U	0.0002 U to 0.007		0.00063 ± 0.000		23
Calcium (mg/L)		13.9	14.3	11.7	6.2 to 19		12 ± 0.59		23
Copper (mg/L)		0.003 U	0.003 U	0.003 U	0.001 U to 0.009		0.0028 ± 0.000		23
Iron (mg/L)		0.05 U	0.05 U	0.05 U	0.02 U to 0.26		0.049 ± 0.01		23
Magnesium (mg/L)		4	3.8	3.5	2.3 to 5.1		3.5 ± 0.17		23
Manganese (mg/L)		0.05 U	0.05 U	0.05 U	0.02 U to 0.2		0.037 ± 0.009		23
Nickel (mg/L)		0.005 U	0.005 U	0.005 U	0.002 U to 0.006		0.0023 ± 0.000		23
Potassium (mg/L)		0.9	0.8	0.7	0.3 to 3.2		0.94 ± 0.12		23
Sodium (mg/L)		7.1	4.7	3.7	2.9 to 23		5.7 ± 0.98		23
Total Kjeldahl Nitrogen (mg/L)		0.3 U	0.3 U	↑ 1.2	0.15 U to 0.59		0.48 ± 0.08		23
Ammonia (N) (mg/L)		↑ 0.5 U	↑ 0.5 U	↑ 0.5 U	0.1 U to 0.1		0.1 ± 0		23
Nitrate (N) (mg/L)		↑ 0.3 U	↑ 0.3 U	↑ 0.3 U	0.1 U to 0.2		0.12 ± 0.008		23
Total Dissolved Solids (mg/L)		94	95	74	54 to 130		77 ± 3.5		23
Total Suspended Solids (mg/L)		4 U	4 U	4 U	4 U to 259		16 ± 11		23
Sulfate (mg/L)		5.7	2.4	2 U	1.5 to 8.8		3.4 ± 0.31		23
Bicarbonate (CaCO3) (mg/L)		56	55	43	37 to 92		51 ± 2.6		23
Organic Carbon (mg/L)		2 U	2 U	2 U	0.5 U to 4		1.2 ± 0.19		23
Chemical Oxygen Demand (mg/L)		10 U	10 U	10 U	3 U to 10		3.9 ± 0.39		23
Chloride (mg/L)		3	1.9	1.8	1 to 3.5		2.2 ± 0.14		23
Turbidity (field) (NTU)		1.6	1	1.2	0 to 9.2		1.1 ± 0.44		23
Tannin & Lignins (Tannic Acid) (mg/L)		0.2 U	0.2 U	0.2 U	0.2 U to 0.45		0.21 ± 0.01		21

underlined/bold - values exceed a regulatory standard listed below.

### Applicable Limits:

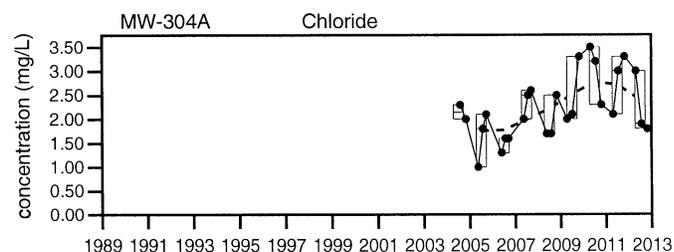
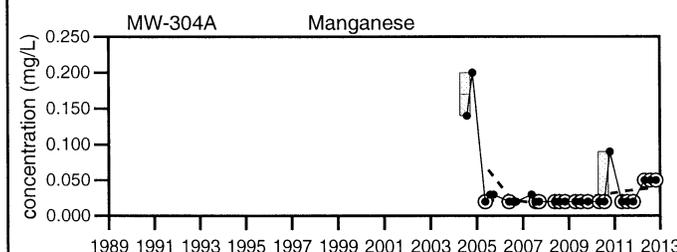
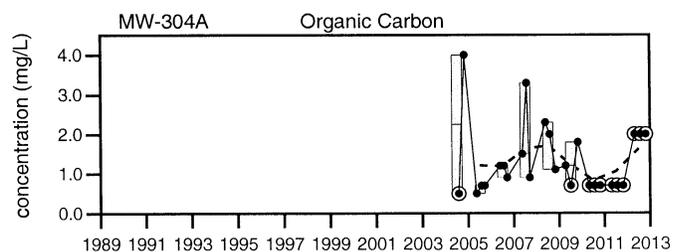
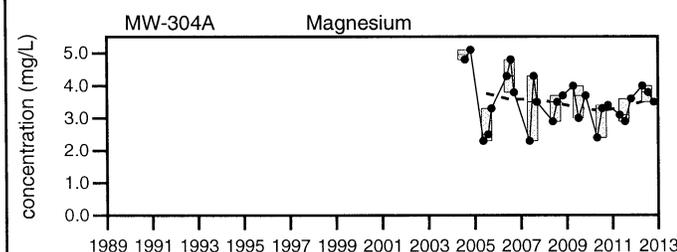
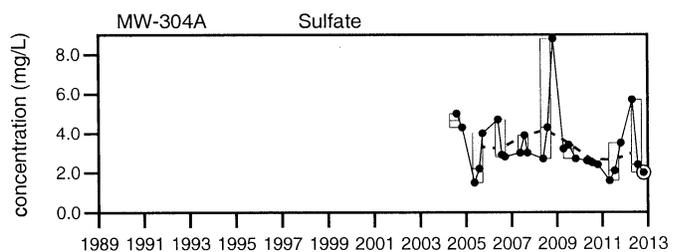
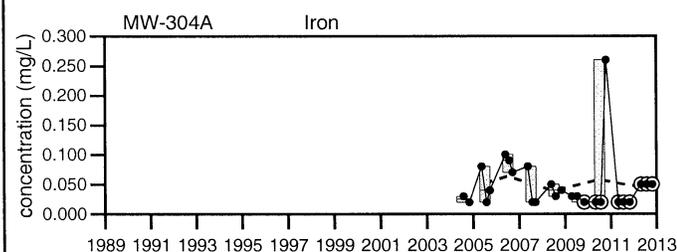
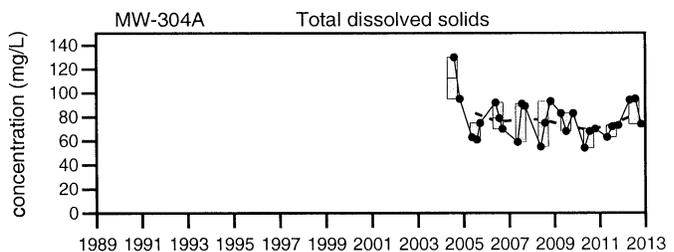
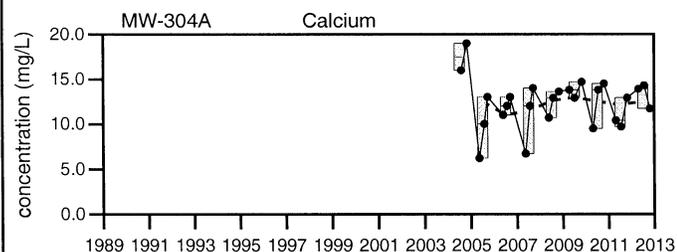
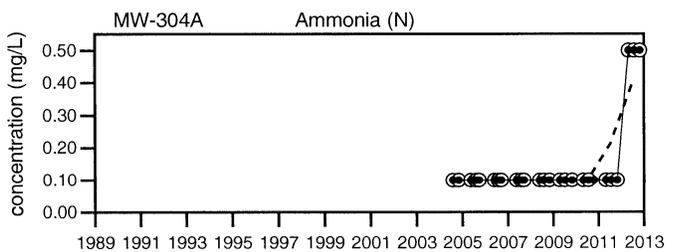
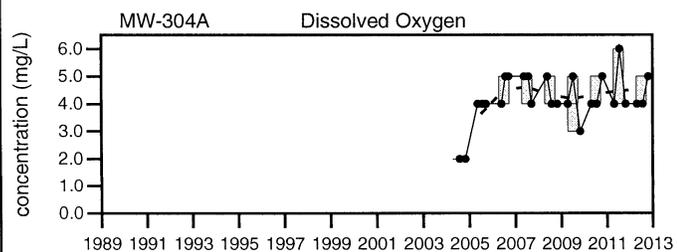
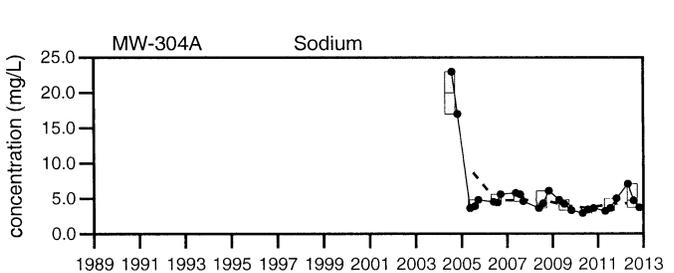
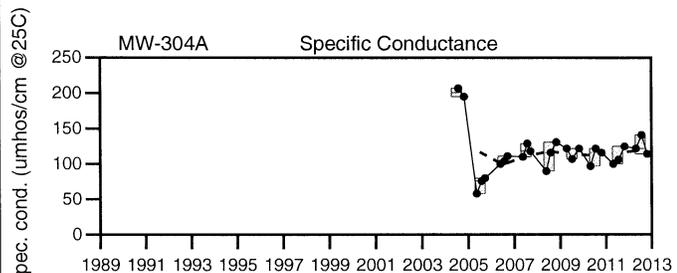
Nitrate (N) MCL=10 mg/L, MEG12=10 mg/L, Cadmium MCL=0.005 mg/L, MEG12=0.001 mg/L, Copper MCL=1.3 mg/L, MEG12=0.5 mg/L, Iron MEG12=5 mg/L, Manganese MEG12=0.5 mg/L, Nickel MEG12=0.02 mg/L, Arsenic MCL=0.01 mg/L, MEG12=0.01 mg/L, Ammonia (N) MEG12=30 mg/L, Sodium MEG12=20 mg/L

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed.



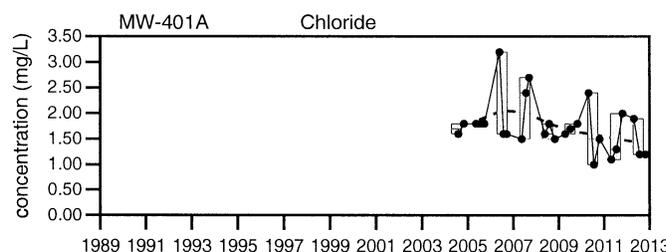
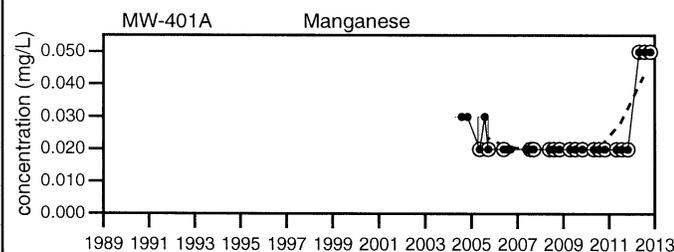
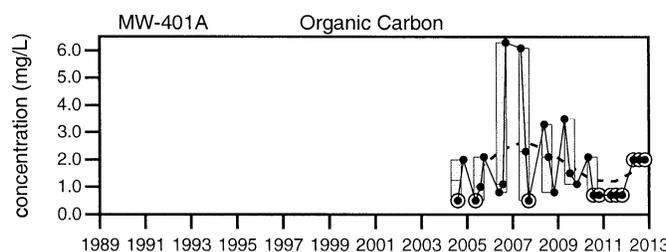
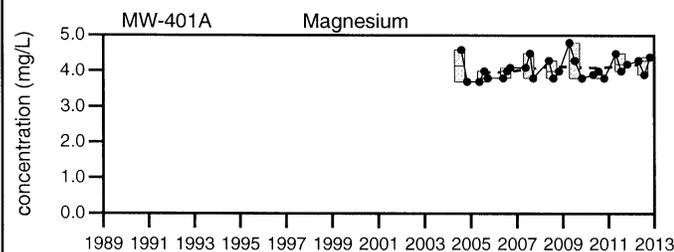
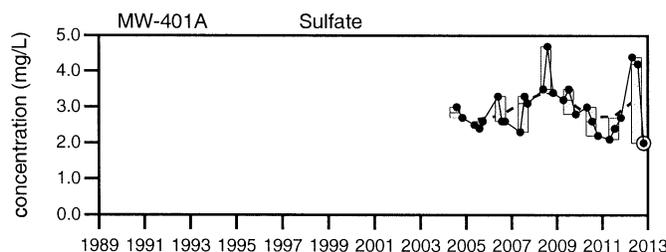
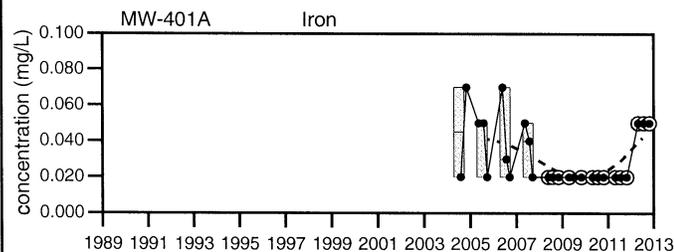
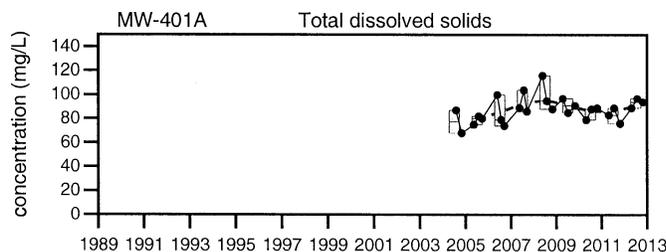
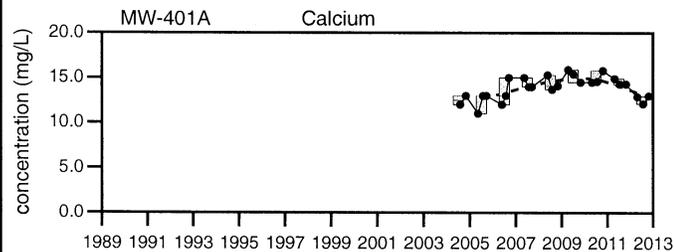
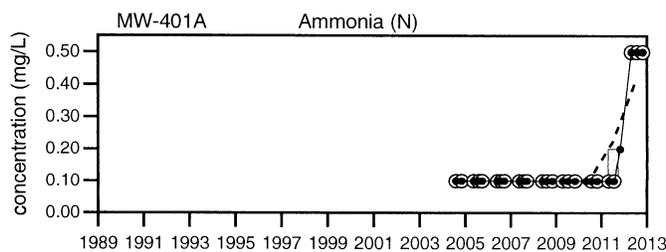
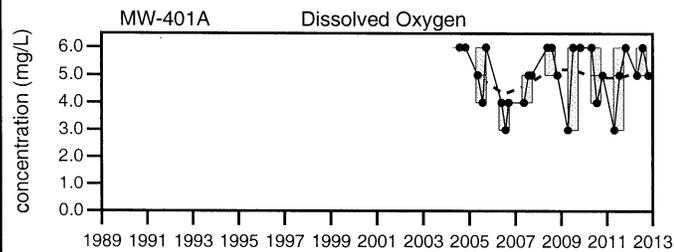
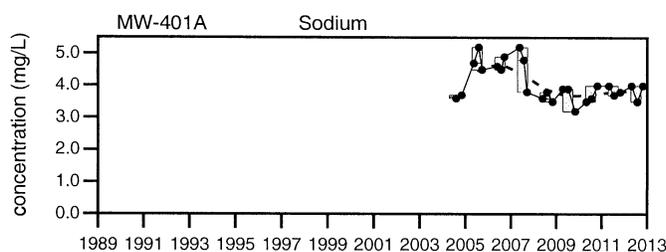
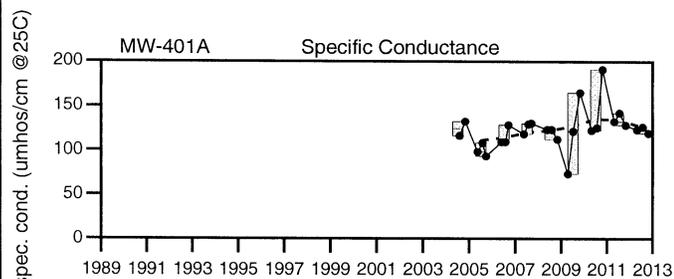
**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
MW-304A

Sevee & Maher Engineers, Inc.





**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- - Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
MW-401A

Sevee & Maher Engineers, Inc.

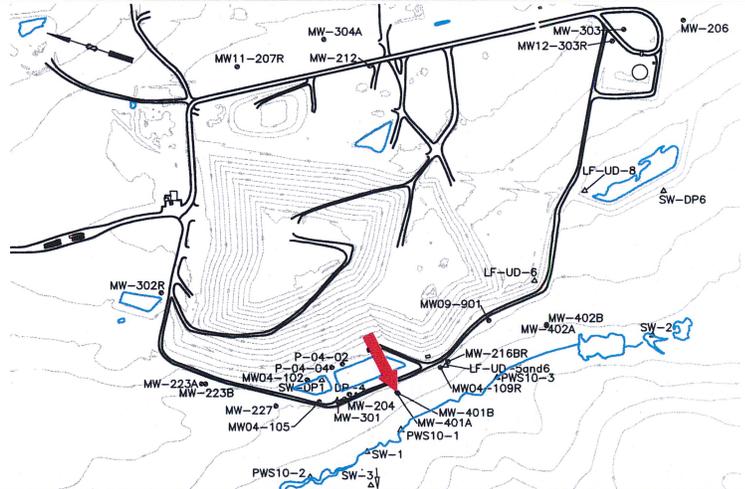
# MW-401B

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

MW-401B is located downgradient of the landfill and leachate pond and monitors groundwater quality in the overburden.



Screen Interval: 10 ft. to 20 ft.  
 Sampled: 3 Times Annually  
 Sampled Since: 07/29/04  
 Material Screened: Overburden  
 Well Condition: Good  
 Sampling Method: Low Flow

## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Water Level Elevation (Feet)		150.69	149.92	150.97	148.47 to 150.97		150 ± 0.13		23
Specific Conductance (µmhos/cm @25°C)		235	276	310	180 to 699		420 ± 27		23
pH (Standard Units)		↑ 7.5	6.9	6.7	5.9 to 7.3		6.6 ± 0.07		23
Alkalinity (CaCO3) (field) (mg/L)		↓ 60	140	110	80 to 335		180 ± 16		23
Arsenic (mg/L)		<b>0.017</b>	<b>0.011</b>	<b>0.016</b>	0.002 to 0.023		0.0089 ± 0.001		23
Cadmium (mg/L)		0.0006 U	0.0006 U	0.0006 U	0.0002 U to 0.0019		0.00034 ± 8E-05		23
Calcium (mg/L)		↓ 25.3	29.9	34.5	25.9 to 100		47 ± 4		23
Copper (mg/L)		0.003 U	0.003 U	0.003 U	0.001 U to 0.005		0.0021 ± 0.000		23
Iron (mg/L)		↓ 0.19	0.63	0.99	0.4 to 19		4.1 ± 0.9		23
Magnesium (mg/L)		8.3	8.8	11	8 to 36		14 ± 1.4		23
Manganese (mg/L)		↓ 0.05	0.16	0.2	0.07 to 2.9		0.52 ± 0.16		23
Nickel (mg/L)		0.005 U	0.005 U	0.005 U	0.002 U to 0.005		0.0023 ± 0.000		23
Potassium (mg/L)		1.1	1.1	1.4	0.9 to 3.2		1.7 ± 0.13		23
Sodium (mg/L)		10.9	11.4	14.7	9.8 to 33		19 ± 1.4		23
Total Kjeldahl Nitrogen (mg/L)		0.3 U	0.3 U	0.94	0.24 to 3.2		0.52 ± 0.12		23
Ammonia (N) (mg/L)		↑ 0.5 U	↑ 0.5 U	↑ 0.5 U	0.1 U to 0.1 U		0.1 ± 0		23
Nitrate (N) (mg/L)		↑ 0.3 U	↑ 0.3 U	↑ 0.3 U	0.1 U to 0.2		0.1 ± 0.004		23
Total Dissolved Solids (mg/L)		173	181	201	142 to 488		260 ± 18		23
Total Suspended Solids (mg/L)		4 U	4 U	4 U	4 U to 36		6.6 ± 1.5		23
Sulfate (mg/L)		11	13.4	9.8	8 to 69.2		25 ± 3.3		23
Bicarbonate (CaCO3) (mg/L)		117	117	133	116 to 245		160 ± 8.5		23
Organic Carbon (mg/L)		2 U	2 U	2 U	0.7 U to 4.6		2.7 ± 0.27		23
Chemical Oxygen Demand (mg/L)		10 U	10 U	10 U	3 U to 17		5.2 ± 0.71		23
Chloride (mg/L)		9.4	12	8.3	7.1 to 40.5		19 ± 2.2		23
Turbidity (field) (NTU)		2.2	2.8	1.2	0 to 4.5		1.3 ± 0.28		23
Tannin & Lignins (Tannic Acid) (mg/L)		0.2 U	0.2 U	0.2 U	0.2 U to 3.6		0.52 ± 0.18		21

underlined/bold - values exceed a regulatory standard listed below.

### Applicable Limits:

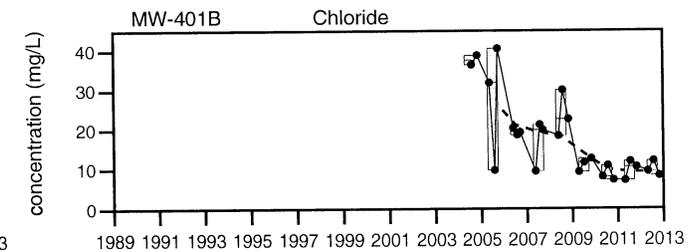
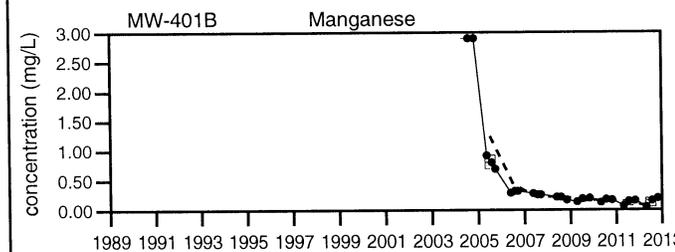
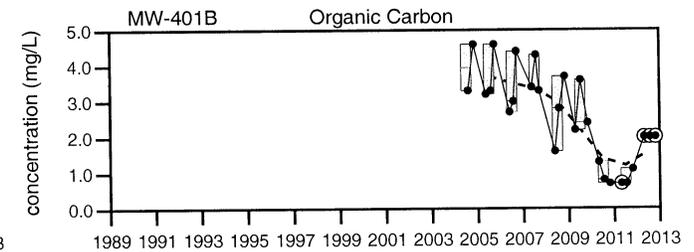
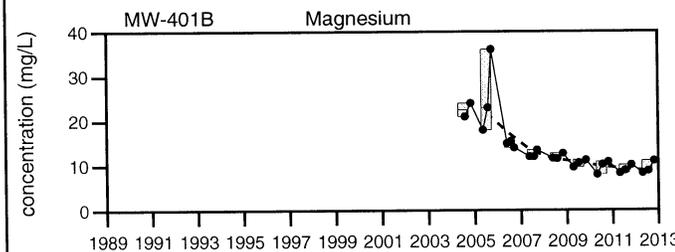
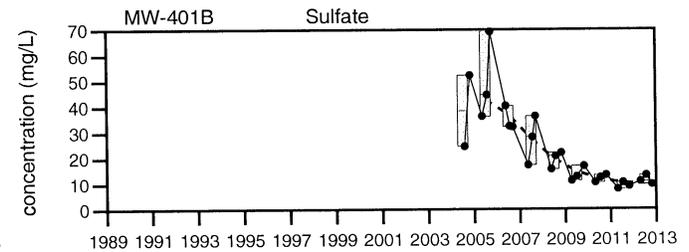
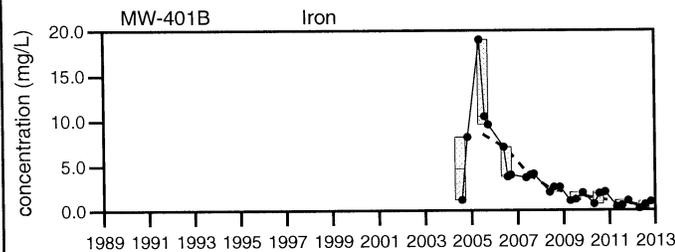
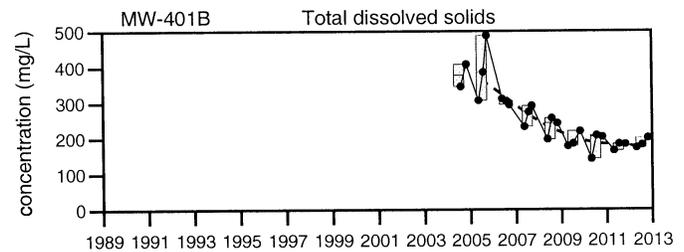
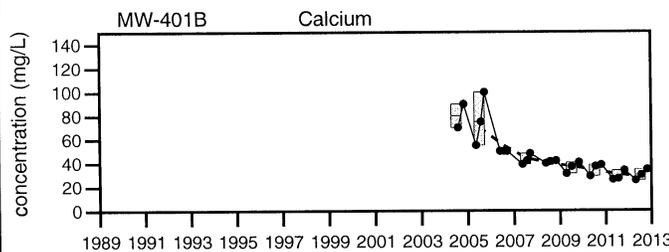
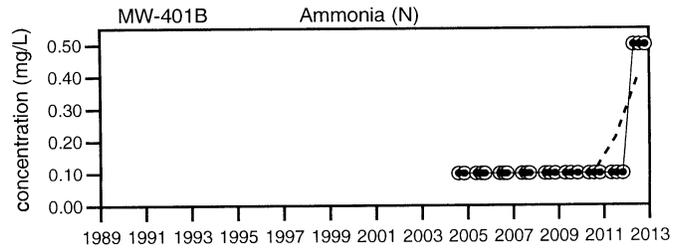
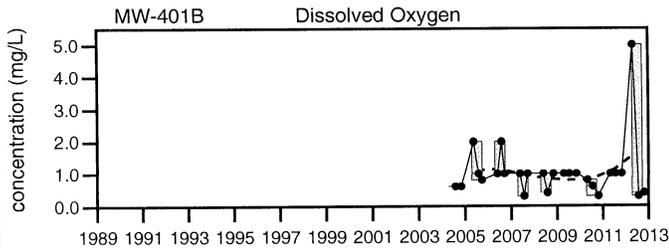
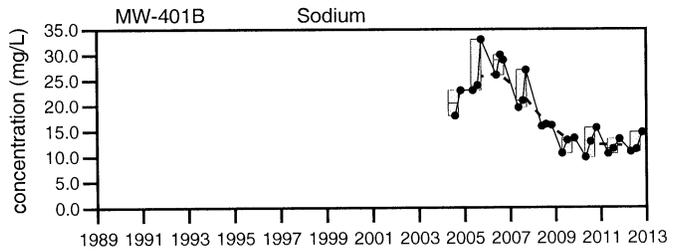
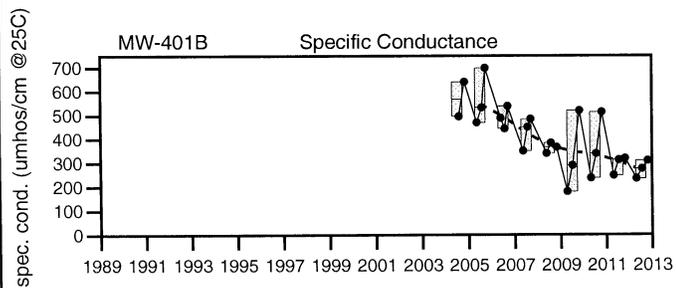
Nitrate (N) MCL=10 mg/L, MEG12=10 mg/L, Cadmium MCL=0.005 mg/L, MEG12=0.001 mg/L, Copper MCL=1.3 mg/L, MEG12=0.5 mg/L, Iron MEG12=5 mg/L, Manganese MEG12=0.5 mg/L, Nickel MEG12=0.02 mg/L, Arsenic MCL=0.01 mg/L, MEG12=0.01 mg/L, Ammonia (N) MEG12=30 mg/L, Sodium MEG12=20 mg/L

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed.



**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- Sample Event
- ⊙ - BDL

**Juniper Ridge Landfill  
MW-401B**

Sevee & Maher Engineers, Inc.

# MW-402A

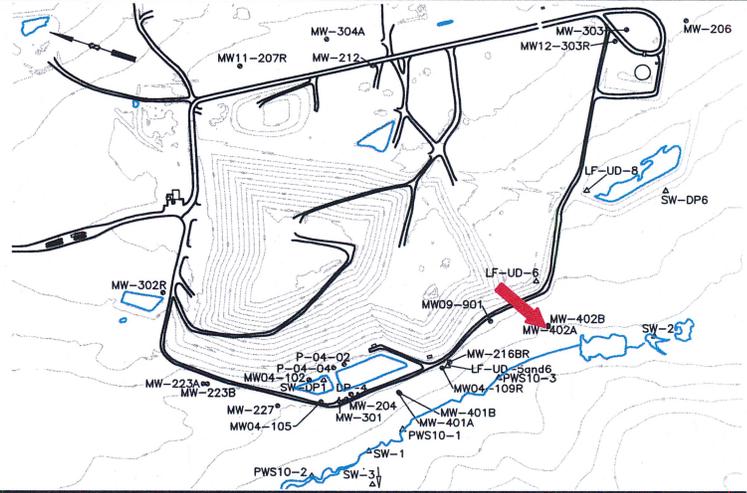
Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

MW-402A monitors water quality within the bedrock downgradient of the landfill.

Screen Interval: **95.5 ft. to 105.5 ft.**  
 Sampled: **3 Times Annually**  
 Sampled Since: **07/29/04**  
 Material Screened: **Bedrock**  
 Well Condition: **Good**  
 Sampling Method: **Low Flow**



## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance (µmhos/cm @25°C)		121	125	116	104 to 197		130 ± 4.6		23
pH (Standard Units)		7.5	8.4	7.4	7.3 to 9.5		8.1 ± 0.12		23
Alkalinity (CaCO3) (field) (mg/L)		60	70	60	30 to 135		57 ± 4.5		23
Arsenic (mg/L)		<b>0.019</b>	<b>0.021</b>	<b>0.017</b>	0.012 to 0.028		0.017 ± 0.000		23
Cadmium (mg/L)		0.0006 U	0.0006 U	0.0006 U	0.0002 U to 0.0025		0.00044 ± 0.000		23
Calcium (mg/L)		10.7	11.3	11.1	7.7 to 13.8		11 ± 0.27		23
Copper (mg/L)		0.003 U	0.003 U	0.003 U	0.001 U to 0.003		0.002 ± 0.000		23
Iron (mg/L)		0.05 U	0.05 U	0.05 U	0.02 U to 0.08		0.025 ± 0.003		23
Magnesium (mg/L)		2.9	2.9	3.1	2.6 to 3.2		2.9 ± 0.04		23
Manganese (mg/L)		↑ 0.05 U	↑ 0.05 U	↑ 0.05 U	0.02 U to 0.03		0.02 ± 0.000		23
Nickel (mg/L)		0.005 U	0.005 U	0.005 U	0.002 U to 0.008		0.0024 ± 0.000		23
Potassium (mg/L)		0.6	0.6	0.6	0.3 to 1.3		0.66 ± 0.04		23
Sodium (mg/L)		7.8	8.6	8.5	7.8 to 11		8.9 ± 0.2		23
Total Kjeldahl Nitrogen (mg/L)		0.3 U	0.3 U	0.31	0.15 U to 1		0.4 ± 0.04		23
Ammonia (N) (mg/L)		↑ 0.5 U	↑ 0.5 U	↑ 0.5 U	0.1 U to 0.1		0.1 ± 0		23
Nitrate (N) (mg/L)		↑ 0.3 U	↑ 0.3 U	↑ 0.3 U	0.1 U to 0.1		0.1 ± 0		23
Total Dissolved Solids (mg/L)		70	80	83	58 to 94		80 ± 1.8		23
Total Suspended Solids (mg/L)		4 U	4 U	4 U	4 U to 4 U		4 ± 0		23
Sulfate (mg/L)		7	6.4	7.3	3 to 7.4		4.8 ± 0.22		23
Bicarbonate (CaCO3) (mg/L)		52	52	51	46 to 56		52 ± 0.54		23
Organic Carbon (mg/L)		2 U	2 U	2 U	0.5 U to 8.1		1.7 ± 0.36		23
Chemical Oxygen Demand (mg/L)		↑ 10 U	↑ 10 U	↑ 10 U	3 U to 7		3.5 ± 0.21		23
Chloride (mg/L)		2	1.6	2.3	0.8 to 3.1		1.8 ± 0.11		23
Turbidity (field) (NTU)		0.7	1.9	0.8	0 to 3.7		0.37 ± 0.18		23
Tannin & Lignins (Tannic Acid) (mg/L)		0.2 U	0.2 U	0.2 U	0.2 U to 0.24		0.2 ± 0.002		21

**underlined/bold** - values exceed a regulatory standard listed below.

### Applicable Limits:

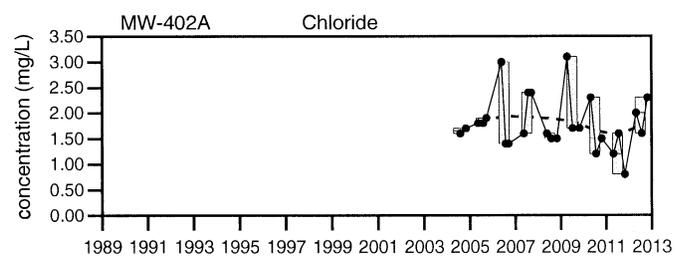
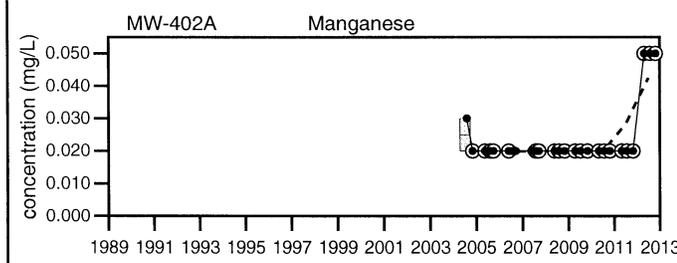
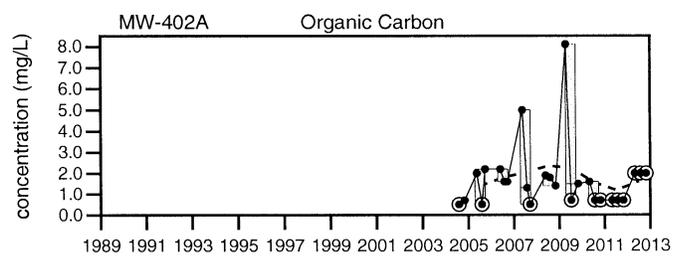
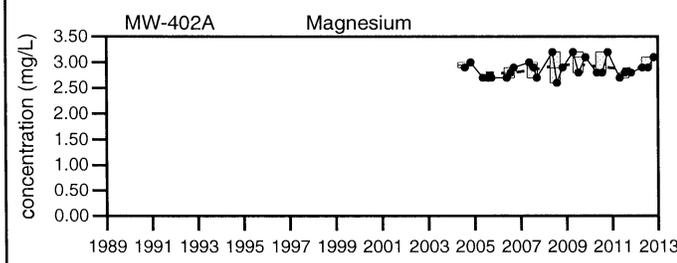
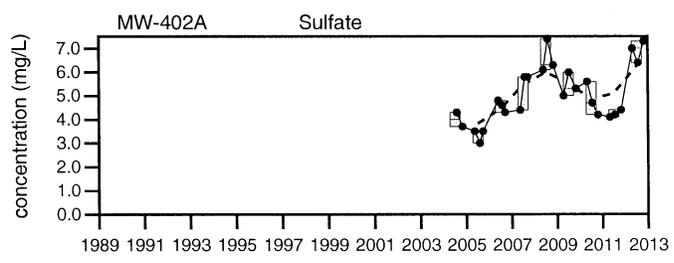
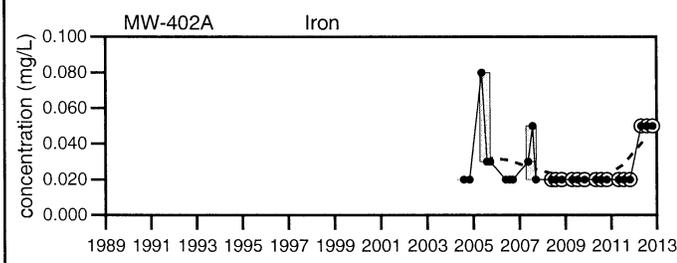
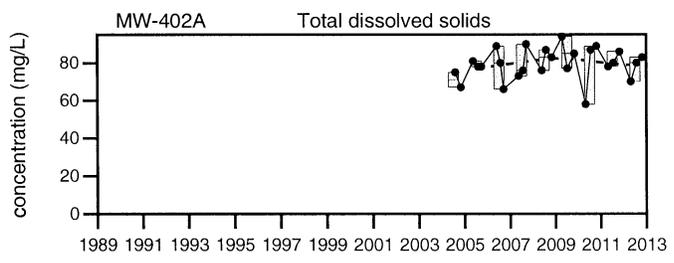
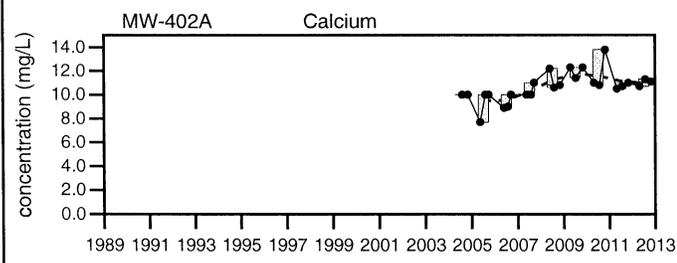
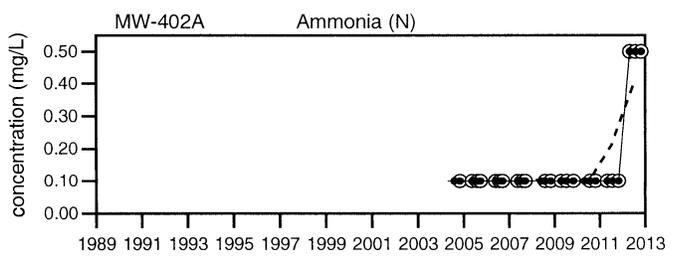
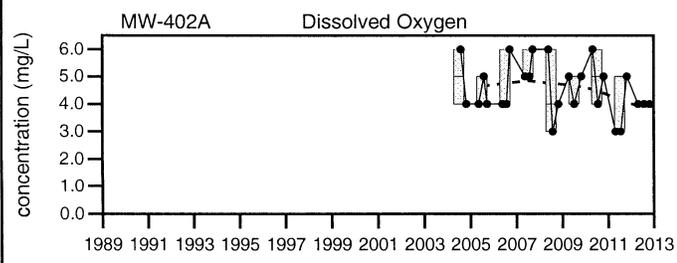
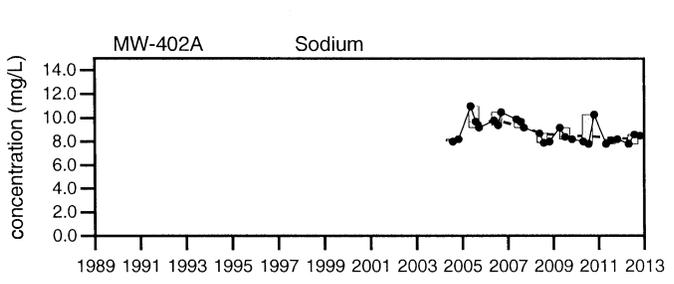
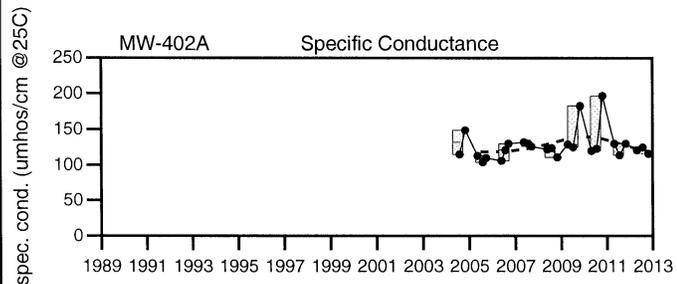
Nitrate (N) MCL=10 mg/L, MEG12=10 mg/L, Cadmium MCL=0.005 mg/L, MEG12=0.001 mg/L, Copper MCL=1.3 mg/L, MEG12=0.5 mg/L, Iron MEG12=5 mg/L, Manganese MEG12=0.5 mg/L, Nickel MEG12=0.02 mg/L, Arsenic MCL=0.01 mg/L, MEG12=0.01 mg/L, Ammonia (N) MEG12=30 mg/L, Sodium MEG12=20 mg/L

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed.



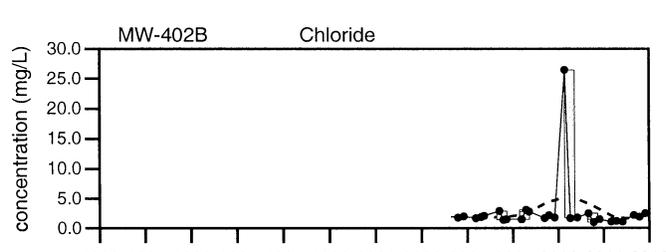
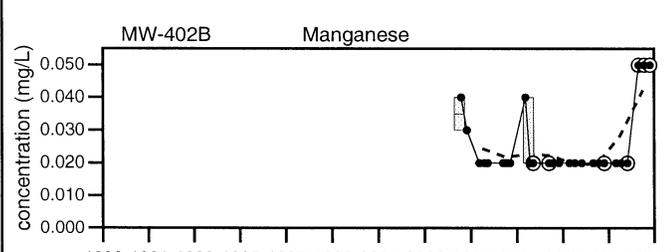
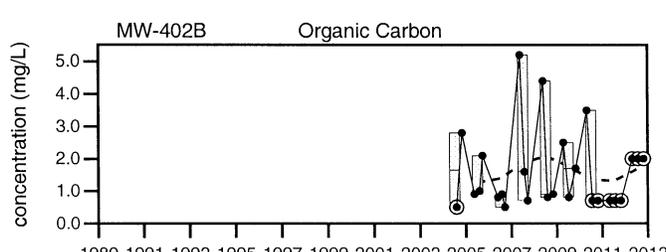
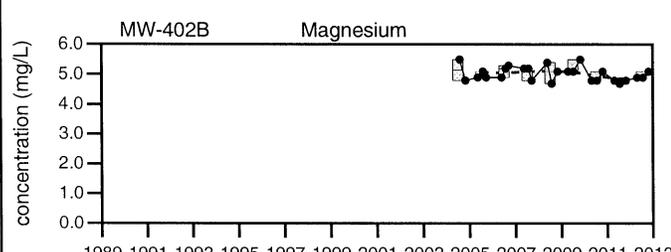
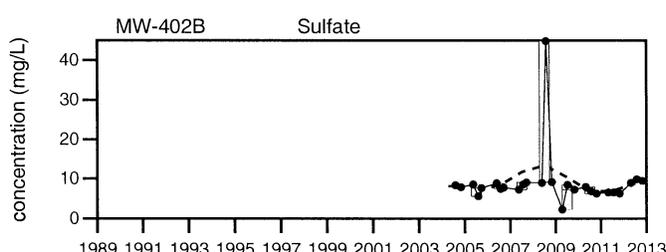
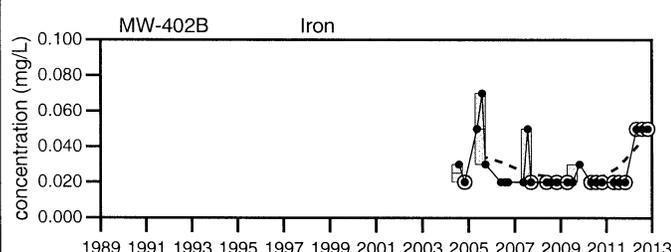
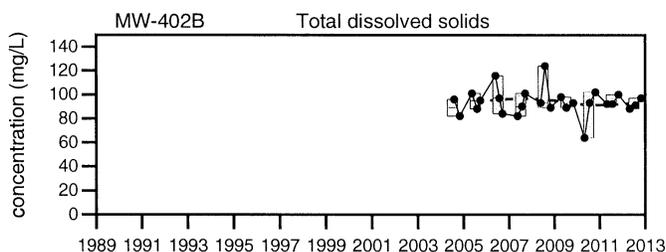
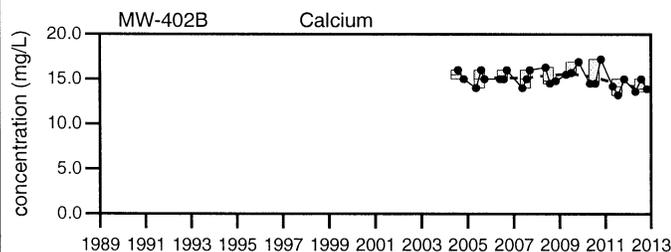
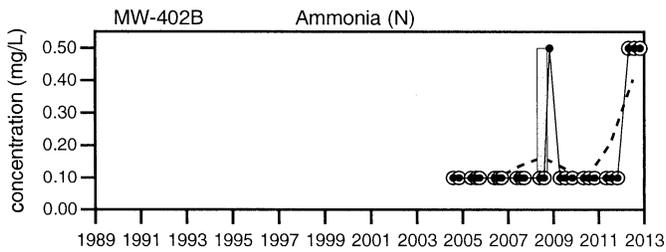
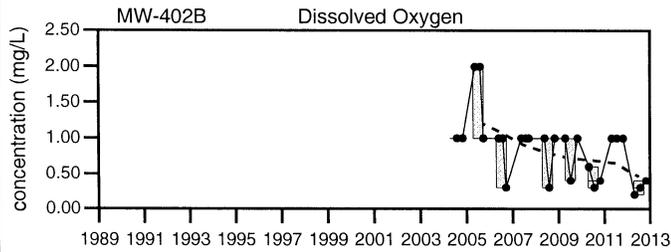
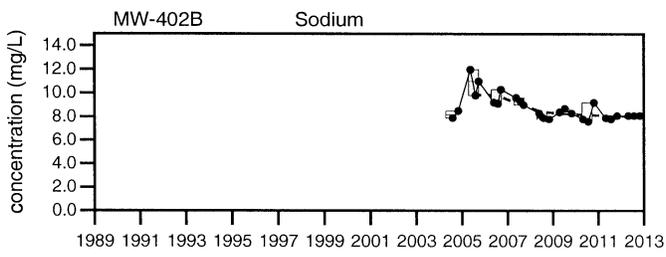
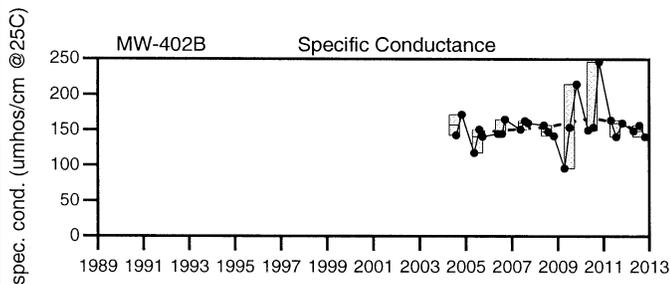
**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- - Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
MW-402A

Sevee & Maher Engineers, Inc.





**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- FFT smoothing of yearly mean values.
- Sample Event
- BDL

Juniper Ridge Landfill  
MW-402B

Sevee & Maher Engineers, Inc.

# P-04-02

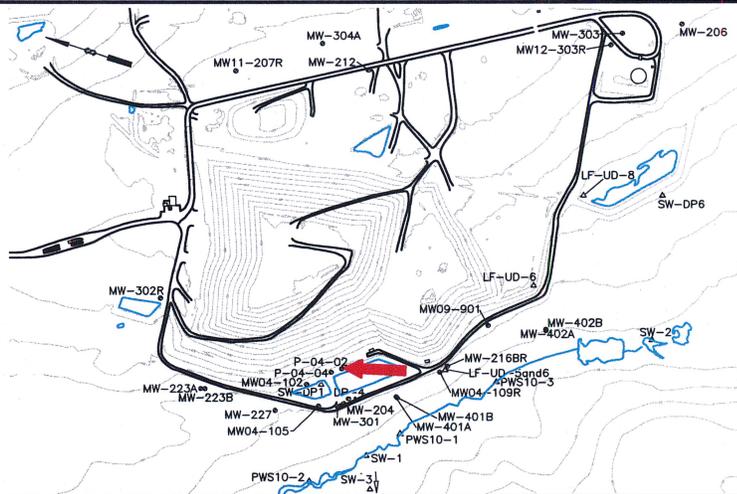
Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

P-04-02 monitors the water quality in the overburden downgradient of the landfill, between the leachate pond and landfill toe.

Screen Interval: **32.11 ft. to 37.11 ft.**  
 Sampled: **3 Times Annually**  
 Sampled Since: **02/05/04**  
 Material Screened: **Overburden**  
 Well Condition: **Good**  
 Sampling Method: **Low Flow**



## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Water Level Elevation (Feet)		158.19	157.18	↑ 162.09	141.57	to 161.72	160 ± 0.95		25
Specific Conductance (µmhos/cm @25°C)		193	283	245	166	to 414	230 ± 9.7		25
pH (Standard Units)		6.3	7.3	6.8	6.2	to 8.5	7.6 ± 0.09		25
Alkalinity (CaCO3) (field) (mg/L)		100	85	60	50	to 175	100 ± 6.1		23
Arsenic (mg/L)		0.007	0.005 U	0.005	0.001 U	to 0.012	0.0056 ± 0.000		25
Cadmium (mg/L)		0.0006 U	0.0006 U	0.0006 U	0.0002 U	to 0.0006	0.0003 ± 5E-05		20
Calcium (mg/L)		16.3	23.8	16.9	11	to 28	24 ± 0.74		25
Copper (mg/L)		0.003 U	0.004	0.004	0.001 U	to 0.004	0.0024 ± 0.000		20
Iron (mg/L)		↑ 1.43	0.52	0.24	0.02 U	to 1.32	0.13 ± 0.06		25
Magnesium (mg/L)		5.1	6.9	↓ 4.1	4.7	to 8.3	7.1 ± 0.17		25
Manganese (mg/L)		0.07	0.05	↑ 0.16	0.02 U	to 0.12	0.042 ± 0.007		25
Nickel (mg/L)		↑ 0.005 U	↑ 0.005 U	↑ 0.005 U	0.002 U	to 0.003	0.0021 ± 7E-05		20
Potassium (mg/L)		1.7	1.6	1.7	1.1	to 3.5	1.5 ± 0.09		25
Sodium (mg/L)		11.4	17.6	<b>25.8</b>	6.5	to 73	14 ± 3.1		25
Total Kjeldahl Nitrogen (mg/L)		0.6	0.35	0.62	0.22	to 0.73	0.44 ± 0.04		23
Ammonia (N) (mg/L)		↑ 0.5 U	↑ 0.5 U	↑ 0.5 U	0.1 U	to 0.1	0.1 ± 0		25
Nitrate (N) (mg/L)		0.3 U	0.3 U	0.3 U	0.1 U	to 0.3	0.16 ± 0.02		25
Total Dissolved Solids (mg/L)		211	205	198	113	to 275	140 ± 6.2		25
Total Suspended Solids (mg/L)		11	9	13	4 U	to 21	4.8 ± 0.69		25
Sulfate (mg/L)		11.3	25.2	25.1	8.9	to 29	14 ± 0.86		25
Bicarbonate (CaCO3) (mg/L)		↓ 63	94	↓ 85	90	to 178	100 ± 3.6		25
Organic Carbon (mg/L)		↑ 11.9	5.2	5.7	0.5 U	to 10	2 ± 0.42		25
Chemical Oxygen Demand (mg/L)		19	10 U	15	3 U	to 30	5.4 ± 1.4		25
Chloride (mg/L)		↑ 8.8	↑ 7.8	4.9	1	to 7	2.1 ± 0.23		25
Turbidity (field) (NTU)		64.4	19.1	16.2	0	to 80.6	4.2 ± 3.2		25
Tannin & Lignins (Tannic Acid) (mg/L)		↑ 1.7	↑ 0.76	↑ 1 U	0.2 U	to 0.2 U	0.2 ± 0		23

underlined/bold - values exceed a regulatory standard listed below.

### Applicable Limits:

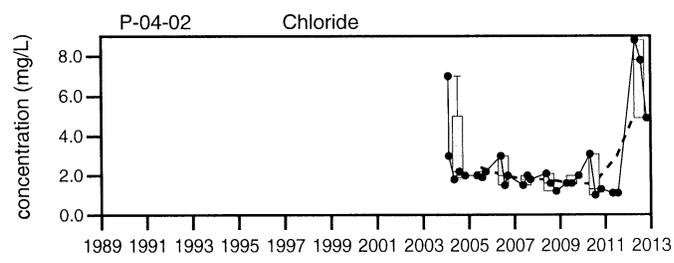
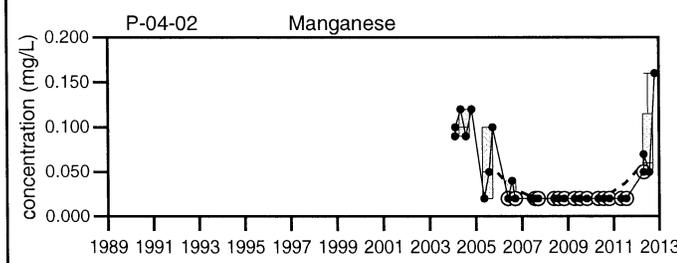
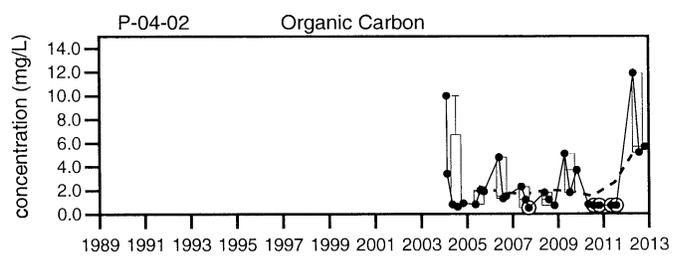
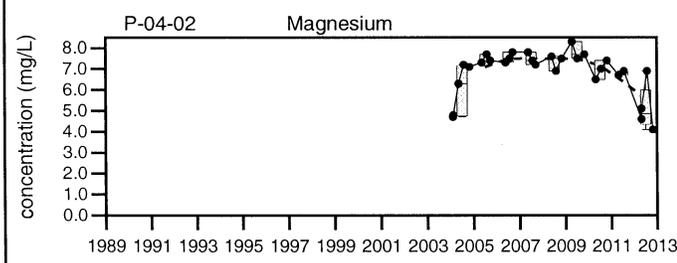
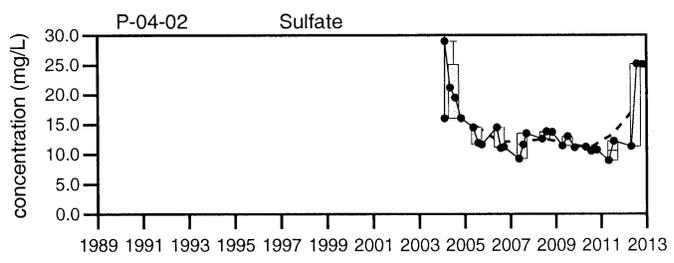
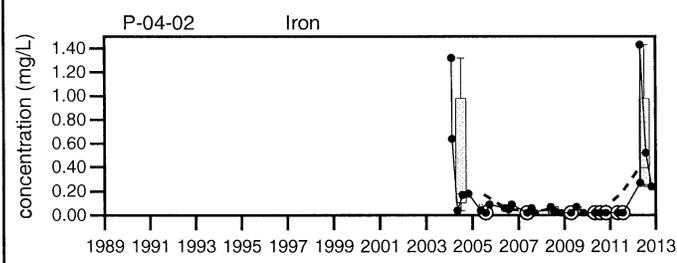
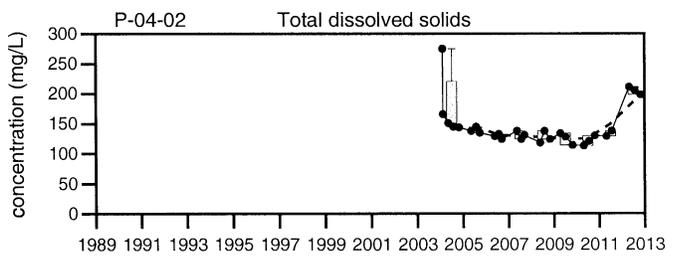
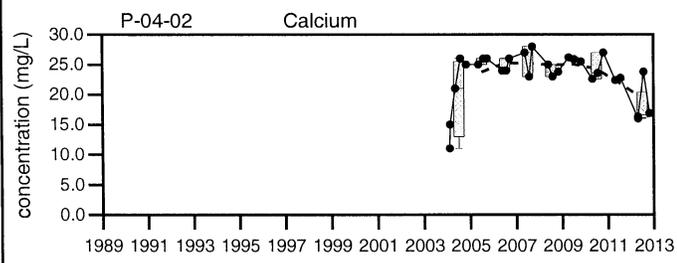
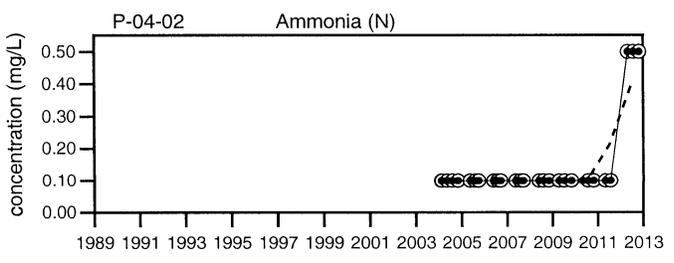
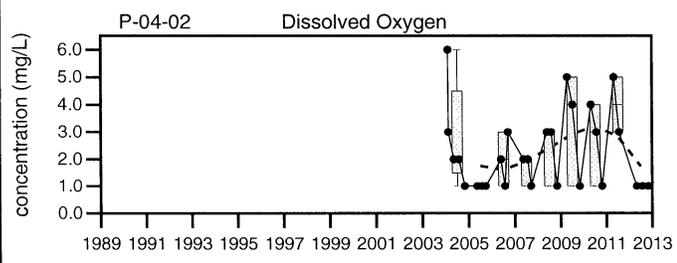
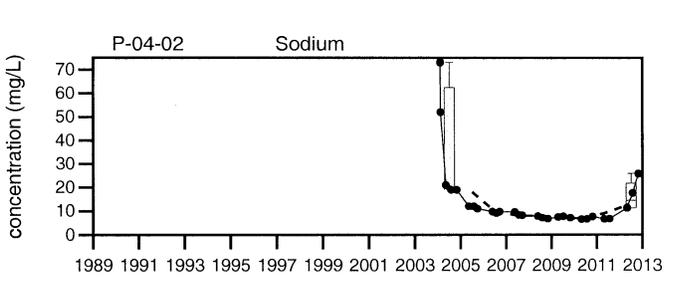
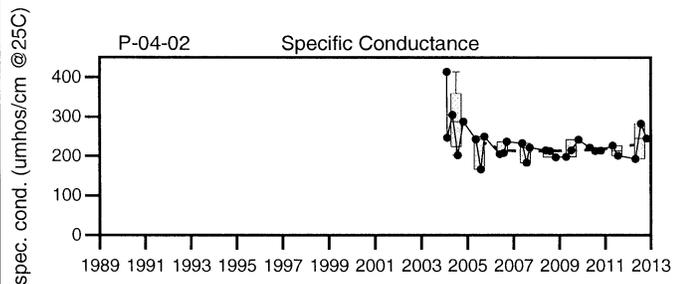
Nitrate (N) MCL=10 mg/L, MEG12=10 mg/L, Cadmium MCL=0.005 mg/L, MEG12=0.001 mg/L, Copper MCL=1.3 mg/L, MEG12=0.5 mg/L, Iron MEG12=5 mg/L, Manganese MEG12=0.5 mg/L, Nickel MEG12=0.02 mg/L, Arsenic MCL=0.01 mg/L, MEG12=0.01 mg/L, Ammonia (N) MEG12=30 mg/L, Sodium MEG12=20 mg/L

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed.



**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
P-04-02

Sevee & Maher Engineers, Inc.

# P-04-04

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

P-04-02 monitors the water quality in the overburden downgradient of the landfill, between the leachate pond and landfill toe.

Screen Interval: **27.21 ft. to 32.21 ft.**

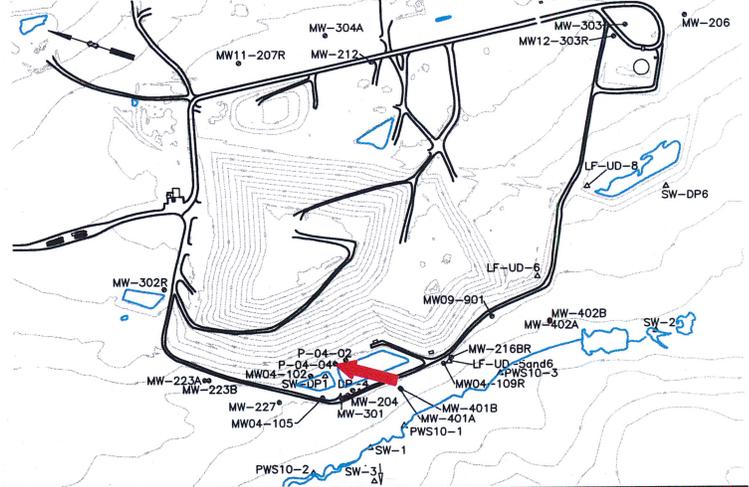
Sampled: **3 Times Annually**

Sampled Since: **02/05/04**

Material Screened: **Overburden**

Well Condition: **Good**

Sampling Method: **Low Flow**



## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Water Level Elevation (Feet)		159.73	159.3	160.45	140.18	to 161.85	160 ± 0.95		26
Specific Conductance (µmhos/cm @25°C)		185	177	158	148	to 405	190 ± 10		26
pH (Standard Units)		7.1	7.7	7.4	6.2	to 8.4	7.7 ± 0.09		26
Alkalinity (CaCO3) (field) (mg/L)		100	100	50	40	to 150	84 ± 6.3		24
Arsenic (mg/L)		0.008	0.005	0.01	0.001	to 0.011	0.0051 ± 0.000		26
Cadmium (mg/L)		↑ 0.0006 U	↑ 0.0006 U	↑ 0.0006 U	0.0002 U	to 0.0005	0.00027 ± 4E-05		21
Calcium (mg/L)		18.3	21.2	19.9	11	to 58.1	24 ± 1.5		26
Copper (mg/L)		0.003 U	0.003 U	0.003 U	0.001 U	to 0.015	0.0027 ± 0.000		21
Iron (mg/L)		0.05 U	0.05 U	0.05 U	0.02 U	to 0.93	0.067 ± 0.04		26
Magnesium (mg/L)		5.1	5.2	5.8	4.8	to 6.1	5.4 ± 0.07		26
Manganese (mg/L)		0.05 U	0.05 U	0.05 U	0.02 U	to 0.12	0.028 ± 0.005		26
Nickel (mg/L)		↑ 0.005 U	↑ 0.005 U	↑ 0.005 U	0.002 U	to 0.003	0.0021 ± 7E-05		21
Potassium (mg/L)		1.3	1.3	1.3	0.9	to 4.6	1.7 ± 0.13		26
Sodium (mg/L)		4.1	4.2	4.2	3.7	to 73	9.2 ± 2.7		26
Total Kjeldahl Nitrogen (mg/L)		0.3 U	0.3 U	0.3 U	0.17	to 0.7	0.41 ± 0.03		24
Ammonia (N) (mg/L)		↑ 0.5 U	↑ 0.5 U	↑ 0.5 U	0.1 U	to 0.4	0.12 ± 0.01		26
Nitrate (N) (mg/L)		0.3 U	0.3 U	0.3 U	0.1 U	to 2.5	0.25 ± 0.09		26
Total Dissolved Solids (mg/L)		114	95	111	92	to 287	120 ± 7.1		26
Total Suspended Solids (mg/L)		4 U	4 U	4 U	4 U	to 21	4.8 ± 0.66		26
Sulfate (mg/L)		8.5	↑ 28.8	8.1	5.5	to 23.8	9.3 ± 0.88		26
Bicarbonate (CaCO3) (mg/L)		75	76	78	72	to 153	85 ± 3.2		26
Organic Carbon (mg/L)		2 U	2 U	2 U	0.5 U	to 3.8	1.3 ± 0.15		26
Chemical Oxygen Demand (mg/L)		10 U	10 U	10 U	3 U	to 13	3.5 ± 0.39		26
Chloride (mg/L)		1.8	1.8	2	0.9	to 7.2	1.9 ± 0.23		26
Turbidity (field) (NTU)		2.9	2.7	3	0	to 162	7.2 ± 6.2		26
Tannin & Lignins (Tannic Acid) (mg/L)		0.2 U	0.2 U	0.2 U	0.2 U	to 0.2 U	0.2 ± 5E-10		24

underlined/bold - values exceed a regulatory standard listed below.

### Applicable Limits:

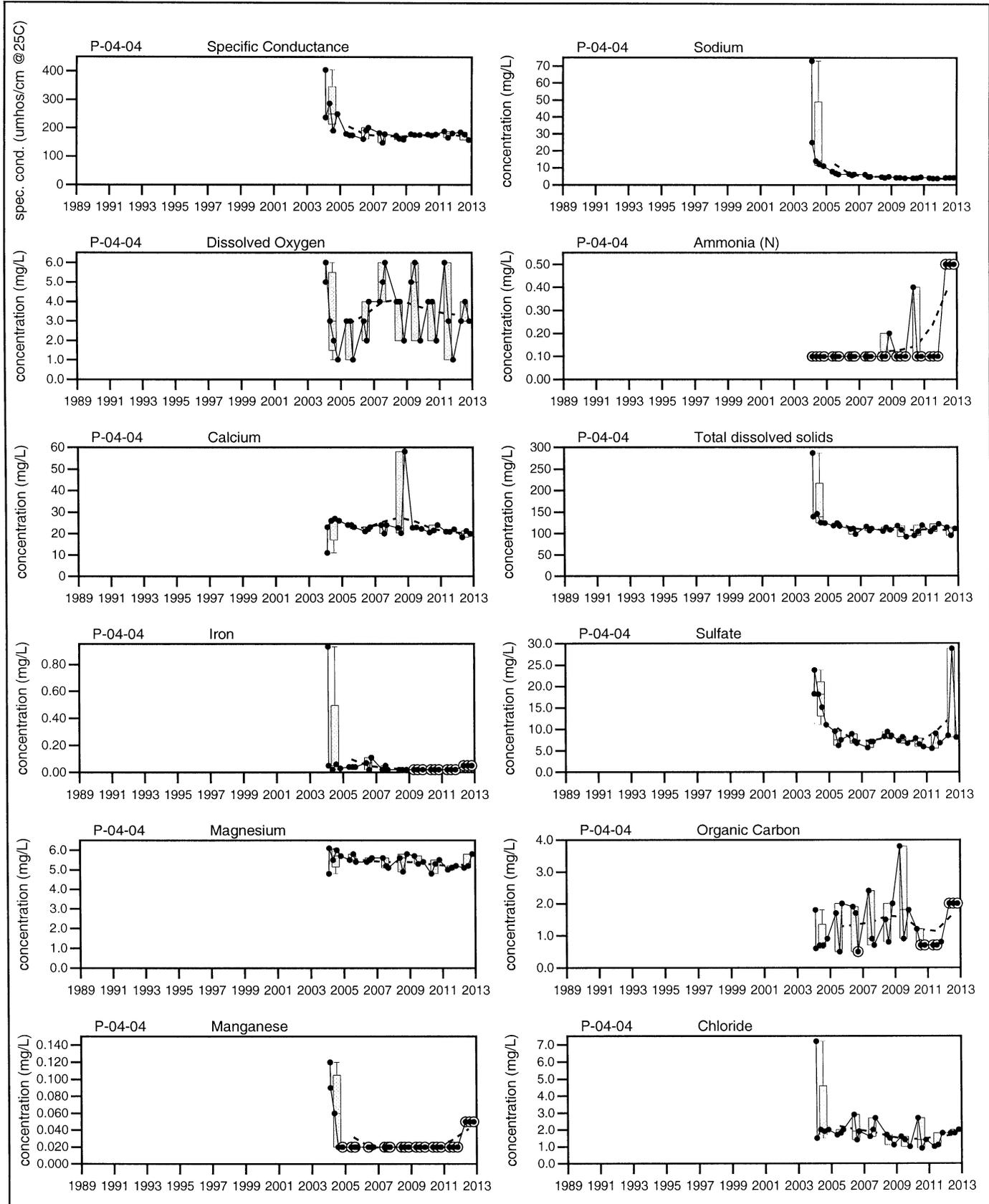
Nitrate (N) MCL=10 mg/L, MEG12=10 mg/L, Cadmium MCL=0.005 mg/L, MEG12=0.001 mg/L, Copper MCL=1.3 mg/L, MEG12=0.5 mg/L, Iron MEG12=5 mg/L, Manganese MEG12=0.5 mg/L, Nickel MEG12=0.02 mg/L, Arsenic MCL=0.01 mg/L, MEG12=0.01 mg/L, Ammonia (N) MEG12=30 mg/L, Sodium MEG12=20 mg/L

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed.



**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- - Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
P-04-04

Sevee & Maher Engineers, Inc.

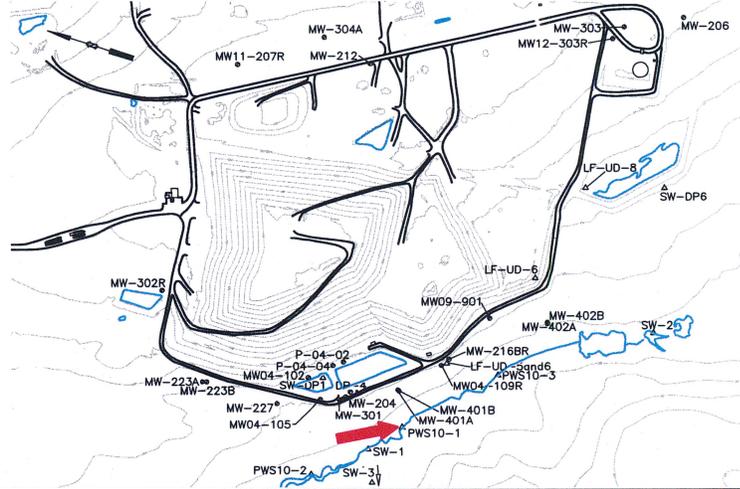
# PWS10-1

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

PWS-1 is a poor water sampling location along the unnamed tributary to Pushaw stream. PWS-1 is downgradient of the landfill.



Screen Interval:

Sampled: **3 Times Annually**

Sampled Since: **04/26/2010**

Material Screened:

Well Condition: **NA**

Sampling Method: **Low Flow**

## Chemical Summary

Indicator Parameters	2012				Historical				n
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	
Specific Conductance (µmhos/cm @25°C)		162	<b>↓</b> 104	<b>↓</b> 138	150	to 438	260 ± 44		6
pH (Standard Units)		6	6	5.8	5.8	to 6.5	6.1 ± 0.11		6
Alkalinity (CaCO3) (field) (mg/L)		55	50	35	10	to 200	91 ± 32		6
Arsenic (mg/L)		0.007	0.005 U	0.006	0.002 U	to 0.015	0.009 ± 0.002		6
Cadmium (mg/L)		0.0006 U	0.0006 U	0.0006 U	0.0002 U	to 0.0016	0.00043 ± 0.000		6
Calcium (mg/L)		<b>↓</b> 16.3	<b>↓</b> 9.8	<b>↓</b> 13.2	17	to 35.2	25 ± 3.3		6
Copper (mg/L)		0.003 U	0.003 U	0.003 U	0.001 U	to 0.009	0.0035 ± 0.001		6
Iron (mg/L)		<b>↓</b> 0.48	3.47	2.61	0.63	to 30.3	7.6 ± 4.6		6
Magnesium (mg/L)		5.1	<b>↓</b> 3.2	5.3	4.5	to 12.2	8 ± 1		6
Manganese (mg/L)		0.07	0.4	0.1	0.05	to 0.72	0.33 ± 0.11		6
Nickel (mg/L)		0.005 U	0.005 U	0.005 U	0.002 U	to 0.034	0.01 ± 0.006		6
Potassium (mg/L)		<b>↓</b> 0.6	<b>↓</b> 0.5	<b>↓</b> 0.4	1	to 2.8	1.6 ± 0.27		6
Sodium (mg/L)		7.9	<b>↓</b> 5.1	<b>↓</b> 6.4	6.7	to 9.6	8.2 ± 0.45		6
Ammonia (N) (mg/L)		0.5 U	0.5 U	0.5 U	0.1 U	to 1.1	0.45 ± 0.21		6
Nitrate (N) (mg/L)		<b>↑</b> 0.3 U	<b>↑</b> 0.5	<b>↑</b> 0.3 U	0.1 U	to 0.1 U	0.1 ± 8E-10		6
Phosphate Phosphorus (mg/L)		0.04 U	0.16	0.09	0.03	to 0.26	0.12 ± 0.03		6
Total Dissolved Solids (mg/L)		<b>↓</b> 132	<b>↓</b> 104	<b>↓</b> 130	134	to 176	160 ± 6.3		6
Total Suspended Solids (mg/L)		8	32	25	4 U	to 786	140 ± 130		6
Sulfate (mg/L)		6.3	2 U	2.7	1	to 10	3.2 ± 1.4		6
Bicarbonate (CaCO3) (mg/L)		<b>↓</b> 63	<b>↓</b> 41	<b>↓</b> 48	70	to 125	92 ± 9.4		6
Organic Carbon (mg/L)		10.5	13.7	13.3	7.5	to 19.7	10 ± 1.9		6
Chemical Oxygen Demand (mg/L)		26	<b>↑</b> 58	38	20	to 40	31 ± 2.6		6
Chloride (mg/L)		8.4	<b>↓</b> 3.5	8.2	7.3	to 14.6	11 ± 1.1		6
Turbidity (field) (NTU)		<b>↓</b> 2.1	14	3.7	2.5	to 20	7.4 ± 2.7		6
Tannin & Lignins (Tannic Acid) (mg/L)		1.2	3.4	1.8	1	to 5	2 ± 0.62		6

**underlined/bold** - values exceed a regulatory standard listed below.

### Applicable Limits:

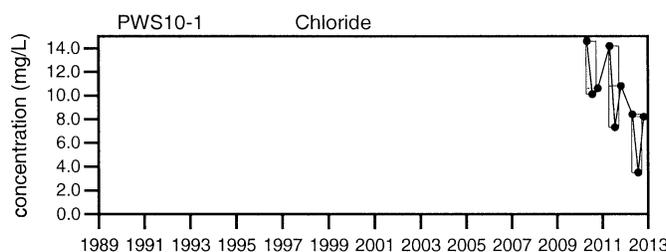
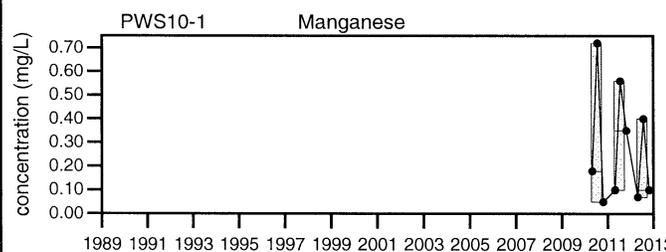
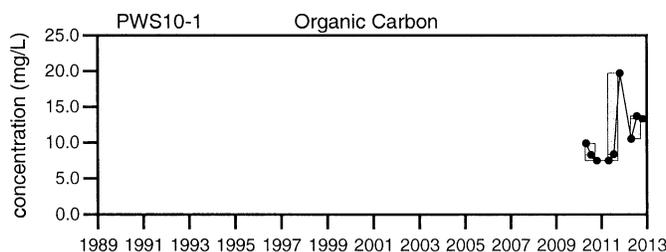
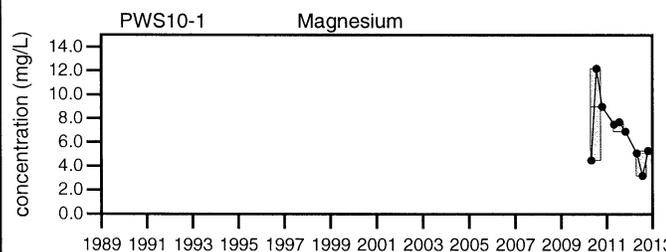
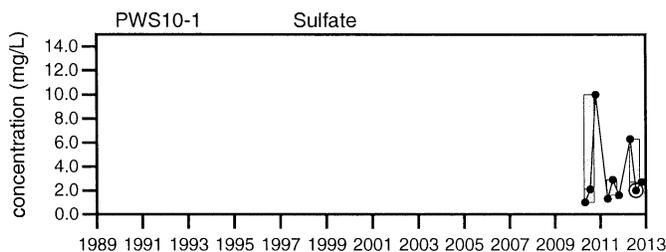
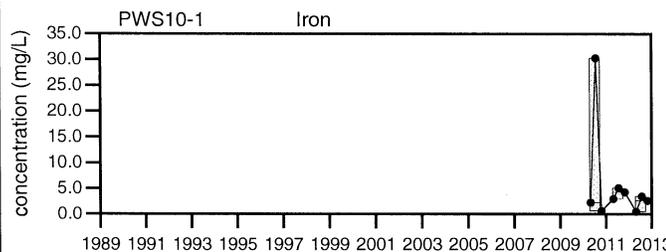
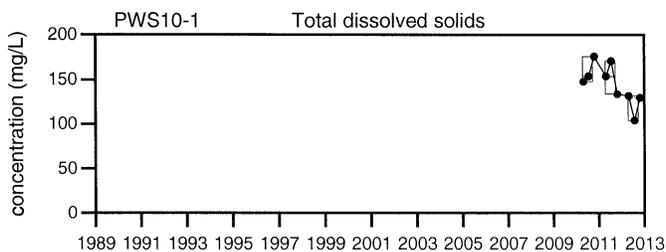
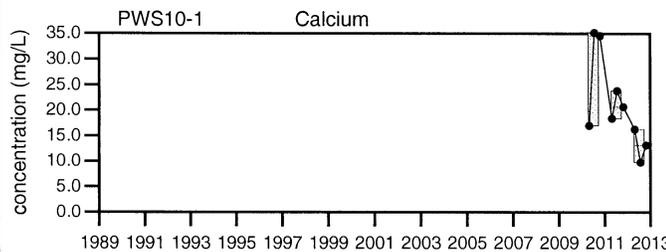
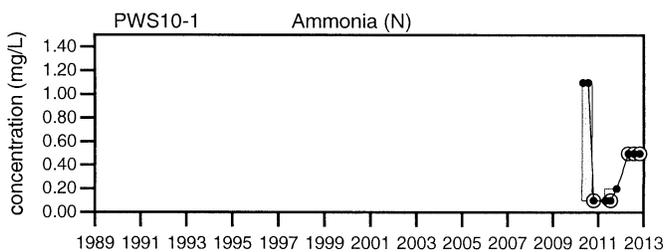
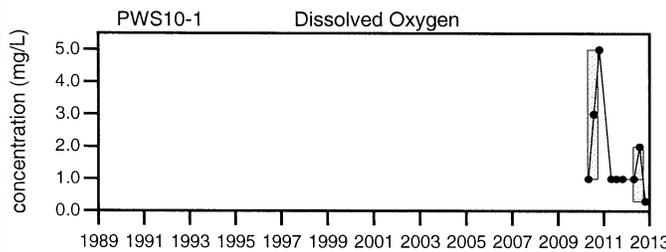
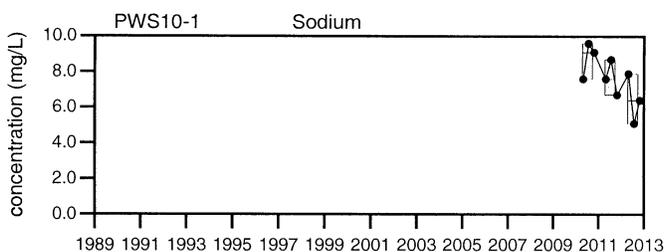
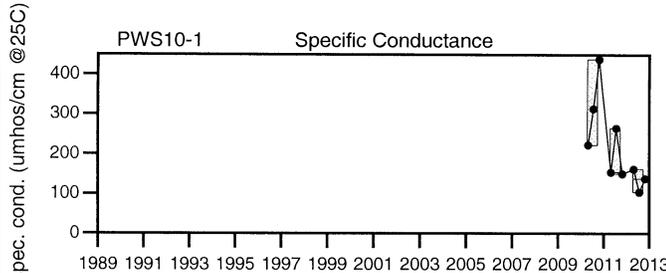
Nitrate (N) MCL=10 mg/L, MEG12=10 mg/L, Cadmium MCL=0.005 mg/L, MEG12=0.001 mg/L, Copper MCL=1.3 mg/L, MEG12=0.5 mg/L, Iron MEG12=5 mg/L, Manganese MEG12=0.5 mg/L, Nickel MEG12=0.02 mg/L, Arsenic MCL=0.01 mg/L, MEG12=0.01 mg/L, Ammonia (N) MEG12=30 mg/L, Sodium MEG12=20 mg/L

**↑** indicates a value greater than the historical maximum value; **↓** indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed.



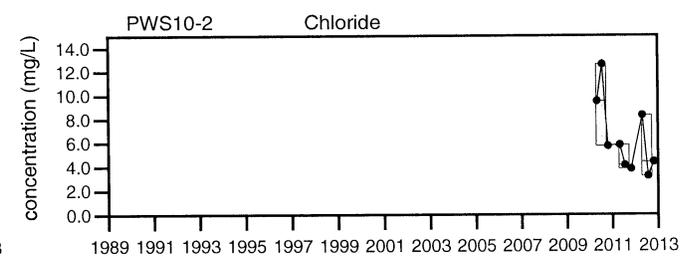
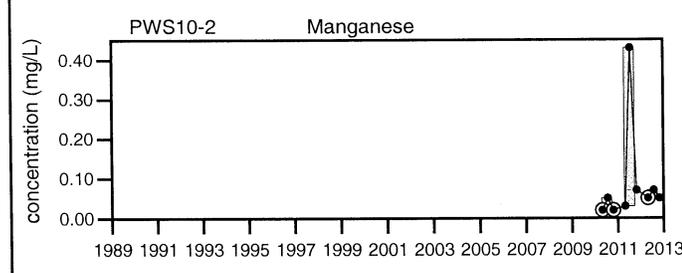
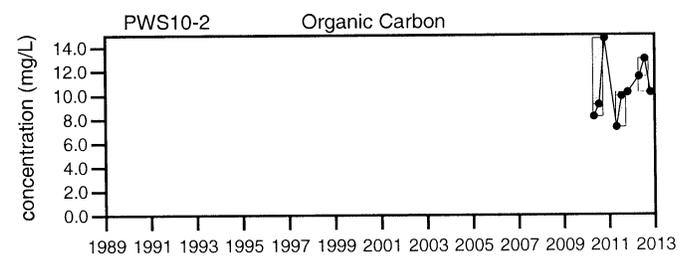
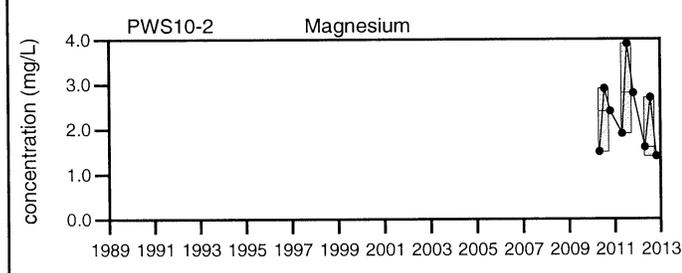
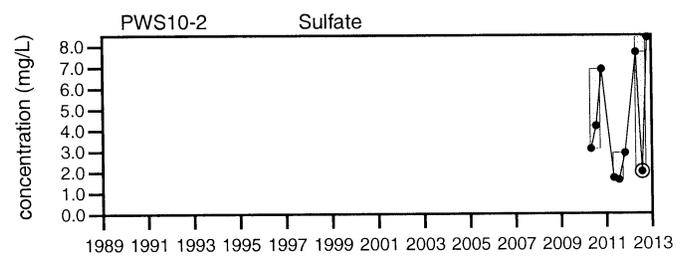
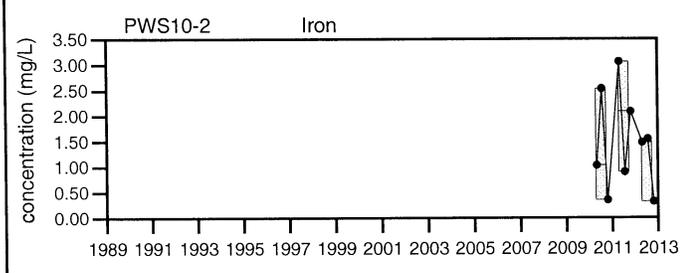
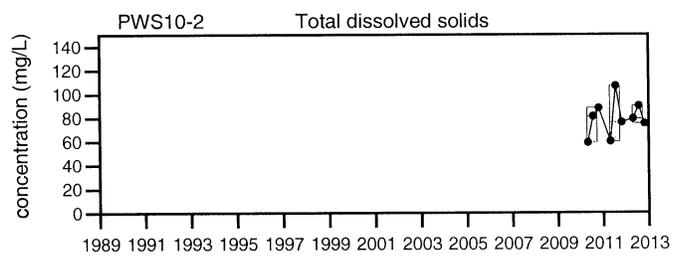
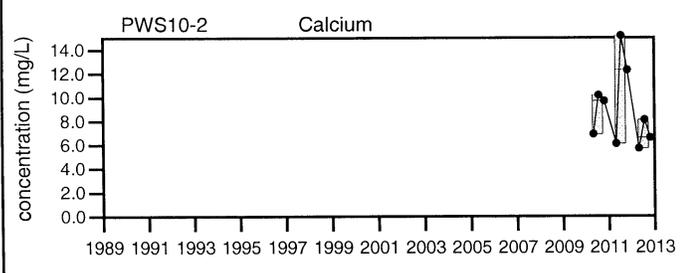
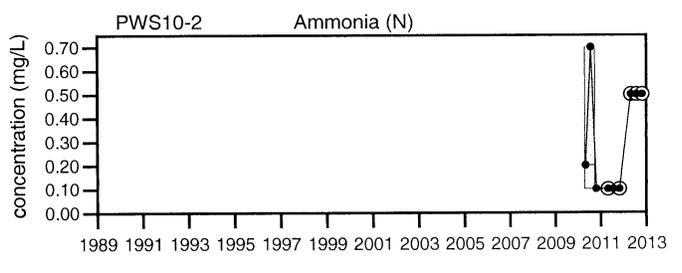
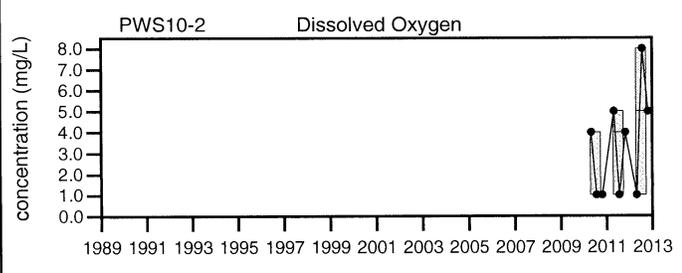
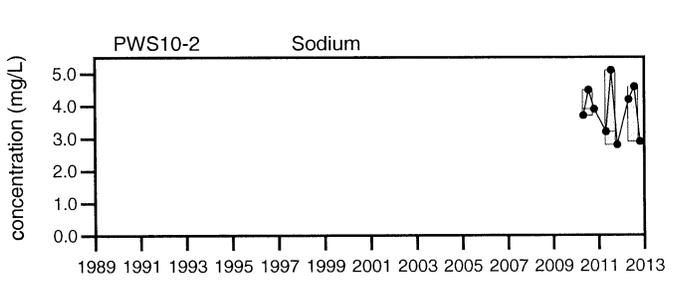
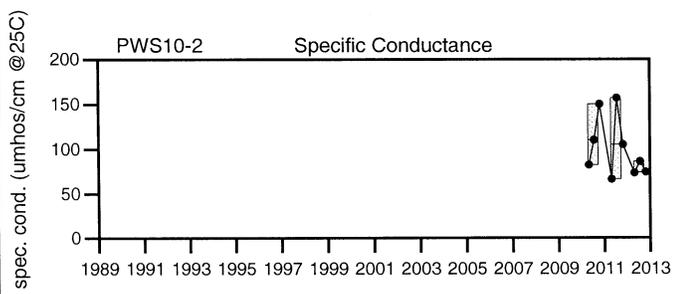
**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- Sample Event
- BDL

Juniper Ridge Landfill  
PWS10-1

Sevee & Maher Engineers, Inc.





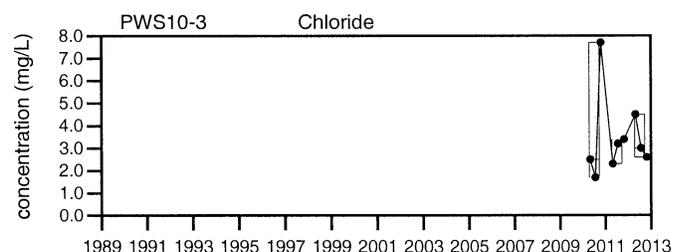
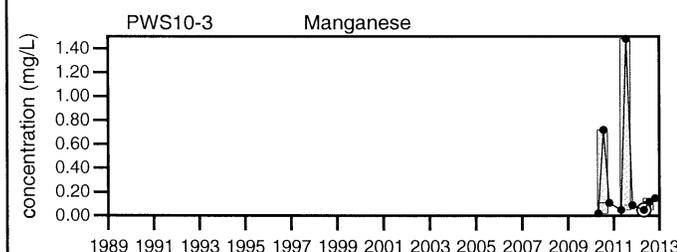
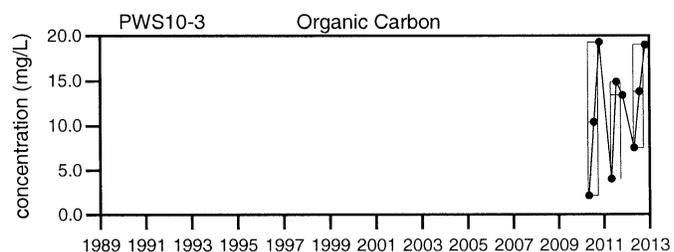
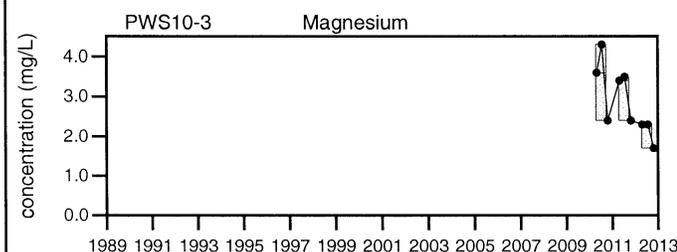
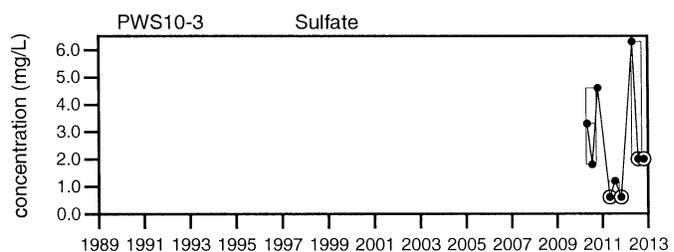
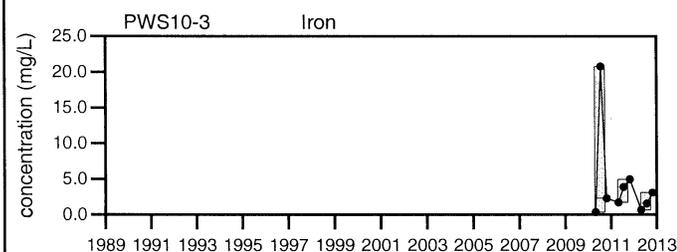
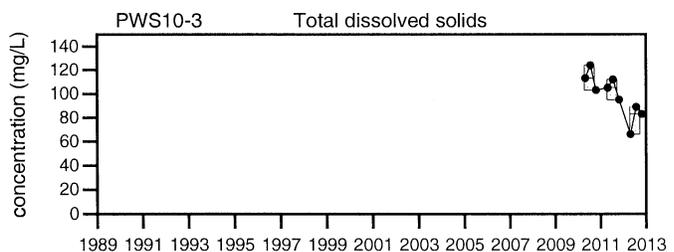
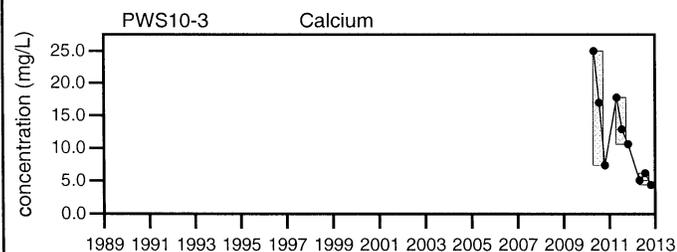
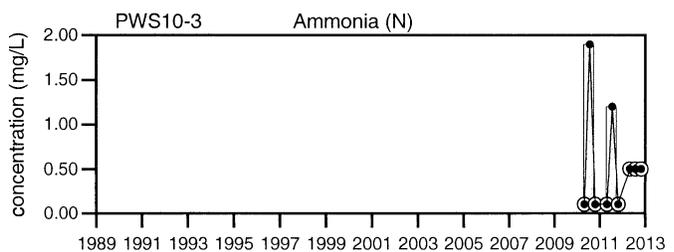
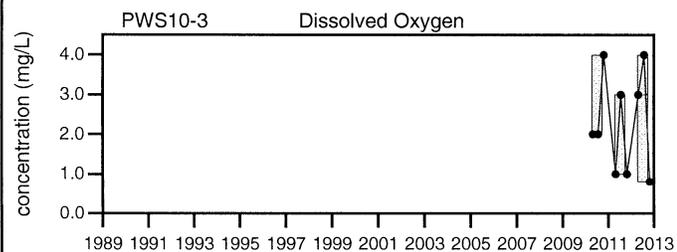
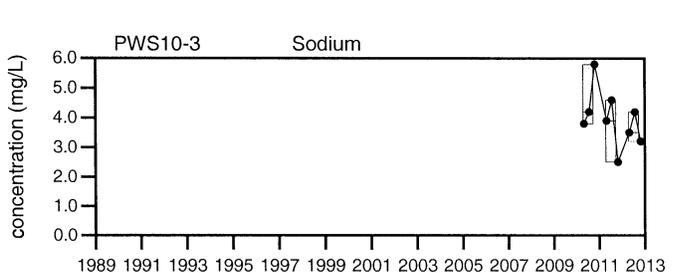
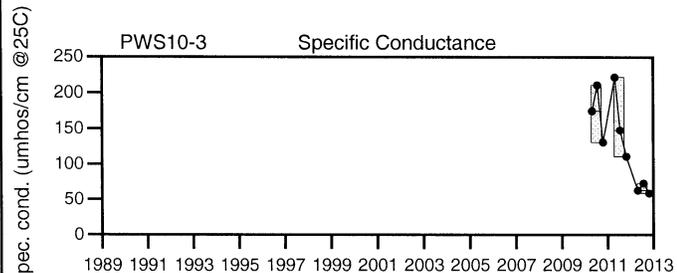
**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- Sample Event
- BDL

Juniper Ridge Landfill  
PWS10-2

Sevee & Maher Engineers, Inc.





**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- Sample Event
- BDL

Juniper Ridge Landfill  
PWS10-3

Sevee & Maher Engineers, Inc.

# SW-1

Juniper Ridge Landfill

annual stats 2012 minus leachate

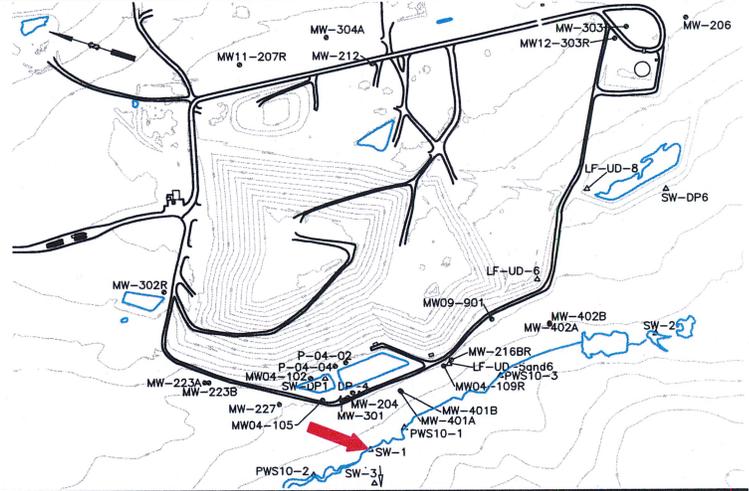
## Well Description

SW-1 is located downgradient of the landfill and monitors surface water quality in an unnamed tributary to Pushaw Stream.

Sampled: **3 Times Annually**

Sampled Since: **11/13/90**

Sampling Method: **Grab**



## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance (µmhos/cm @25°C)	78	108	98	98	10	345	96 ± 7.3		65
pH (Standard Units)	6.7	6.9	7.2	7.2	5.8	8.1	6.9 ± 0.08		65
Alkalinity (CaCO3) (field) (mg/L)	35	60	50	50	10	135	44 ± 6.9		22
Arsenic (mg/L)	0.005 U	↑ 0.01	0.005 U	0.005 U	0.001	0.009	0.0035 ± 0.000		23
Cadmium (mg/L)	0.00006	0.00006	<b>0.00019</b>	0.00006	0.00002 U	0.0005	0.0019 ± 0.000		32
Calcium (mg/L)	5.4	10.6	11.6	11.6	3.1	48	9.8 ± 1.1		53
Copper (mg/L)	0.0003 U	0.0003 U	<b>0.0027</b>	0.0003 U	0.0001 U	0.01	0.0086 ± 0.002		32
Iron (mg/L)	0.23	<b>2.32</b>	0.3	0.3	0.1	19.4	2.1 ± 0.42		58
Magnesium (mg/L)	1.8	3.6	2.6	2.6	0.21	10.7	2.7 ± 0.23		53
Manganese (mg/L)	0.05 U	0.25	0.05	0.05	0.001	4.8	0.24 ± 0.09		58
Nickel (mg/L)	0.005 U	0.005 U	0.005 U	0.005 U	0.002 U	0.01	0.0029 ± 0.000		20
Potassium (mg/L)	1	0.8	1.1	1.1	0.1	5	1.2 ± 0.25		23
Sodium (mg/L)	5.1	5	4.1	4.1	2.9	12	5.7 ± 0.25		58
Ammonia (N) (mg/L)	0.5 U	0.5 U	0.5 U	0.5 U	0.05 U	1.5	0.17 ± 0.04		35
Nitrate (N) (mg/L)	↑ 0.3 U	↑ 0.3	↑ 0.3 U	↑ 0.3 U	0.05 U	0.1	0.083 ± 0.004		35
Phosphate Phosphorus (mg/L)	0.04 U	0.11	0.04 U	0.04 U	0.01 U	0.81	0.089 ± 0.03		35
Total Dissolved Solids (mg/L)	65	89	104	104	30	230	85 ± 4.8		58
Total Suspended Solids (mg/L)	4 U	15	13	13	4 U	1490	83 ± 64		23
Sulfate (mg/L)	3.6	2 U	5.6	5.6	0.2	17	3 ± 0.37		58
Bicarbonate (CaCO3) (mg/L)	13.9	40	35	35	10.6	148	39 ± 8		23
Organic Carbon (mg/L)	10.8	13.8	9.6	9.6	5.2	34	13 ± 0.58		58
Biochemical Oxygen Demand (mg/L)	5 U	4 U	2 U	2 U	1 U	12	4.8 ± 0.36		35
Chemical Oxygen Demand (mg/L)	33	50	29	29	15	752	62 ± 14		58
Chloride (mg/L)	9.3	3.8	6	6	1 U	22.7	7.3 ± 0.55		58
Turbidity (field) (NTU)	2	9.6	1.6	1.6	0	175	6.8 ± 4		44
Tannin & Lignins (Tannic Acid) (mg/L)	2.2	4	1.7	1.7	0.2 U	4.5	2.2 ± 0.12		58

**underlined/bold** - values exceed a regulatory standard listed below.

### Applicable Limits:

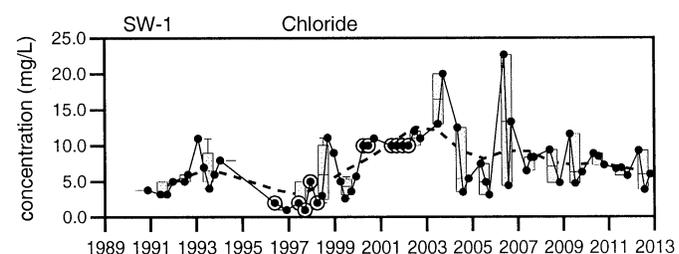
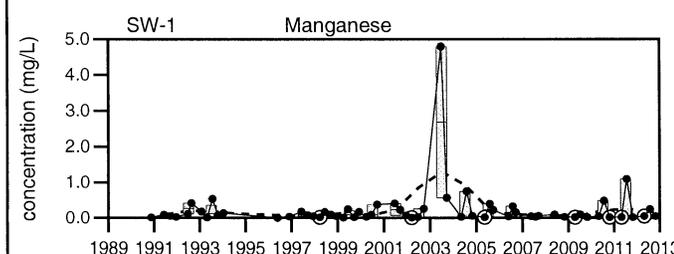
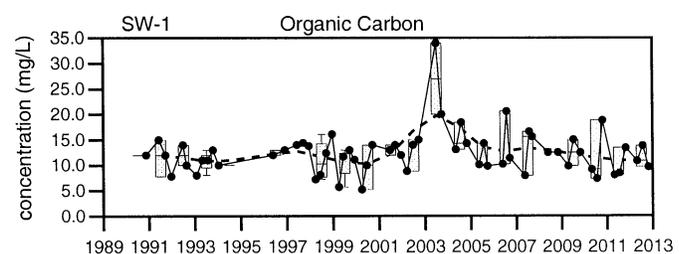
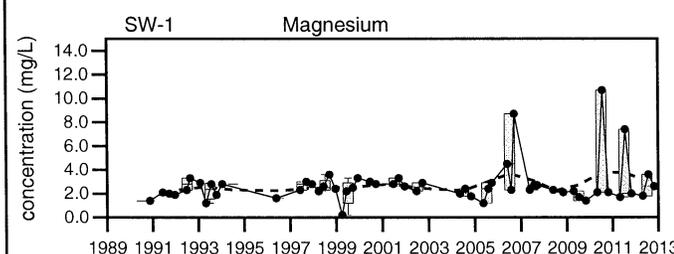
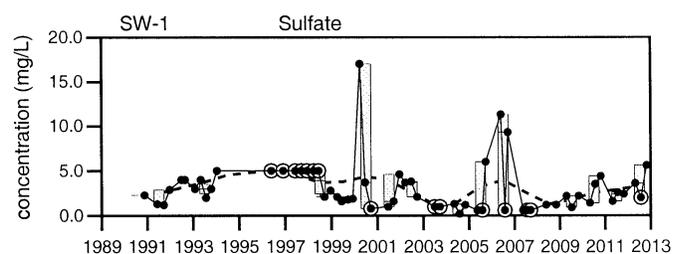
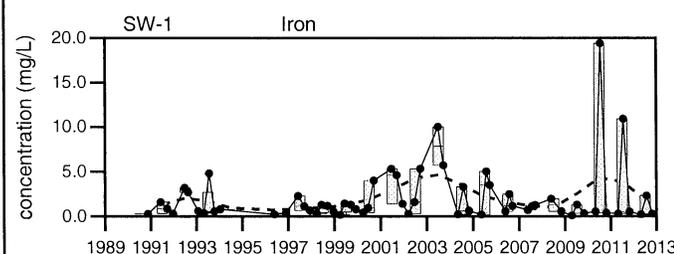
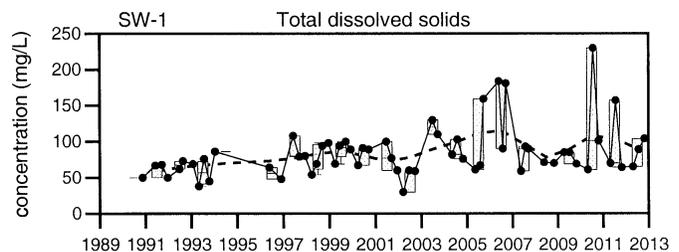
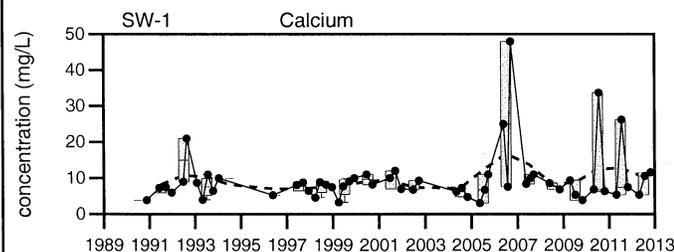
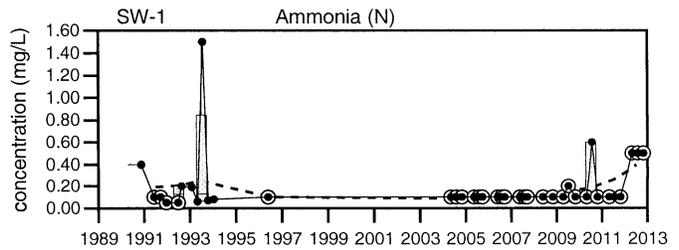
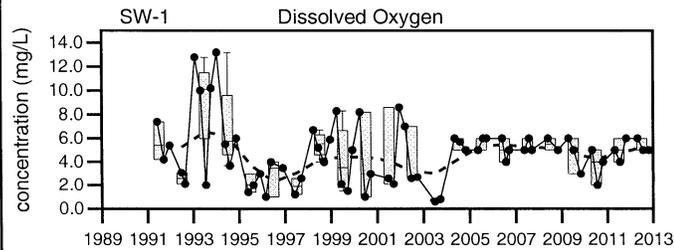
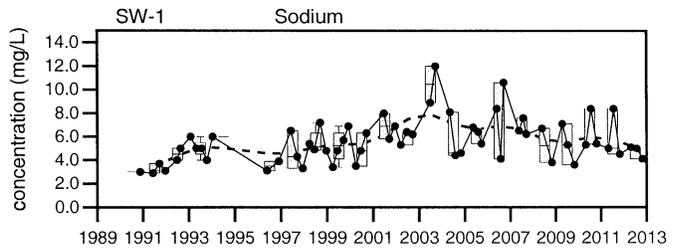
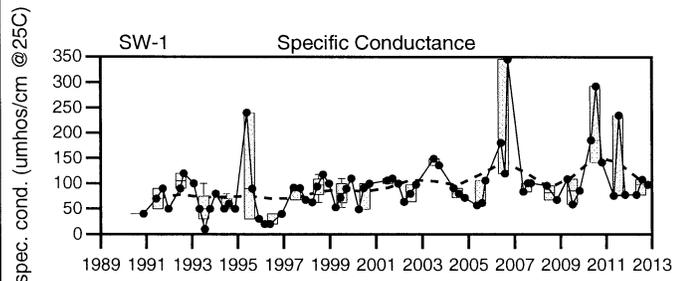
Chloride MFCCC=230 mg/L, Arsenic MFCCC=0.15 mg/L, Cadmium MFCCC=0.00008 mg/L, Copper MFCCC=0.00236 mg/L, Iron MFCCC=1 mg/L, Nickel MFCCC=0.0134 mg/L, Ammonia (N) MFCCC=3 mg/L

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed ! = the sampling location was damaged or destroyed. April 2012 and July 2012 Cadmium results are non-detect above the laboratory reporting limit (0.00006U mg/l).



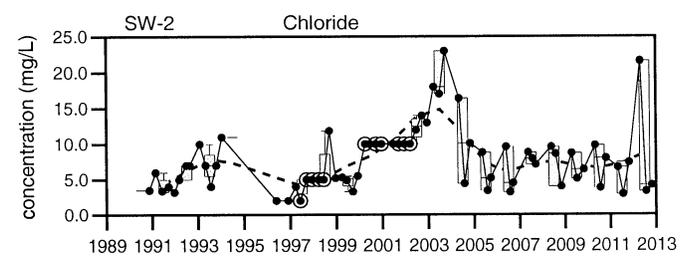
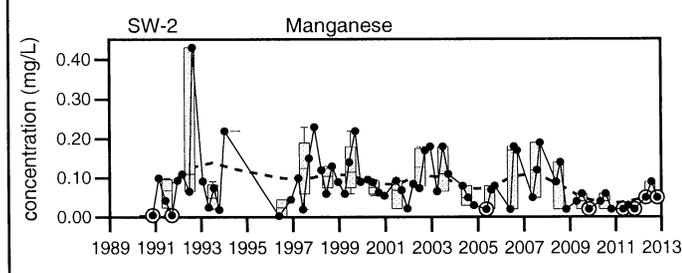
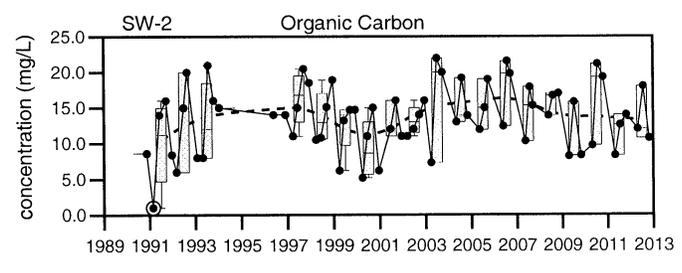
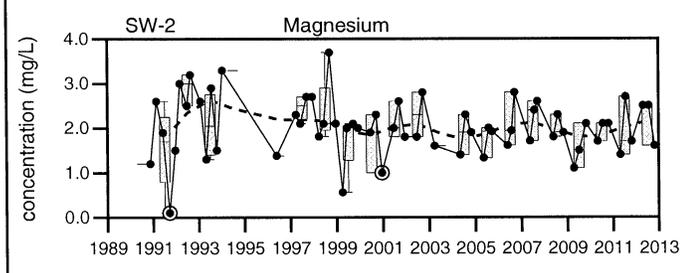
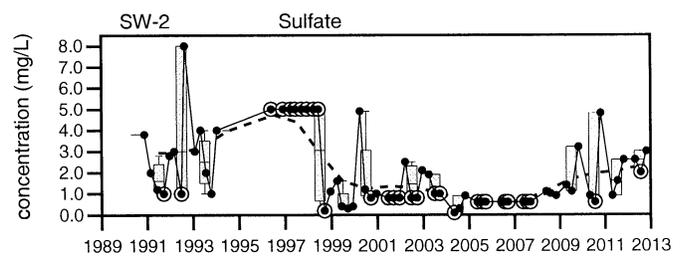
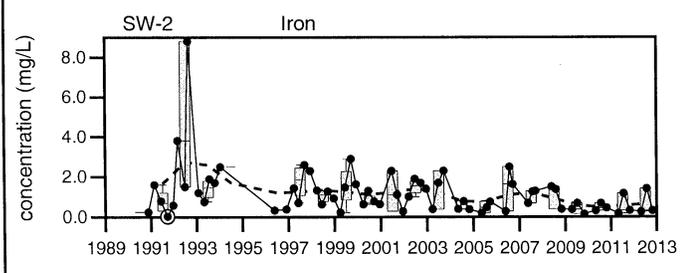
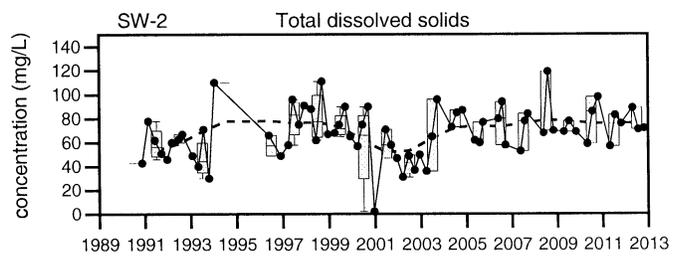
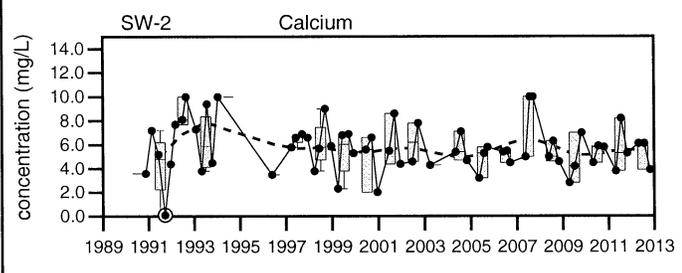
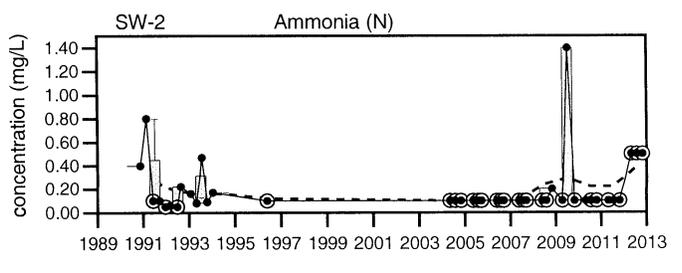
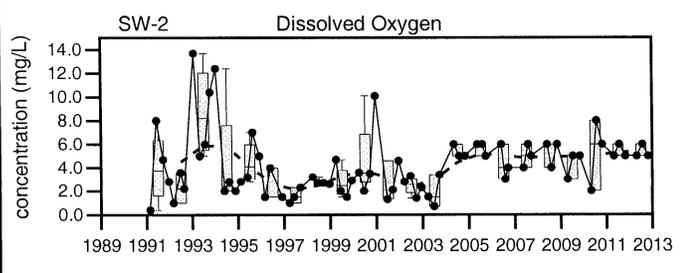
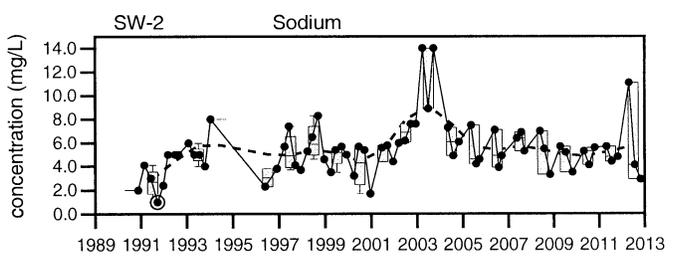
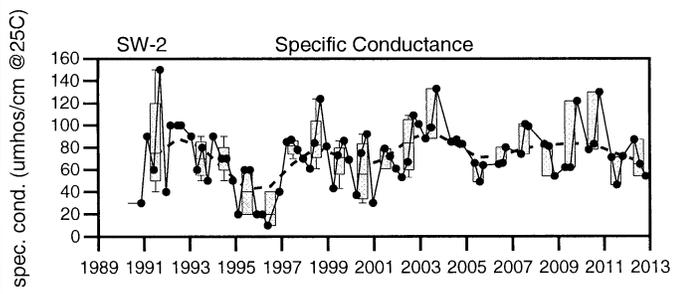
**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
SW-1

Sevee & Maher Engineers, Inc.





**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- - Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
SW-2

Sevee & Maher Engineers, Inc.

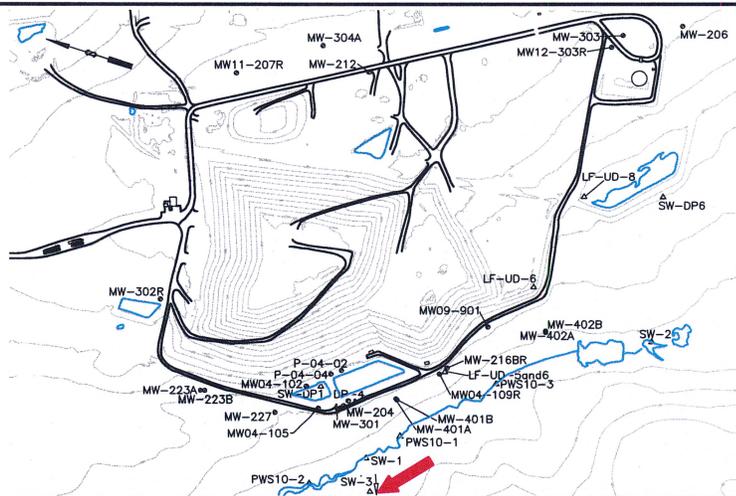
# SW-3

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

SW-3 is located downgradient of the landfill and monitors surface water quality in an unnamed tributary of Pushaw Stream.



Sampled: **3 Times Annually**

Sampled Since: **05/26/94**

Sampling Method: **Grab**

## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance (µmhos/cm @25°C)		54	103	46	20	151	80 ± 3.6		57
pH (Standard Units)		7.4	7.5	7.4	5.4	8.2	6.5 ± 0.07		57
Alkalinity (CaCO3) (field) (mg/L)		25	↑100	50	15	60	30 ± 2.4		24
Arsenic (mg/L)		↑0.005 U	↑0.005	↑0.005 U	0.001 U	0.004	0.0023 ± 0.000		24
Cadmium (mg/L)		0.00006	0.00006	0.00006	0.00002 U	0.0003	0.0018 ± 0.000		30
Calcium (mg/L)		4.3	10.1	4.3	2.8	11.2	6.8 ± 0.28		50
Copper (mg/L)		0.0003 U	0.0003 U	0.0003 U	0.0001 U	0.01	0.0073 ± 0.002		30
Iron (mg/L)		0.26	<b>1.34</b>	0.36	0.2	3.5	0.97 ± 0.09		57
Magnesium (mg/L)		1.2	3	1.2	0.47	3.1	1.9 ± 0.08		50
Manganese (mg/L)		0.05 U	0.46	0.05 U	0.004	1.3	0.15 ± 0.03		57
Nickel (mg/L)		↑0.005 U	↑0.005 U	↑0.005 U	0.002 U	0.003	0.0021 ± 8E-05		21
Potassium (mg/L)		0.7	0.5	0.7	0.2	1.6	0.68 ± 0.08		24
Sodium (mg/L)		2.9	5.4	↓2.4	2.5	9.3	4.7 ± 0.17		57
Ammonia (N) (mg/L)		0.5 U	0.5 U	0.5 U	0.06	0.5	0.12 ± 0.01		33
Nitrate (N) (mg/L)		↑0.3 U	↑0.3 U	↑0.3 U	0.05 U	0.2	0.09 ± 0.005		33
Phosphate Phosphorus (mg/L)		0.04 U	0.05	0.04 U	0.01 U	0.4	0.043 ± 0.01		33
Total Dissolved Solids (mg/L)		58	79	74	31	210	72 ± 3.4		57
Total Suspended Solids (mg/L)		4 U	4	4 U	4 U	16	4.9 ± 0.55		24
Sulfate (mg/L)		3.5	2 U	2.3	0.4	35	3.9 ± 0.69		57
Bicarbonate (CaCO3) (mg/L)		10.9	33	13.6	10	40	22 ± 1.7		24
Organic Carbon (mg/L)		11.3	11.1	12.1	5.7	40	13 ± 0.63		57
Biochemical Oxygen Demand (mg/L)		5 U	4 U	2 U	2 U	6 U	5.2 ± 0.18		33
Chemical Oxygen Demand (mg/L)		32	31	35	18	61	36 ± 1.3		57
Chloride (mg/L)		4.6	2	3.8	1 U	12	6.1 ± 0.39		57
Turbidity (field) (NTU)		2.4	2.5	2.1	0	16	1.8 ± 0.43		45
Tannin & Lignins (Tannic Acid) (mg/L)		2.2	2.5 U	2.5 U	0.5 U	4.7	2.1 ± 0.1		57

**underlined/bold** - values exceed a regulatory standard listed below.

### Applicable Limits:

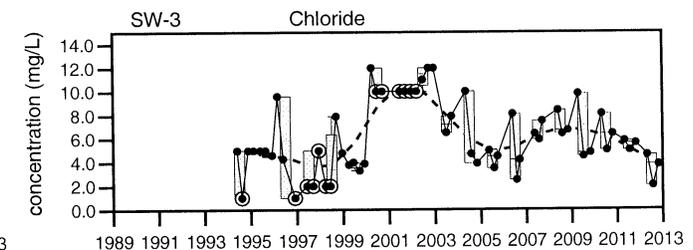
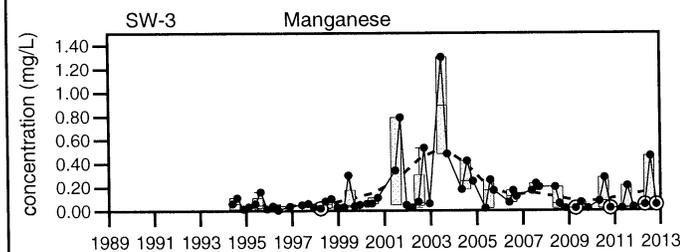
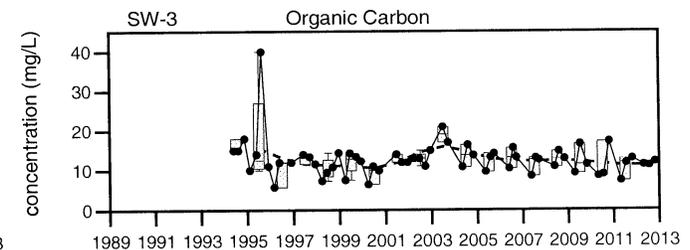
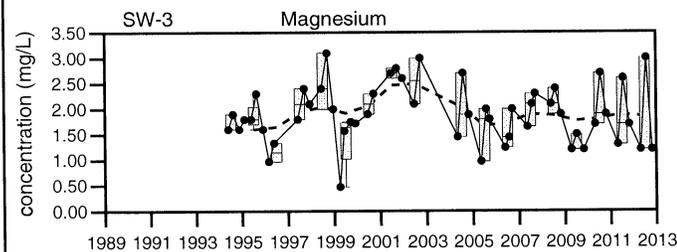
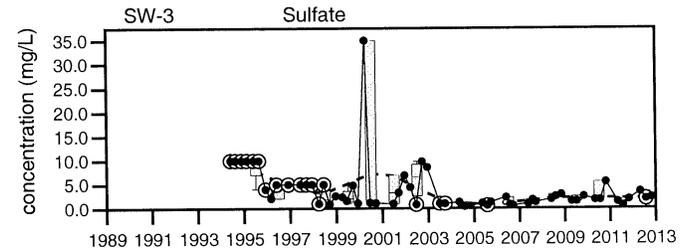
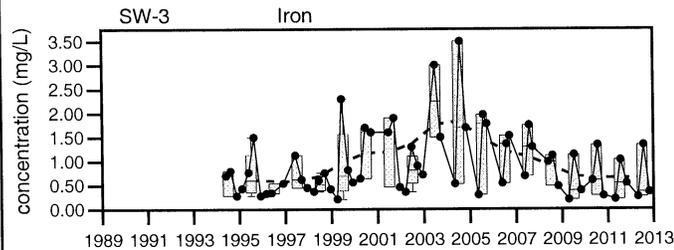
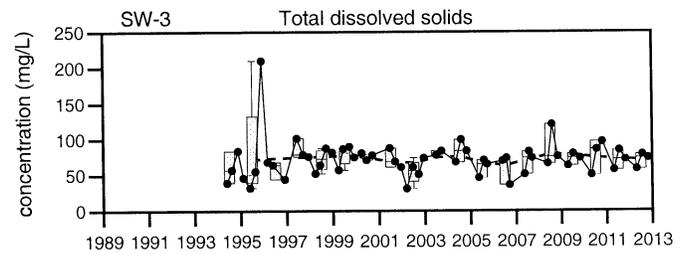
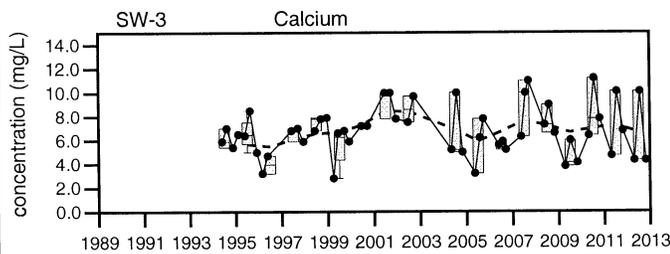
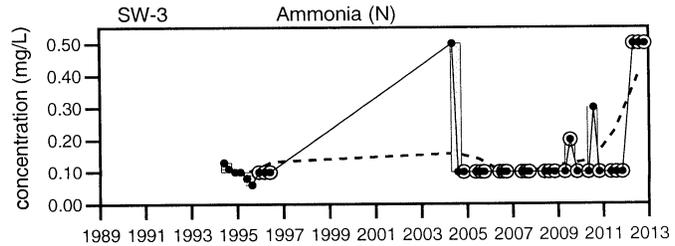
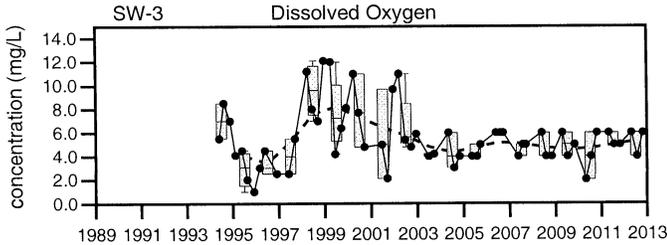
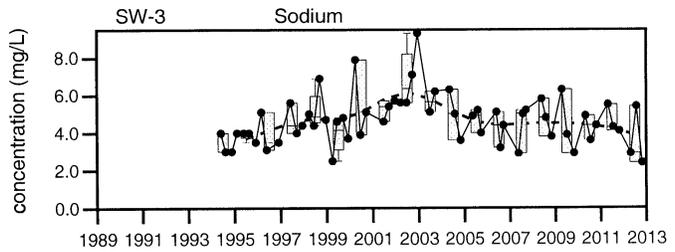
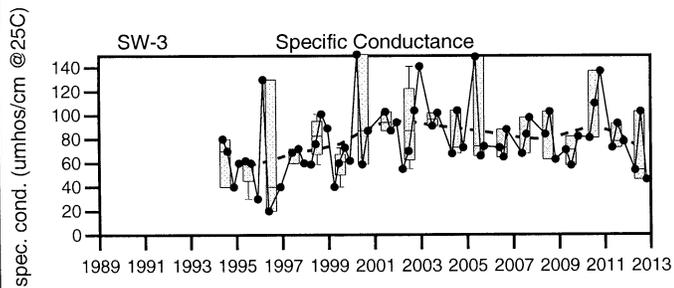
Chloride MFCCC=230 mg/L, Arsenic MFCCC=0.15 mg/L, Cadmium MFCCC=0.00008 mg/L, Copper MFCCC=0.00236 mg/L, Iron MFCCC=1 mg/L, Nickel MFCCC=0.0134 mg/L, Ammonia (N) MFCCC=3 mg/L

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed. April 2012, July 2012 and October 2012 Cadmium results are non-detect above the laboratory reporting limit (0.00006 µg/l).



**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- - Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
SW-3

Sevee & Maher Engineers, Inc.

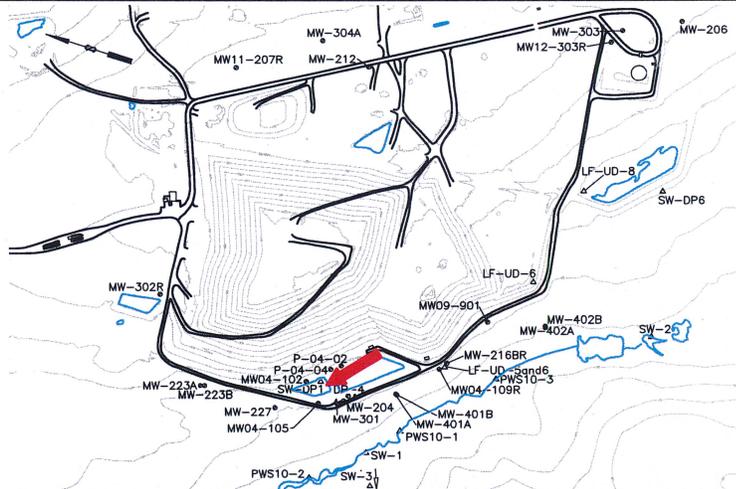
# SW-DP1

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

SW-DP1 is located in Detention Pond #1 which is situated to the north of the leachate pond.



Sampled: **3 Times Annually**

Sampled Since: **05/03/04**

Sampling Method: **Grab**

## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance (µmhos/cm @25°C)		107	167	↓66	101	to 400	180 ± 15		24
pH (Standard Units)		6.9	7.4	7.2	6.3	to 9.4	7.6 ± 0.18		24
Alkalinity (CaCO3) (field) (mg/L)		75	80	25	25	to 175	64 ± 7.9		24
Arsenic (mg/L)		0.005 U	0.005	0.005 U	0.001 U	to 0.012	0.0031 ± 0.000		24
Cadmium (mg/L)		0.00006	0.00006	<b>0.00016</b>	0.00002 U	to 0.0008	0.00021 ± 6E-05		21
Calcium (mg/L)		13.9	20.6	↓10.4	12.1	to 40	22 ± 1.6		24
Copper (mg/L)		0.0003 U	0.0003 U	<b>0.0082</b>	0.0001 U	to 0.016	0.0032 ± 0.001		21
Iron (mg/L)		↑ <b>2.94</b>	0.17	↑ <b>1.93</b>	0.05	to 1.4	0.38 ± 0.08		24
Magnesium (mg/L)		2.3	4.2	1.4	1.4	to 7.6	3.4 ± 0.34		24
Manganese (mg/L)		0.13	0.11	0.21	0.02	to 0.88	0.09 ± 0.04		24
Nickel (mg/L)		↑0.005	↑0.005 U	↑0.005 U	0.002 U	to 0.003	0.0022 ± 9E-05		21
Potassium (mg/L)		1.9	2.4	1.3	0.4	to 25	3.8 ± 1.2		24
Sodium (mg/L)		2.1	3.6	↓1.2	1.9	to 25	5.8 ± 1		24
Ammonia (N) (mg/L)		0.5 U	0.5 U	0.5 U	0.1 U	to 0.5 U	0.12 ± 0.02		24
Nitrate (N) (mg/L)		↑0.3 U	↑0.3 U	↑0.3 U	0.1 U	to 0.1	0.1 ± 3E-10		24
Phosphate Phosphorus (mg/L)		0.1	0.14	0.08	0.01 U	to 0.15	0.04 ± 0.007		24
Total Dissolved Solids (mg/L)		90	97	90	51	to 262	120 ± 9.9		24
Total Suspended Solids (mg/L)		65	6	46	4 U	to 115	11 ± 4.6		24
Sulfate (mg/L)		11.2	8.1	5.5	0.2	to 30	9.9 ± 1.3		24
Bicarbonate (CaCO3) (mg/L)		28	63	23	16	to 170	61 ± 7.3		24
Organic Carbon (mg/L)		2.4	3.3	2.2	2.2	to 13.3	5.1 ± 0.65		24
Chemical Oxygen Demand (mg/L)		10 U	16	10 U	3	to 45	14 ± 2.2		24
Chloride (mg/L)		4.1	4.1	3	1.5	to 12.5	6.1 ± 0.65		24
Turbidity (field) (NTU)		6.8	7.5	2.1	0	to 28.1	5.2 ± 1.5		24
Tannin & Lignins (Tannic Acid) (mg/L)		1.2	0.4 U	1 U	0.2 U	to 2	0.45 ± 0.08		24

**underlined/bold** - values exceed a regulatory standard listed below.

### Applicable Limits:

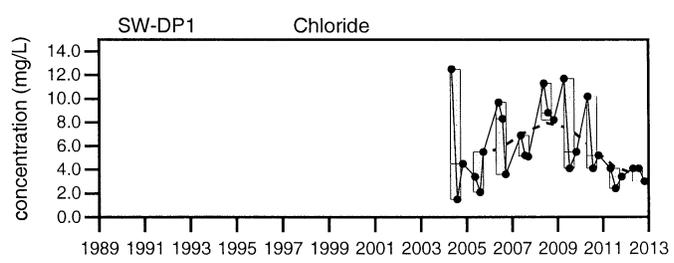
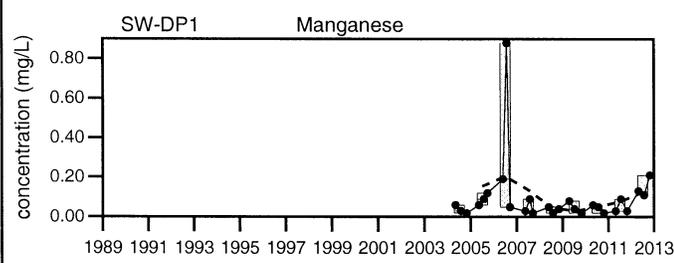
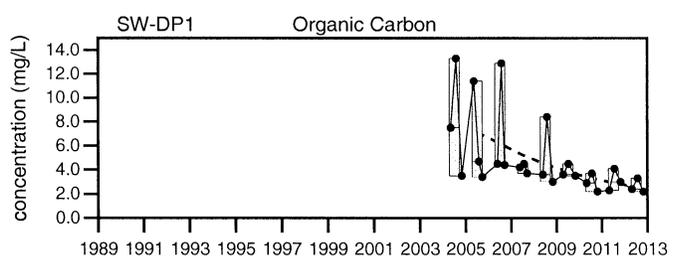
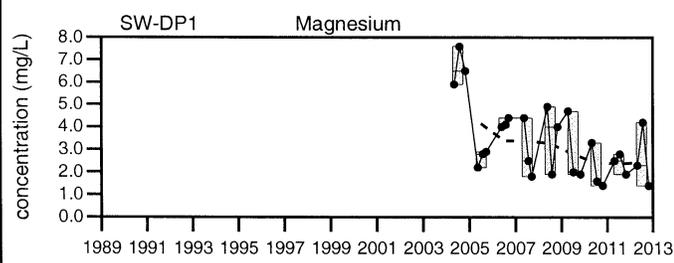
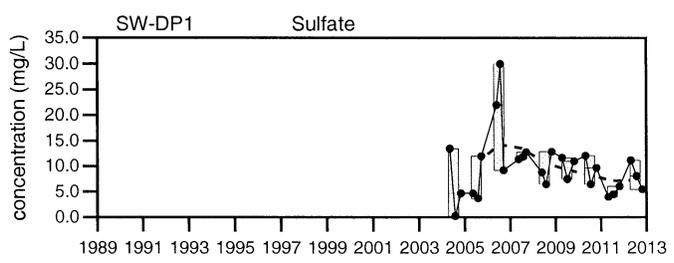
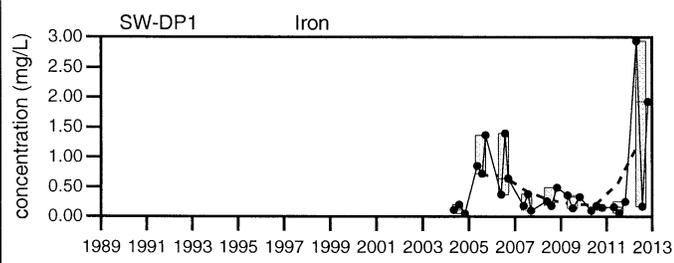
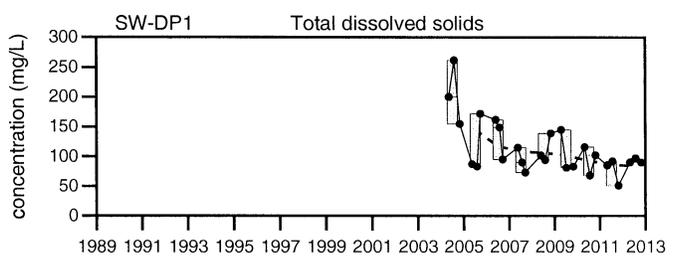
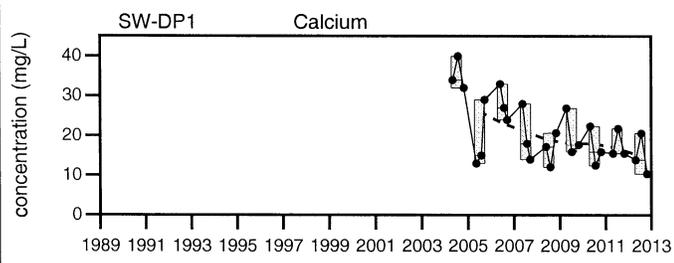
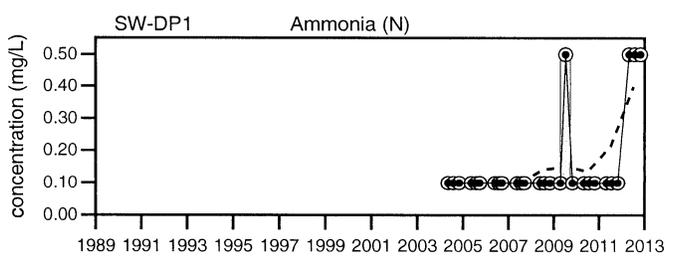
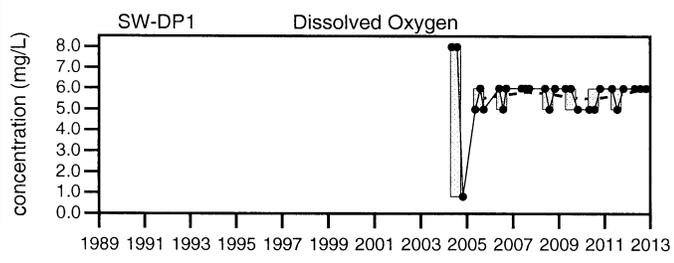
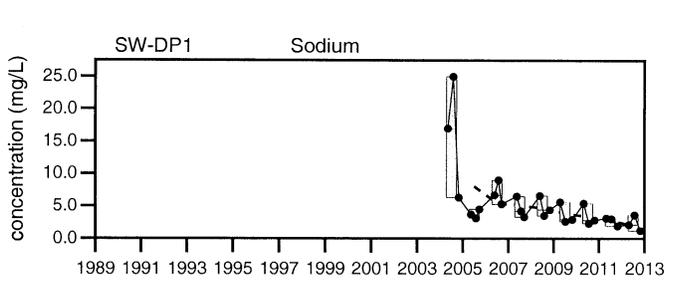
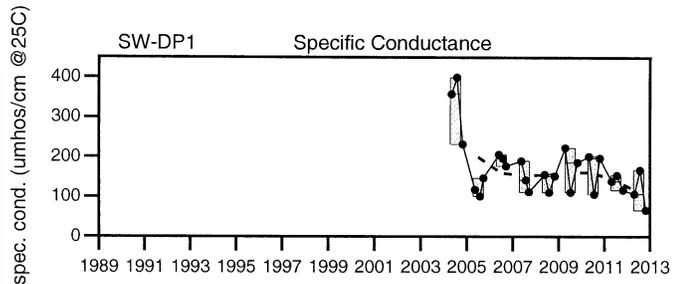
Chloride MFCCC=230 mg/L, Arsenic MFCCC=0.15 mg/L, Cadmium MFCCC=0.00008 mg/L, Copper MFCCC=0.00236 mg/L, Iron MFCCC=1 mg/L, Nickel MFCCC=0.0134 mg/L, Ammonia (N) MFCCC=3 mg/L

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed. April 2012 and July 2012 Cadmium results are non-detect above the laboratory reporting limit (0.00006U mg/l).



**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
SW-DP1

Sevee & Maher Engineers, Inc.

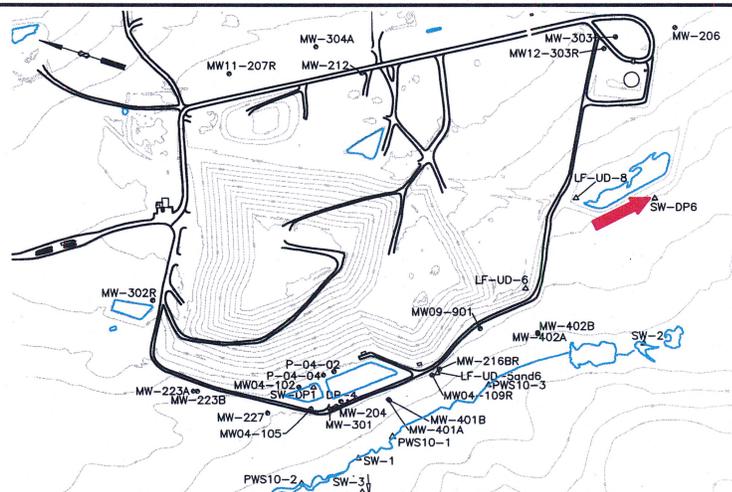
# SW-DP6

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

SW-DP6 is located in Detention Pond #6, which is situated to the south of the landfill and west of the leachate storage tank.



Sampled: **3 Times Annually**

Sampled Since: **10/27/2009**

Sampling Method: **Grab**

## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance (µmhos/cm @25°C)		172	↓97	↓65	148 to 427		270 ± 34		7
pH (Standard Units)		6.7	7.2	7.5	6.3 to 7.5		6.9 ± 0.21		7
Alkalinity (CaCO3) (field) (mg/L)	↑100	40	15		15 to 90		58 ± 12		6
Arsenic (mg/L)		0.005 U	0.006	0.005 U	0.002 U to 0.011		0.005 ± 0.001		7
Cadmium (mg/L)	↑0.00006	↑0.00006	↑0.00006		0.00002 U to 0.00002		0.00002 ± 1E-13		7
Calcium (mg/L)		14.1	↓11	↓6.6	11.3 to 63.3		31 ± 6.3		7
Copper (mg/L)		0.0003 U	0.0003 U	↑0.006	0.0001 U to 0.005		0.0013 ± 0.000		7
Iron (mg/L)	↓0.1	<b>1.32</b>	<b>2.63</b>		0.12 to 3.05		0.94 ± 0.4		7
Magnesium (mg/L)		1.9	2.5	1.9	1.9 to 7.3		3.6 ± 0.69		7
Manganese (mg/L)	↓0.05 U	0.79	0.16		0.06 to 0.96		0.24 ± 0.13		7
Nickel (mg/L)	↑0.005 U	↑0.005 U	↑0.005		0.002 U to 0.003		0.0023 ± 0.000		7
Potassium (mg/L)		1.6	↑3.4	1.9	1.5 to 3.2		2.3 ± 0.22		7
Sodium (mg/L)		3.8	↓2.2	↓1.4	2.5 to 7.5		5.5 ± 0.7		7
Ammonia (N) (mg/L)	↑0.5 U	↑0.5 U	↑0.5 U		0.1 U to 0.1 U		0.1 ± 6E-10		7
Nitrate (N) (mg/L)	↑0.3 U	↑0.3 U	↑0.3 U		0.1 U to 0.1		0.11 ± 0.01		7
Phosphate Phosphorus (mg/L)		0.04 U	↑0.14	0.07	0.03 to 0.12		0.064 ± 0.01		7
Total Dissolved Solids (mg/L)	↓91	↓81	↓89		94 to 323		180 ± 28		7
Total Suspended Solids (mg/L)		5	16	11	4 U to 54		16 ± 7.4		7
Sulfate (mg/L)		21.3	5.5	↓3.9	5.5 to 155		39 ± 20		7
Bicarbonate (CaCO3) (mg/L)	↓16.8	30	↓22		23 to 75		52 ± 8		7
Organic Carbon (mg/L)		4.4	8.7	4.6	3.1 to 11.9		6.7 ± 1.4		7
Chemical Oxygen Demand (mg/L)		13	↑37	14	8 to 36		19 ± 3.8		7
Chloride (mg/L)		10.3	↓1.1	↓3.5	5.4 to 22.3		15 ± 2.5		7
Turbidity (field) (NTU)		2.5	↑12	5.1	0 to 7.9		3.7 ± 1.1		7
Tannin & Lignins (Tannic Acid) (mg/L)		0.42	↑2.5 U	0.91	0.31 to 0.93		0.57 ± 0.09		7

**underlined/bold** - values exceed a regulatory standard listed below.

### Applicable Limits:

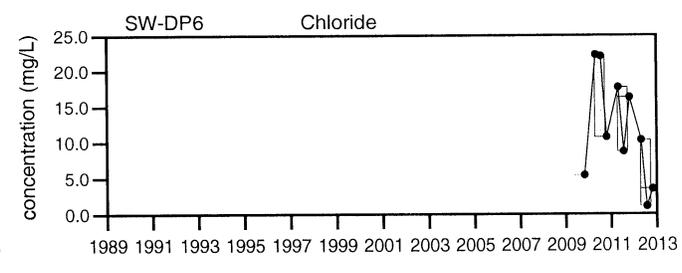
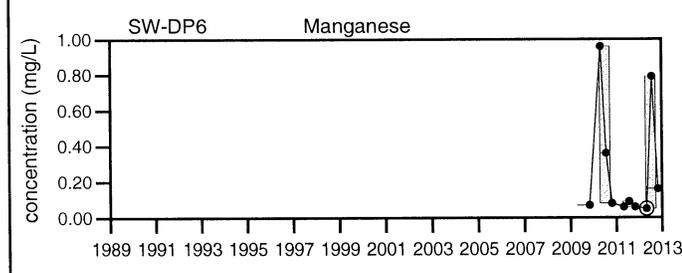
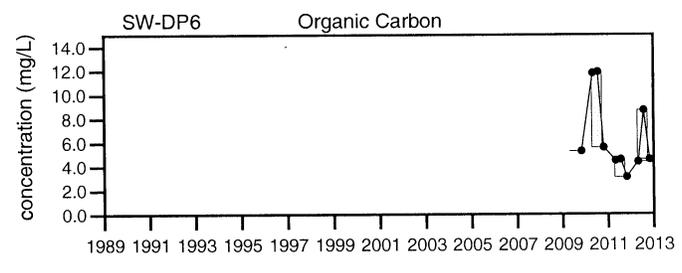
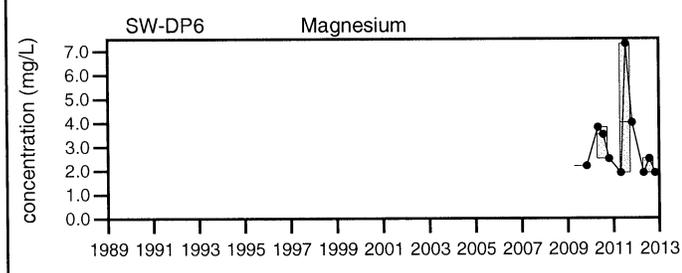
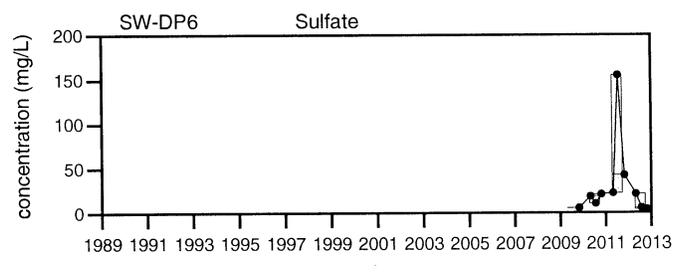
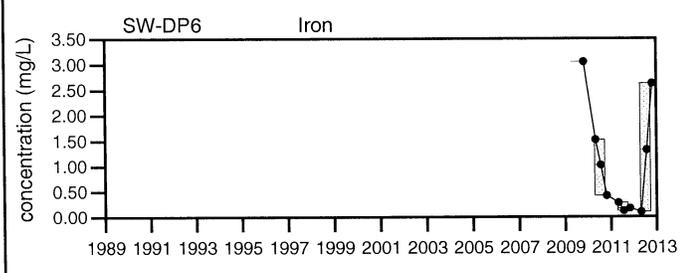
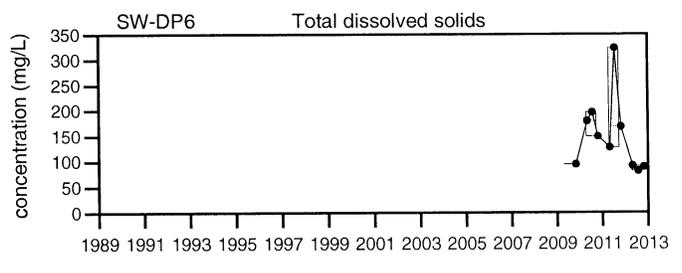
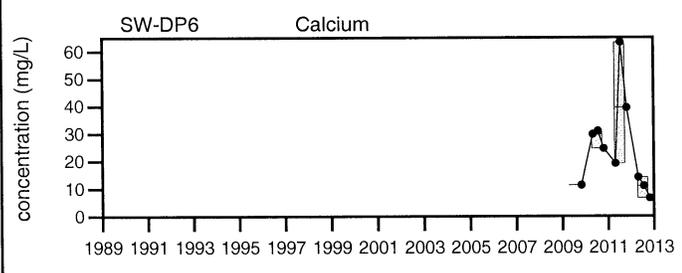
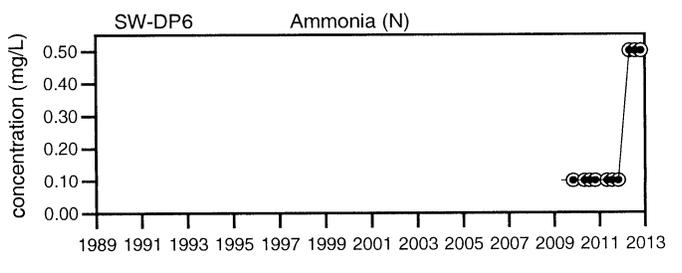
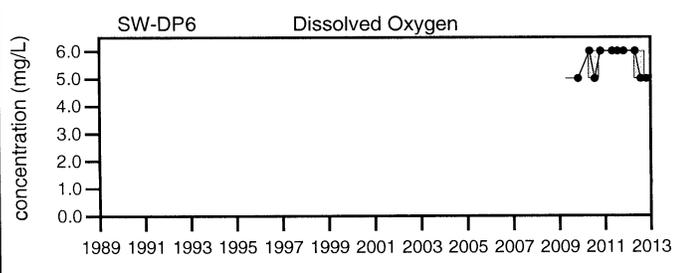
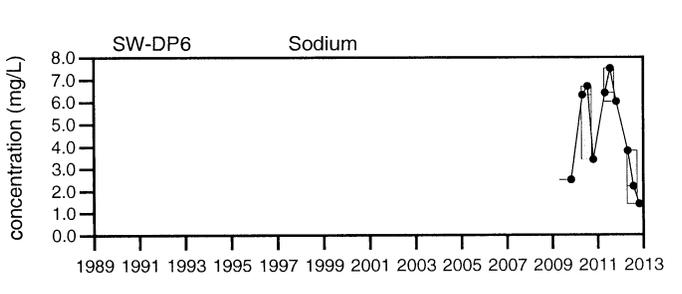
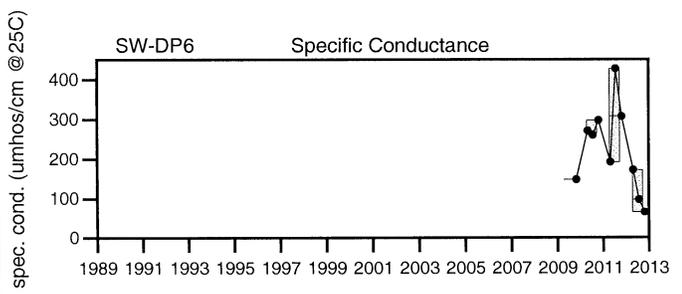
Chloride MFCCC=230 mg/L, Arsenic MFCCC=0.15 mg/L, Cadmium MFCCC=0.00008 mg/L, Copper MFCCC=0.00236 mg/L, Iron MFCCC=1 mg/L, Nickel MFCCC=0.0134 mg/L, Ammonia (N) MFCCC=3 mg/L

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed. April 2012, July 2012 and October 2012 Cadmium results are non-detect above the laboratory reporting limit (0.00006U mg/l).



**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- Sample Event
- BDL

Juniper Ridge Landfill  
SW-DP6

Sevee & Maher Engineers, Inc.

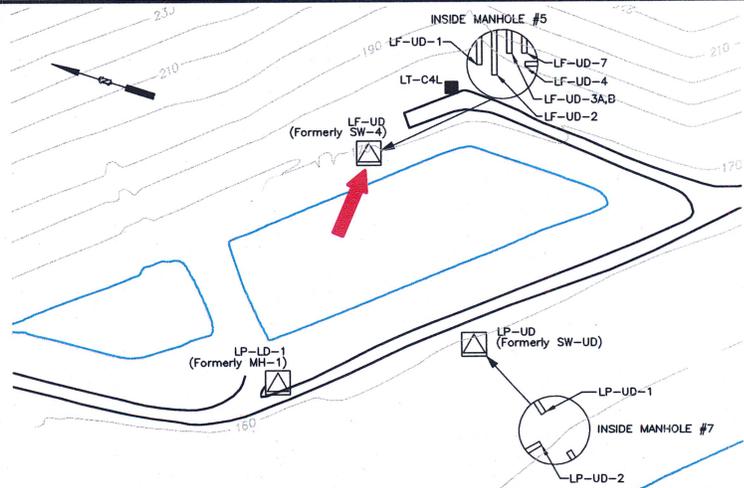
# LF-COMP

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

Manhole #5 composite sample



Sampled:

Sampled Since: **See comments below**

Sampling Method: **Grab**

## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance (µmhos/cm @25°C)	381	400	↑ 421	307	223	to 405	350 ± 22		7
pH (Standard Units)	↑ 7.5	7.2	7.3	↑ 7.7	6.8	to 7.4	7 ± 0.08		7
Alkalinity (CaCO3) (field) (mg/L)	↑ 145	85	↑ 150	↑ 135	80	to 125	100 ± 6.8		7
Arsenic (mg/L)		↓ 0.008			0.014	to 0.014	0.014 ± 0		1
Cadmium (mg/L)		↑ 0.0006 U			0.0002 U	to 0.0002 U	0.0002 ± 0		1
Calcium (mg/L)		↓ 41.4			44.3	to 44.3	44 ± 0		1
Copper (mg/L)		↑ 0.006			0.001 U	to 0.001 U	0.001 ± 0		1
Iron (mg/L)		↑ 0.1			0.02 U	to 0.02 U	0.02 ± 0		1
Magnesium (mg/L)		↓ 9.2			10	to 10	10 ± 0		1
Manganese (mg/L)		↑ 0.05 U			0.02 U	to 0.02 U	0.02 ± 0		1
Nickel (mg/L)		↑ 0.005 U			0.002 U	to 0.002 U	0.002 ± 0		1
Potassium (mg/L)		↓ 3.4			4.3	to 4.3	4.3 ± 0		1
Sodium (mg/L)		↓ 6.9			9	to 9	9 ± 0		1
Ammonia (N) (mg/L)		↑ 0.5 U			0.1 U	to 0.1 U	0.1 ± 0		1
Nitrate (N) (mg/L)		↑ 0.3 U			0.1	to 0.1	0.1 ± 0		1
Phosphate Phosphorus (mg/L)		↑ 0.04 U			0.02	to 0.02	0.02 ± 0		1
Total Dissolved Solids (mg/L)		↓ 195			233	to 233	230 ± 0		1
Total Suspended Solids (mg/L)		4 U			4 U	to 4 U	4 ± 0		1
Sulfate (mg/L)		↓ 6			7.2	to 7.2	7.2 ± 0		1
Bicarbonate (CaCO3) (mg/L)		↓ 143			175	to 175	180 ± 0		1
Organic Carbon (mg/L)		↑ 2 U			0.7 U	to 0.7 U	0.7 ± 0		1
Chemical Oxygen Demand (mg/L)		↑ 10 U			3 U	to 3 U	3 ± 0		1
Chloride (mg/L)		↑ 7			5.4	to 5.4	5.4 ± 0		1
Turbidity (field) (NTU)	1.05	4.4	0.33	5.27	0	to 129.3	22 ± 18		7
Tannin & Lignins (Tannic Acid) (mg/L)		0.2 U			0.2 U	to 0.2 U	0.2 ± 0		1

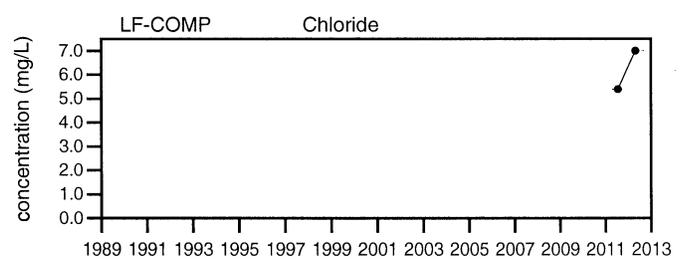
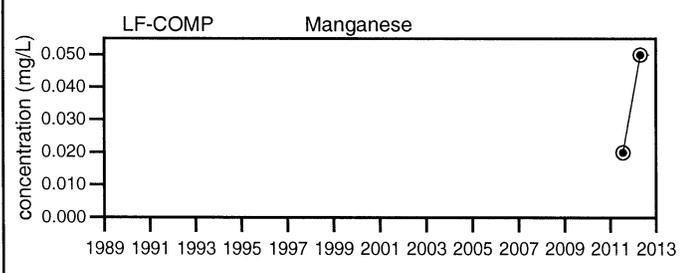
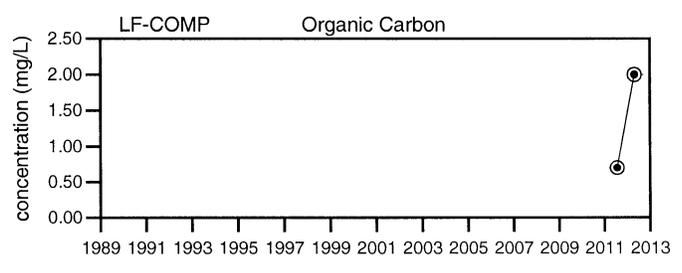
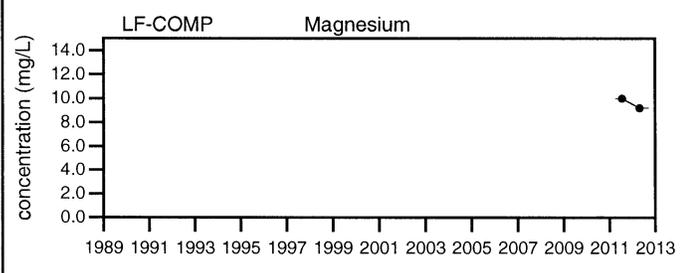
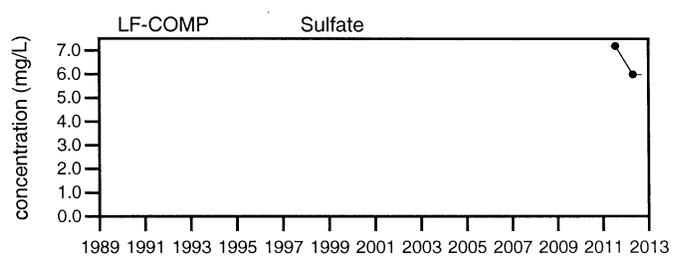
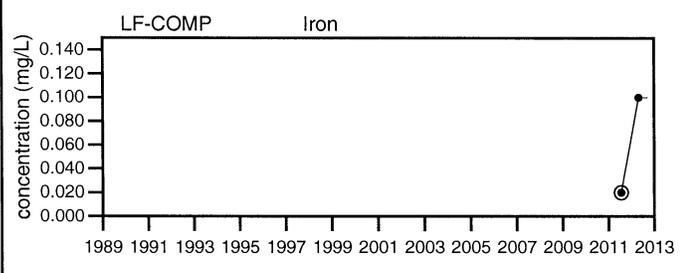
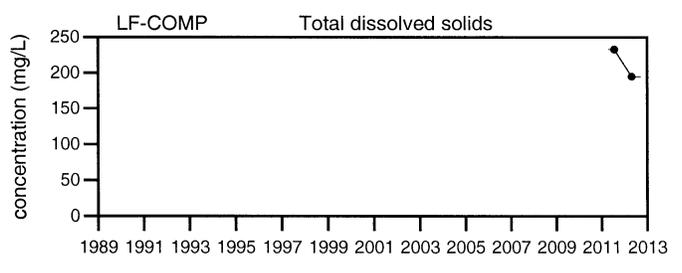
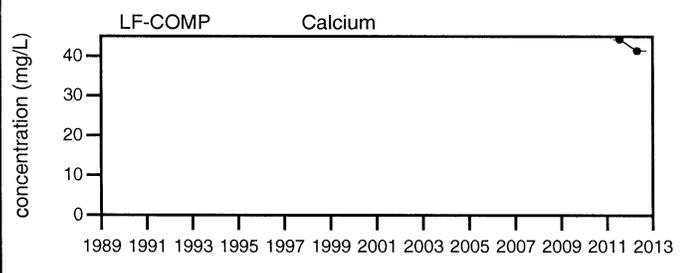
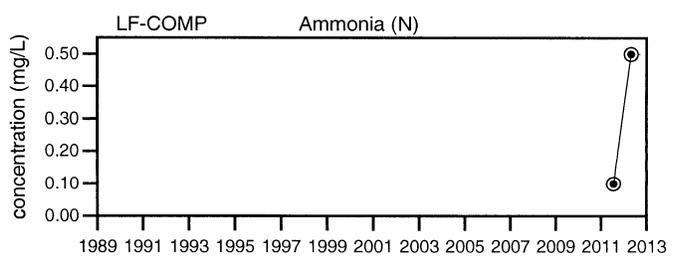
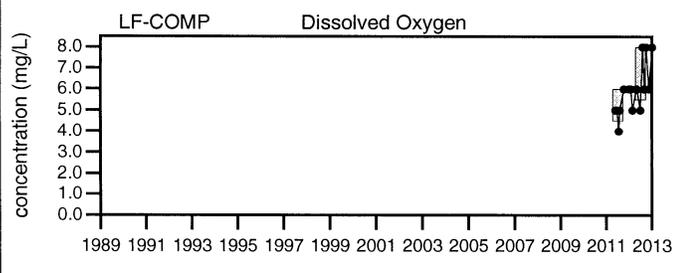
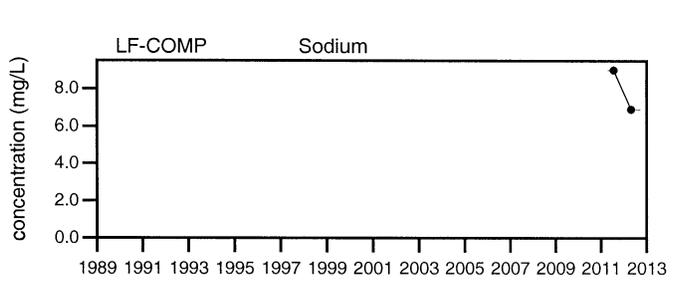
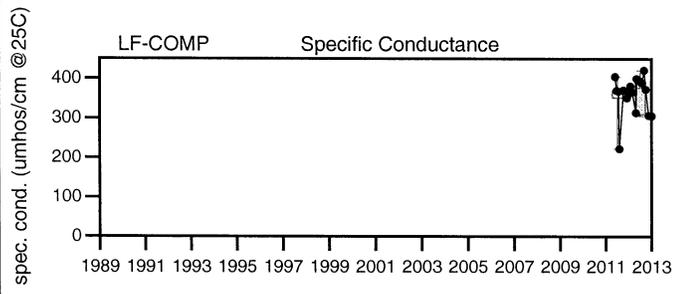
underlined/bold - values exceed a regulatory standard listed below.

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

This location is monitored monthly for field parameters only when the water level is higher than the LF sample location pipes in Manhole #5.

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed H2= water level higher than pipes. See LF-COMP for readings. F6= No flow. Sample not taken F-12= Pipe under water, no sample taken. G7= Field measurements elevated due to recent cleaning of underdrain pipe. H6= Pipe under water, could not measure flow.



**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- Sample Event
- BDL

Juniper Ridge Landfill  
LF-COMP

Sevee & Maher Engineers, Inc.

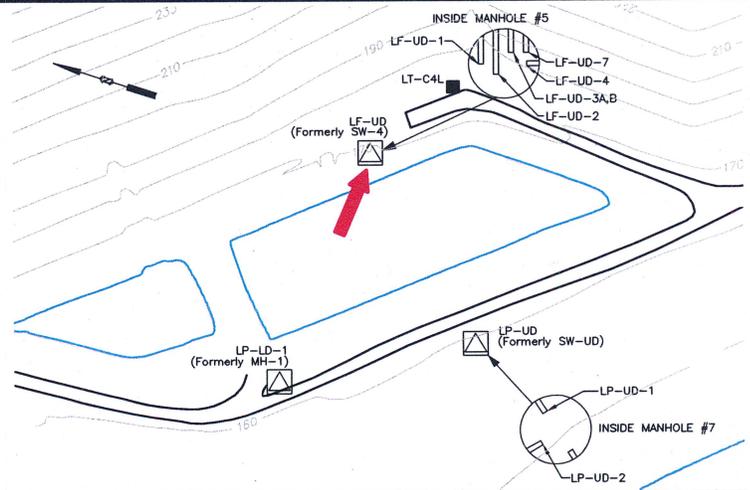
# LF-UD-1

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

LF-UD-1 monitors the landfill underdrain from Cell #1 at Manhole #5.



Sampled: **Monthly & 3 Times Annually**

Sampled Since: **07/28/04**

Sampling Method: **Grab**

## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance (µmhos/cm @25°C)	382	364	384	290	102 to 611		300 ± 10		65
pH (Standard Units)	7.5	7	8.1	8	6.3 to 8.3		7.2 ± 0.06		65
Alkalinity (CaCO3) (field) (mg/L)	150	150	200	135	75 to 485		130 ± 7.5		65
Arsenic (mg/L)		H2	0.007	F6	0.001 to 0.014		0.0037 ± 0.001		18
Cadmium (mg/L)		H2	0.0006 U	F6	0.0002 U to 0.001		0.00035 ± 7E-05		16
Calcium (mg/L)		H2	44.3	F6	25 to 53.6		37 ± 1.9		18
Copper (mg/L)		H2	0.004	F6	0.001 U to 0.01		0.0026 ± 0.000		16
Iron (mg/L)		H2	0.13	F6	0.02 U to 0.3		0.042 ± 0.02		18
Magnesium (mg/L)		H2	↑ 12.2	F6	7.4 to 11.4		9.4 ± 0.29		18
Manganese (mg/L)		H2	↑ 0.05 U	F6	0.02 U to 0.02		0.02 ± 7E-11		18
Nickel (mg/L)		H2	0.005 U	F6	0.002 U to 0.01		0.0026 ± 0.000		16
Potassium (mg/L)		H2	3.5	F6	1.8 to 4.1		2.6 ± 0.16		18
Sodium (mg/L)		H2	8.7	F6	5.8 to 9.4		7.7 ± 0.25		18
Ammonia (N) (mg/L)		H2	↑ 0.5 U	F6	0.1 U to 0.1		0.1 ± 3E-10		18
Nitrate (N) (mg/L)		H2	0.3	F6	0.1 to 0.6		0.31 ± 0.03		18
Phosphate Phosphorus (mg/L)		H2	↑ 0.05	F6	0.01 U to 0.03		0.016 ± 0.002		18
Total Dissolved Solids (mg/L)		H2	208	F6	130 to 232		180 ± 6.6		18
Total Suspended Solids (mg/L)		H2	10	F6	4 U to 40		6.2 ± 2		18
Sulfate (mg/L)		H2	↓ 4.1	F6	4.4 to 11		7.3 ± 0.39		18
Bicarbonate (CaCO3) (mg/L)		H2	168	F6	110 to 175		140 ± 5.7		18
Organic Carbon (mg/L)		H2	2 U	F6	0.5 U to 6.4		1.9 ± 0.32		18
Chemical Oxygen Demand (mg/L)		H2	10 U	F6	3 U to 14		4.3 ± 0.69		18
Chloride (mg/L)		H2	3	F6	1.9 to 7.7		3.7 ± 0.31		18
Turbidity (field) (NTU)	2.23	0.79	1.8	0.87	0 to 4.9		1.3 ± 0.16		65
Tannin & Lignins (Tannic Acid) (mg/L)		H2	0.2 U	F6	0.2 U to 0.21		0.25 ± 0.04		18

underlined/bold - values exceed a regulatory standard listed below.

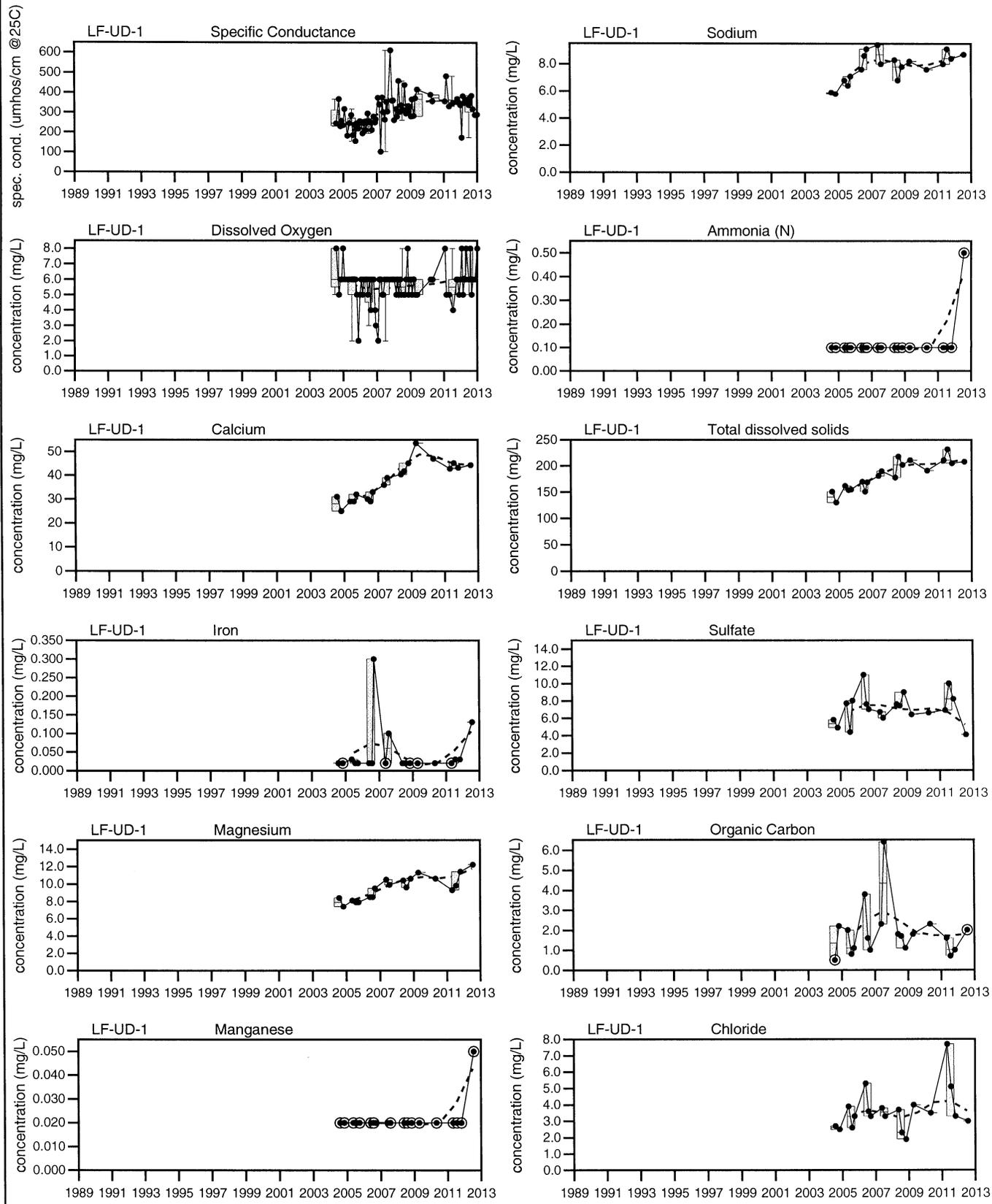
↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

This location is monitored triannually for field and lab parameters and monthly for field parameters only.

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed H2= water level higher than pipes. See LF-COMP for readings. F6= No flow. Sample not taken F-12= Pipe under water, no sample taken. G7= Field measurements elevated due to recent cleaning of underdrain pipe. H6= Pipe under water, could not measure flow.



**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- - Sample Event
- ⊙ - BDL

**Juniper Ridge Landfill  
LF-UD-1**

Sevee & Maher Engineers, Inc.

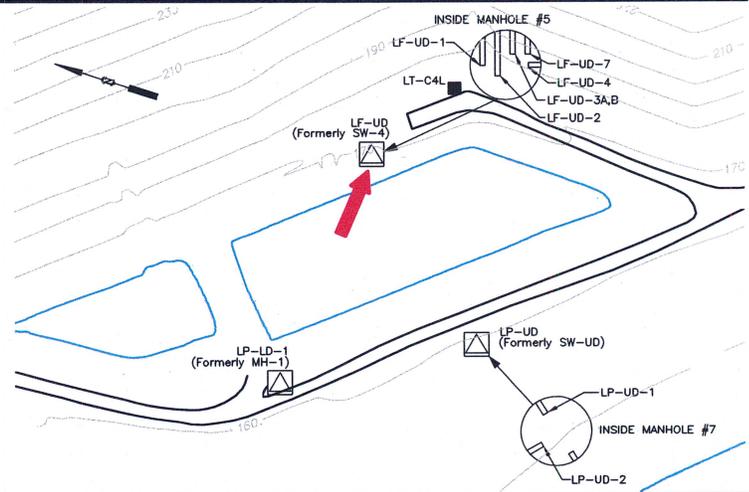
# LF-UD-2

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

LF-UD-2 monitors the landfill underdrain from Cell #2 at Manhole #5.



Sampled: **Monthly & 3 Times Annually**

Sampled Since: **07/28/04**

Sampling Method: **Grab**

## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance (µmhos/cm @25°C)	310	318	368	307	134	to 709	280 ± 9.3		78
pH (Standard Units)	8	7	8.1	8	6	to 8.3	7.5 ± 0.06		78
Alkalinity (CaCO3) (field) (mg/L)	130	130	225	115	35	to 350	120 ± 5.1		78
Arsenic (mg/L)		H2	0.005 U	0.01	0.001 U	to 0.014	0.0044 ± 0.000		21
Cadmium (mg/L)		H2	↑ 0.0006 U	↑ 0.0006 U	0.0002 U	to 0.0005	0.00028 ± 4E-05		19
Calcium (mg/L)		H2	39	35.6	20	to 64.3	34 ± 2.1		21
Copper (mg/L)		H2	0.003 U	0.003 U	0.001 U	to 0.003	0.0022 ± 0.000		19
Iron (mg/L)		H2	0.05 U	0.05 U	0.02 U	to 0.18	0.038 ± 0.009		21
Magnesium (mg/L)		H2	10.4	9.9	6.1	to 12.3	8.4 ± 0.33		21
Manganese (mg/L)		H2	↑ 0.05 U	↑ 0.05 U	0.02 U	to 0.02	0.02 ± 8E-11		21
Nickel (mg/L)		H2	↑ 0.005 U	↑ 0.005 U	0.002 U	to 0.002	0.0021 ± 5E-05		19
Potassium (mg/L)		H2	3.1	2.7	1.9	to 5	2.7 ± 0.16		21
Sodium (mg/L)		H2	6.7	6.3	5.2	to 18.1	6.6 ± 0.61		21
Ammonia (N) (mg/L)		H2	↑ 0.5 U	↑ 0.5 U	0.1 U	to 0.1 U	0.1 ± 3E-10		21
Nitrate (N) (mg/L)		H2	0.3 U	0.3 U	0.1 U	to 0.4	0.25 ± 0.02		21
Phosphate Phosphorus (mg/L)		H2	0.04 U	0.04 U	0.01 U	to 0.66	0.049 ± 0.03		21
Total Dissolved Solids (mg/L)		H2	188	211	132	to 290	170 ± 8.1		21
Total Suspended Solids (mg/L)		H2	4 U	4 U	4 U	to 39	7.2 ± 2.2		21
Sulfate (mg/L)		H2	↓ 2 U	5.4	2.2	to 17.5	4.7 ± 0.87		21
Bicarbonate (CaCO3) (mg/L)		H2	135	133	92	to 213	130 ± 5.9		21
Organic Carbon (mg/L)		H2	2 U	2 U	0.6	to 12	1.7 ± 0.53		21
Chemical Oxygen Demand (mg/L)		H2	↑ 10 U	↑ 10 U	3 U	to 7	3.6 ± 0.26		21
Chloride (mg/L)		H2	↑ 9.5	↑ 12.6	1.7	to 7.1	3.6 ± 0.38		21
Turbidity (field) (NTU)	0.82	0.21	1.5	1.2	0	to 8.5	1.2 ± 0.19		78
Tannin & Lignins (Tannic Acid) (mg/L)		H2	0.2 U	0.2 U	0.2 U	to 0.3	0.2 ± 0.005		21

underlined/bold - values exceed a regulatory standard listed below.

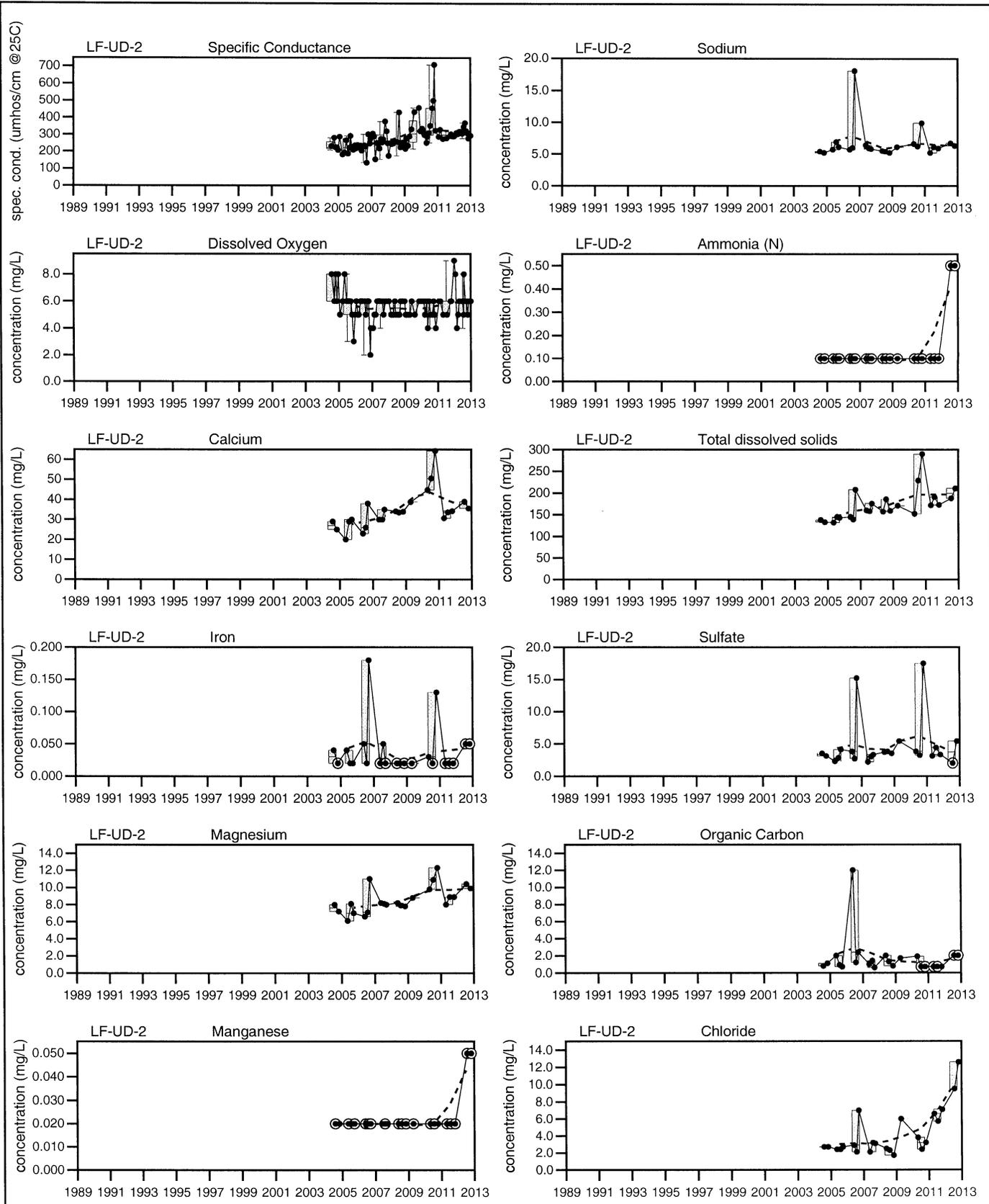
↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

This location is monitored triannually for field and lab parameters and monthly for field parameters only.

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed H2= water level higher than pipes. See LF-COMP for readings. F6= No flow. Sample not taken F-12= Pipe under water, no sample taken. G7= Field measurements elevated due to recent cleaning of underdrain pipe. H6= Pipe under water, could not measure flow.



spec. cond. (umhos/cm @25C)

concentration (mg/L)

**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- - Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
LF-UD-2

Sevee & Maher Engineers, Inc.

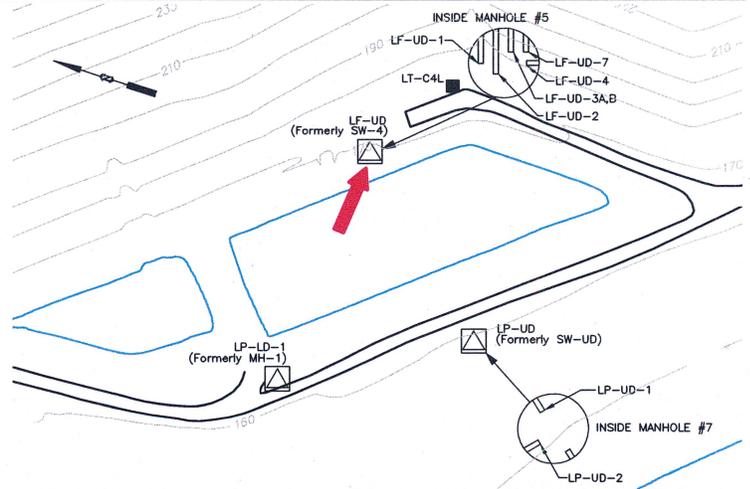
# LF-UD-3A,B

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

LF-UD-3A, B monitors the landfill underdrains from cell 3A and cell 3B at Manhole #5.



Sampled: **3 Times Annually**

Sampled Since: **July 2011**

Sampling Method: **Grab**

## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance (µmhos/cm @25°C)	H8	H8	H8	H8	126	to 565	370 ± 19		27
pH (Standard Units)	H8	H8	H8	H8	6.2	to 8.4	7.6 ± 0.12		27
Alkalinity (CaCO3) (field) (mg/L)	H8	H8	H8	H8	85	to 475	180 ± 17		27
Arsenic (mg/L)		H2	F6	F6	0.003 U	to 0.01	0.0048 ± 0.001		5
Cadmium (mg/L)		H2	F6	F6	0.0002 U	to 0.0004	0.00044 ± 0.000		5
Calcium (mg/L)		H2	F6	F6	46.4	to 69.9	56 ± 4.4		5
Copper (mg/L)		H2	F6	F6	0.001 U	to 0.002	0.0016 ± 0.000		5
Iron (mg/L)		H2	F6	F6	0.02 U	to 0.02 U	0.02 ± 1E-10		5
Magnesium (mg/L)		H2	F6	F6	8.2	to 12.5	10 ± 0.81		5
Manganese (mg/L)		H2	F6	F6	0.02 U	to 0.12	0.048 ± 0.02		5
Nickel (mg/L)		H2	F6	F6	0.002 U	to 0.003 U	0.0022 ± 0.000		5
Potassium (mg/L)		H2	F6	F6	1.8	to 3.3	2.4 ± 0.31		5
Sodium (mg/L)		H2	F6	F6	6	to 9.5	8 ± 0.63		5
Ammonia (N) (mg/L)		H2	F6	F6	0.1 U	to 0.1 U	0.1 ± 8E-10		5
Nitrate (N) (mg/L)		H2	F6	F6	0.1	to 1.3	0.6 ± 0.2		5
Phosphate Phosphorus (mg/L)		H2	F6	F6	0.01 U	to 0.01	0.01 ± 7E-11		5
Total Dissolved Solids (mg/L)		H2	F6	F6	163	to 263	230 ± 17		5
Total Suspended Solids (mg/L)		H2	F6	F6	4 U	to 4 U	4 ± 0		5
Sulfate (mg/L)		H2	F6	F6	8.3	to 16.3	13 ± 1.3		5
Bicarbonate (CaCO3) (mg/L)		H2	F6	F6	123	to 201	160 ± 15		5
Organic Carbon (mg/L)		H2	F6	F6	1.2	to 4.8	3.4 ± 0.66		5
Chemical Oxygen Demand (mg/L)		H2	F6	F6	3 U	to 10	5.6 ± 1.6		5
Chloride (mg/L)		H2	F6	F6	2.4	to 12.6	7.8 ± 1.7		5
Turbidity (field) (NTU)	H8	H8	H8	H8	0	to 5	0.9 ± 0.2		27
Tannin & Lignins (Tannic Acid) (mg/L)		H2	F6	F6	0.2 U	to 0.24	0.21 ± 0.008		5

**underlined/bold** - values exceed a regulatory standard listed below.

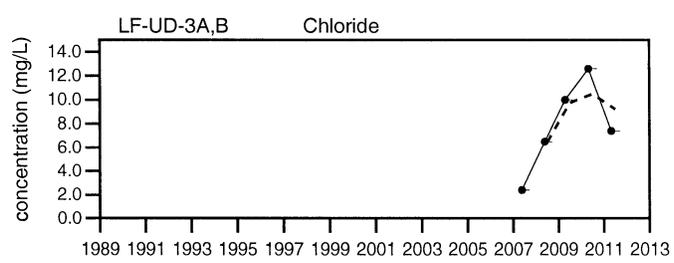
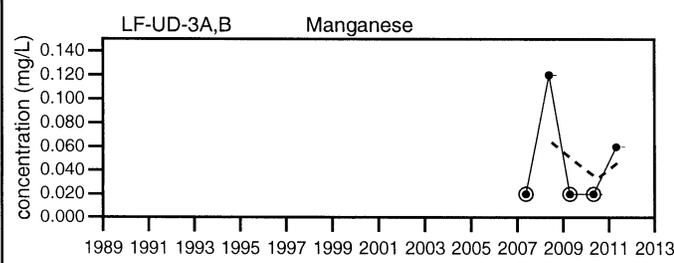
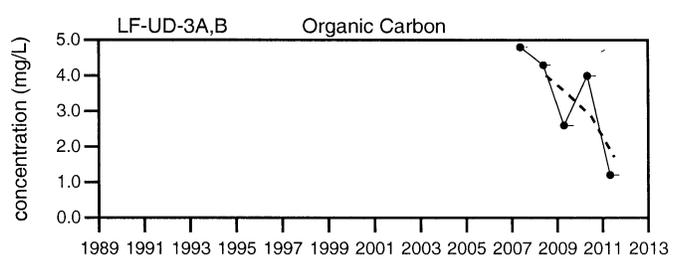
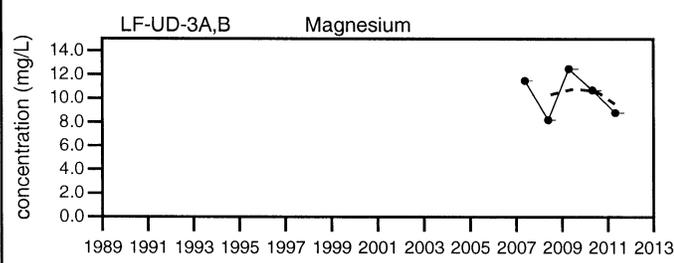
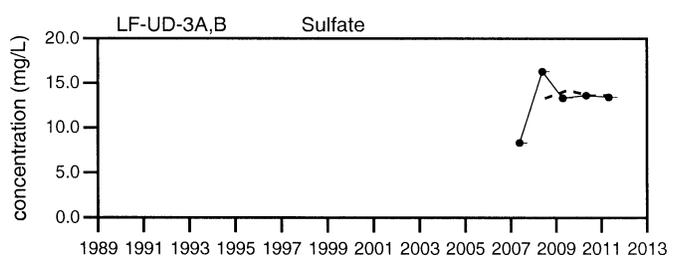
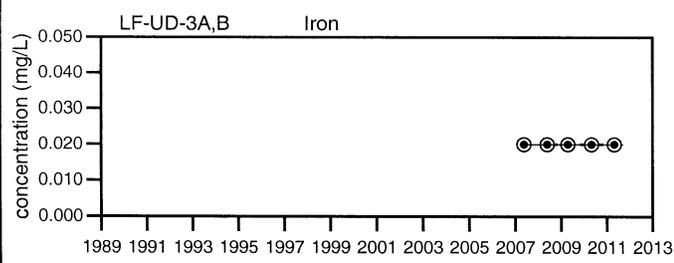
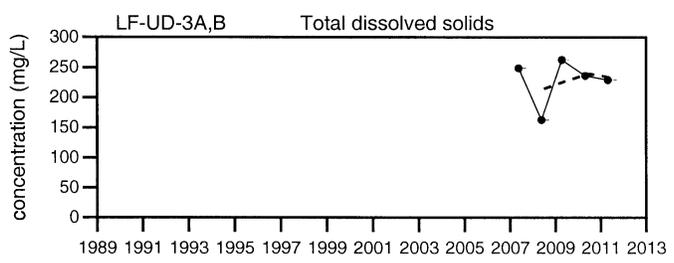
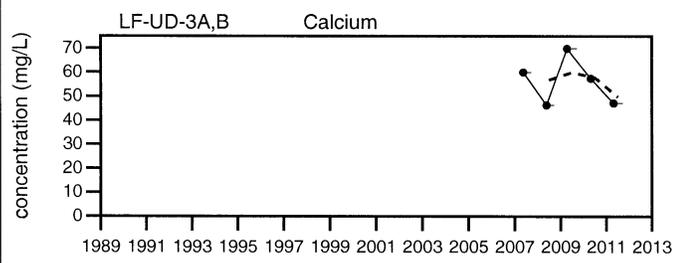
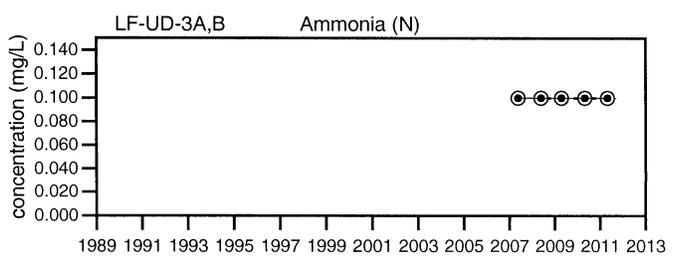
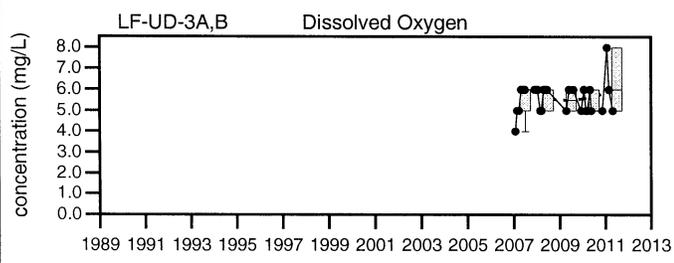
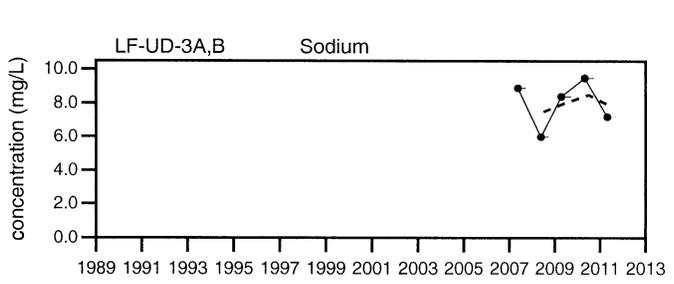
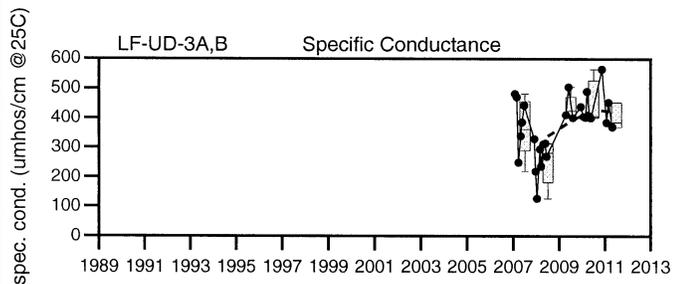
↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

This location is monitored triannually for field and lab parameters and monthly for field parameters only.

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed H2= water level higher than pipes. See LF-COMP for readings. F6= No flow. Sample not taken F-12= Pipe under water, no sample taken. G7= Field measurements elevated due to recent cleaning of underdrain pipe. H6= Pipe under water, could not measure flow.



**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- - Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
LF-UD-3A,B

Sevee & Maher Engineers, Inc.

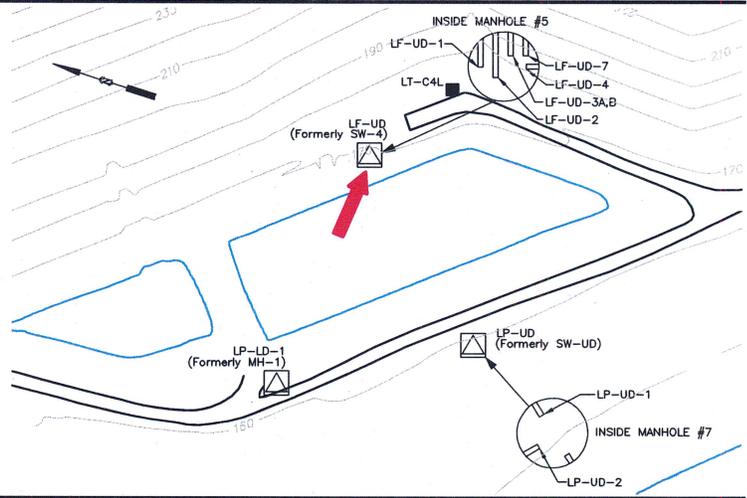
# LF-UD-4

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

LF-UD-4 monitors the landfill underdrain from Cell #4 at Manhole #5.



Sampled: **Monthly & 3 Times Annually**

Sampled Since: **03/11/2009**

Sampling Method: **Grab**

## Chemical Summary

### 2012

### Historical

Indicator Parameters	2012				Historical		Mean	SE	n
	Q1	Q2	Q3	Q4	Min	Max			
Specific Conductance (µmhos/cm @25°C)	444	437	485	416	366	to 562	440 ± 19		10
pH (Standard Units)	7.3	7.2	7.9	7.8	6.9	to 8.3	7.4 ± 0.13		10
Alkalinity (CaCO3) (field) (mg/L)	200	200	↑ 300	200	110	to 215	140 ± 10		10
Arsenic (mg/L)		H2	↑ 0.007	↑ 0.011	0.002	to 0.002	0.002 ± 0		1
Cadmium (mg/L)		H2	↑ 0.0006 U	↑ 0.0006 U	0.0002 U	to 0.0002 U	0.0002 ± 0		1
Calcium (mg/L)		H2	↑ 63.5	↓ 48.6	51.9	to 51.9	52 ± 0		1
Copper (mg/L)		H2	↑ 0.003 U	↑ 0.003 U	0.001 U	to 0.001 U	0.001 ± 0		1
Iron (mg/L)		H2	↑ 0.05 U	↑ 0.05 U	0.02 U	to 0.02 U	0.02 ± 0		1
Magnesium (mg/L)		H2	↑ 12.1	↓ 11.1	11.8	to 11.8	12 ± 0		1
Manganese (mg/L)		H2	↑ 0.05 U	↑ 0.05 U	0.02 U	to 0.02 U	0.02 ± 0		1
Nickel (mg/L)		H2	↑ 0.005 U	↑ 0.005 U	0.002 U	to 0.002 U	0.002 ± 0		1
Potassium (mg/L)		H2	↑ 5.8	↓ 3.8	4.9	to 4.9	4.9 ± 0		1
Sodium (mg/L)		H2	↑ 10.6	↓ 8.4	10.2	to 10.2	10 ± 0		1
Ammonia (N) (mg/L)		H2	↑ 0.5 U	↑ 0.5 U	0.1 U	to 0.1 U	0.1 ± 0		1
Nitrate (N) (mg/L)		H2	↓ 0.3 U	↓ 0.3 U	0.6	to 0.6	0.6 ± 0		1
Phosphate Phosphorus (mg/L)		H2	↑ 0.04 U	↑ 0.04 U	0.01 U	to 0.01 U	0.01 ± 0		1
Total Dissolved Solids (mg/L)		H2	↑ 263	↑ 252	206	to 206	210 ± 0		1
Total Suspended Solids (mg/L)		H2	↓ 4 U	↓ 4 U	5	to 5	5 ± 0		1
Sulfate (mg/L)		H2	↓ 2 U	↓ 7.9	14.8	to 14.8	15 ± 0		1
Bicarbonate (CaCO3) (mg/L)		H2	↑ 207	↑ 180	136	to 136	140 ± 0		1
Organic Carbon (mg/L)		H2	↓ 2 U	↓ 2 U	5.1	to 5.1	5.1 ± 0		1
Chemical Oxygen Demand (mg/L)		H2	↑ 10 U	↑ 10 U	6	to 6	6 ± 0		1
Chloride (mg/L)		H2	↓ 3.1	↓ 8.1	9	to 9	9 ± 0		1
Turbidity (field) (NTU)	0.29	0.32	1.2	1.6	0	to 9.1	1.5 ± 0.88		10
Tannin & Lignins (Tannic Acid) (mg/L)		H2	0.2 U	0.2 U	0.2 U	to 0.2 U	0.2 ± 0		1

underlined/bold - values exceed a regulatory standard listed below.

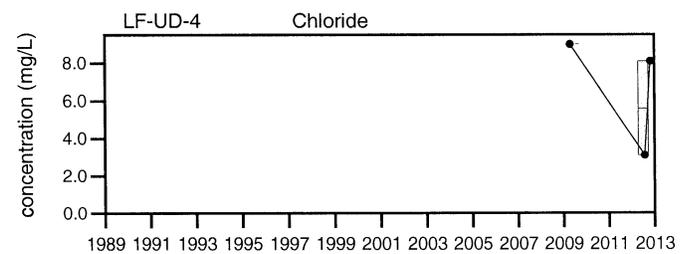
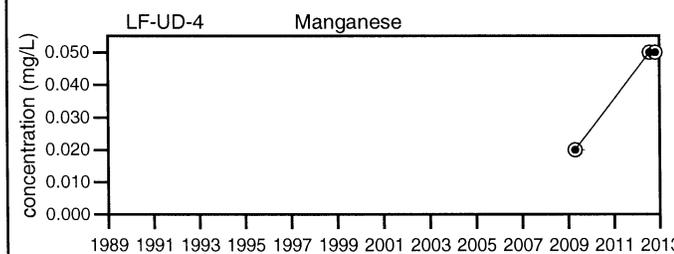
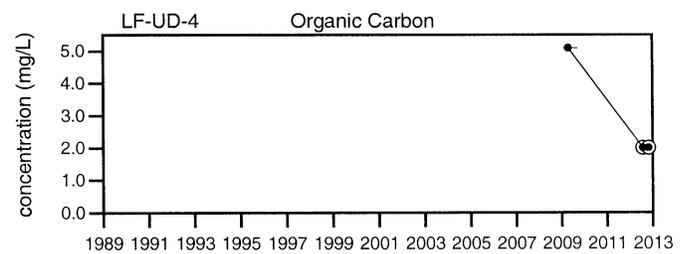
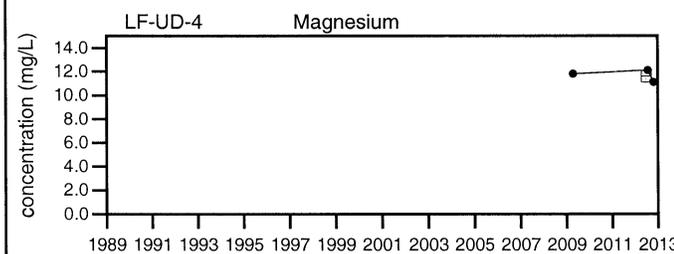
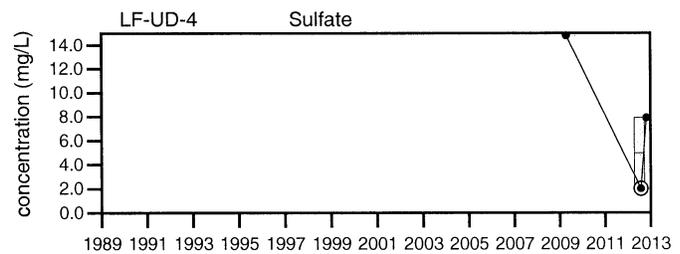
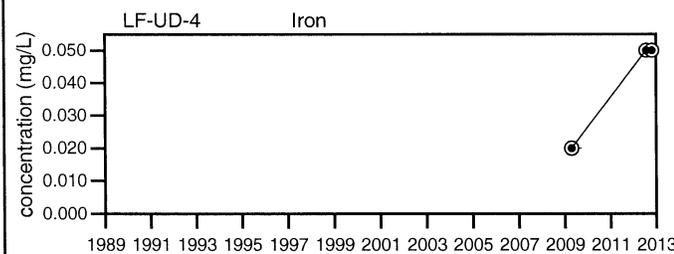
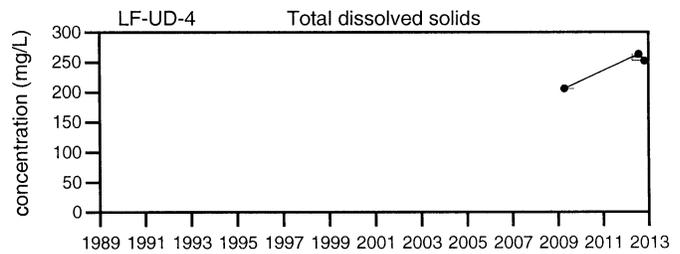
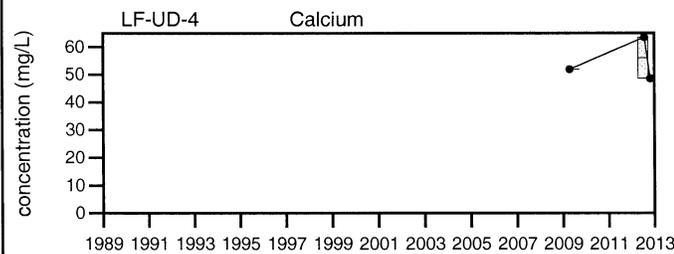
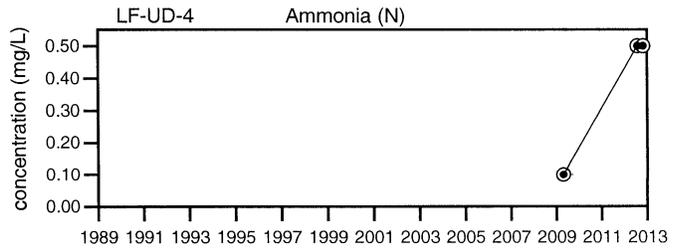
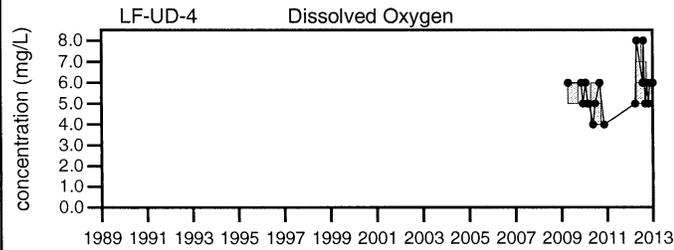
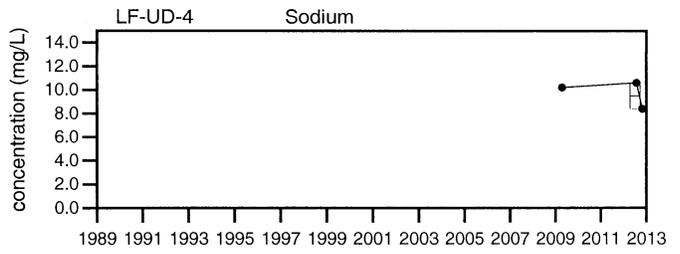
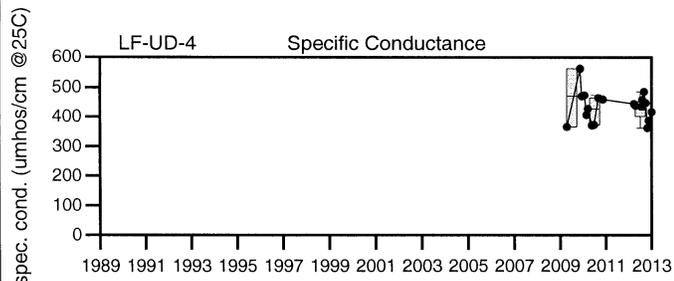
↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

This location is monitored triannually for field and lab parameters and monthly for field parameters only.

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed H2= water level higher than pipes. See LF-COMP for readings. F6= No flow. Sample not taken F-12= Pipe under water, no sample taken. G7= Field measurements elevated due to recent cleaning of underdrain pipe. H6= Pipe under water, could not measure flow.



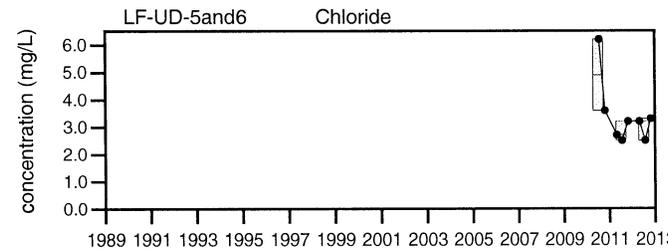
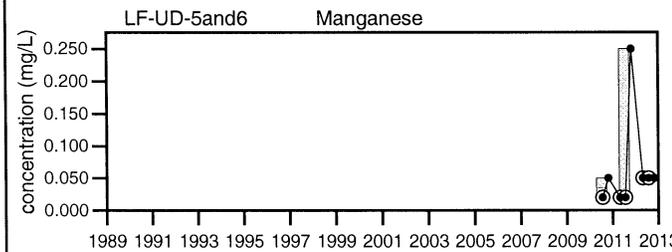
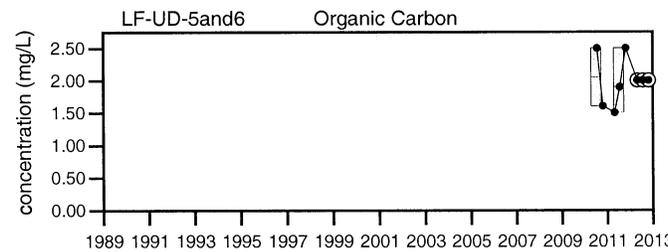
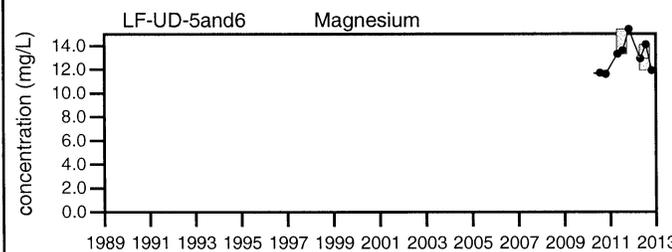
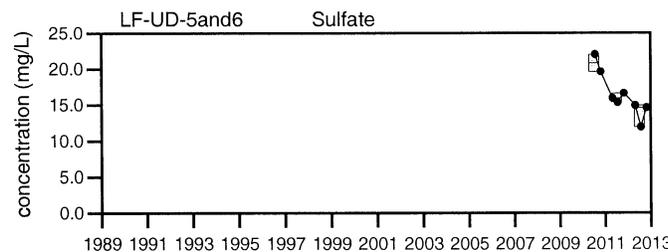
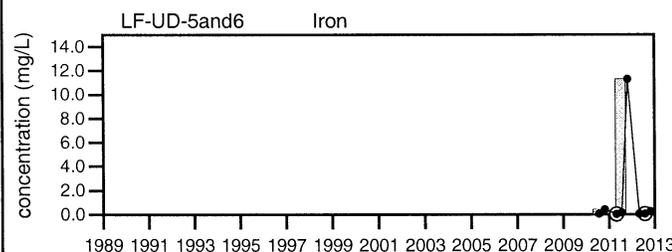
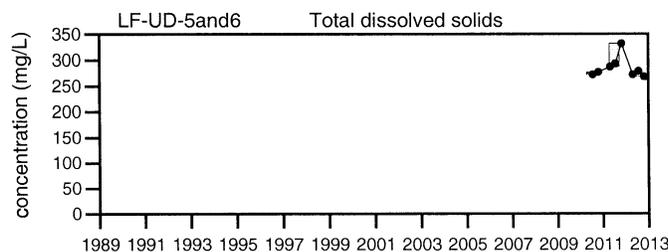
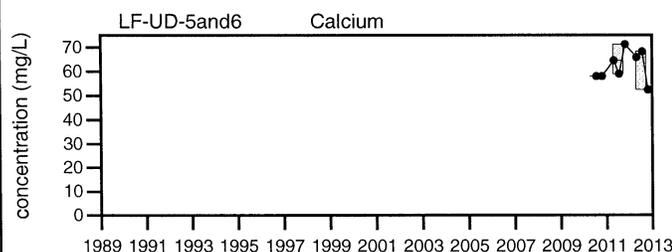
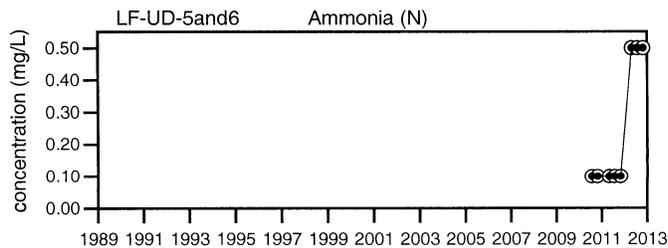
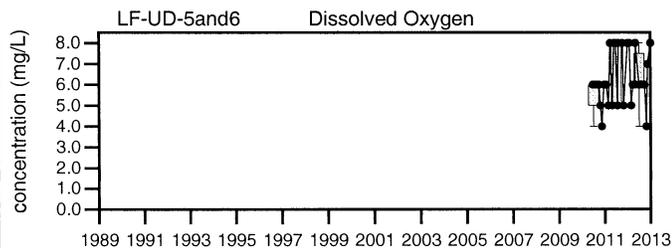
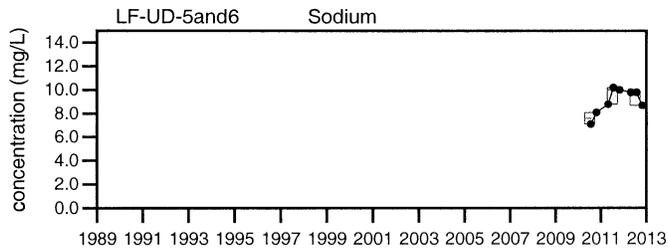
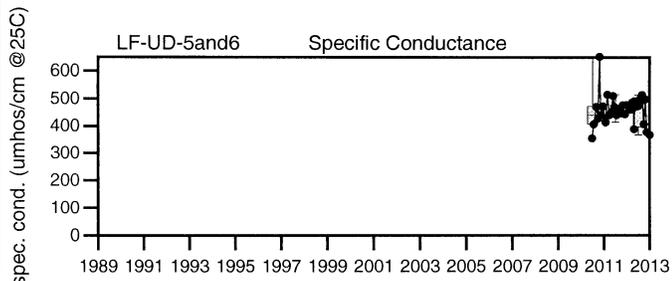
**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- Sample Event
- BDL

Juniper Ridge Landfill  
LF-UD-4

Sevee & Maher Engineers, Inc.





**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- Sample Event
- BDL

Juniper Ridge Landfill  
LF-UD-5and6

Sevee & Maher Engineers, Inc.

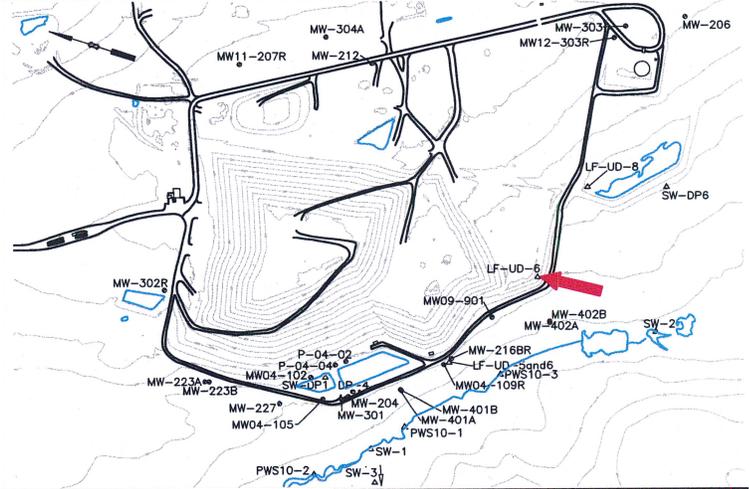
# LF-UD-6

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

LF-UD-6 monitors the landfill underdrain from Cell #6. This underdrain pipe is located along the south perimeter of the landfill.



Sampled: **Monthly and 3 Times Annually**

Sampled Since: **02/03/2011**

Sampling Method: **Grab**

## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance (µmhos/cm @25°C)	580	611	↑ 773	↑ 762	502 to 640		570 ± 11		12
pH (Standard Units)	↑ 7.5	7.4	7.2	7.2	6.9 to 7.4		7.2 ± 0.05		11
Alkalinity (CaCO3) (field) (mg/L)	250	260	360	250	88 to 490		200 ± 31		12
Arsenic (mg/L)		0.007	0.011	↑ 0.025	0.003 to 0.02		0.0097 ± 0.005		3
Cadmium (mg/L)		0.0006 U	0.0006 U	0.0006 U	0.0002 U to 0.0007		0.0005 ± 0.000		3
Calcium (mg/L)		↓ 75.7	↑ 96.4	83.7	81.2 to 94.1		86 ± 4		3
Copper (mg/L)		0.004	0.003	0.003 U	0.001 U to 0.007		0.0033 ± 0.002		3
Iron (mg/L)		0.05 U	0.05 U	0.05 U	0.02 U to 6.28		2.1 ± 2.1		3
Magnesium (mg/L)		↓ 15.9	↑ 22.2	↑ 23.7	16.7 to 18.6		18 ± 0.55		3
Manganese (mg/L)		0.05 U	0.05 U	0.05 U	0.02 U to 0.17		0.07 ± 0.05		3
Nickel (mg/L)		0.005 U	0.005 U	0.005 U	0.002 U to 0.013		0.0073 ± 0.003		3
Potassium (mg/L)		↓ 4.7	5.3	5.1	5 to 5.9		5.3 ± 0.28		3
Sodium (mg/L)		↓ 7.9	↑ 26.5	↑ 64.1	8.7 to 11.3		9.9 ± 0.76		3
Ammonia (N) (mg/L)		↑ 0.5 U	↑ 0.5 U	↑ 0.5 U	0.1 U to 0.1 U		0.1 ± 0		3
Nitrate (N) (mg/L)		↓ 0.3	↓ 0.3 U	0.5	0.4 to 1		0.73 ± 0.18		3
Phosphate Phosphorus (mg/L)		0.04 U	0.04 U	0.04 U	0.01 to 0.17		0.067 ± 0.05		3
Total Dissolved Solids (mg/L)		↓ 309	↑ 414	↑ 563	344 to 368		360 ± 7.7		3
Total Suspended Solids (mg/L)		4 U	4 U	4 U	4 U to 102		37 ± 33		3
Sulfate (mg/L)		↓ 10.6	↓ 2 U	↑ 107	14.8 to 30.8		23 ± 4.7		3
Bicarbonate (CaCO3) (mg/L)		278	↑ 326	↑ 359	263 to 307		280 ± 13		3
Organic Carbon (mg/L)		↓ 2 U	↓ 2.8	↓ 3.1	3.5 to 3.6		3.6 ± 0.03		3
Chemical Oxygen Demand (mg/L)		↑ 10 U	↑ 10 U	↑ 10	3 U to 8		6 ± 1.5		3
Chloride (mg/L)		↑ 2.7	↑ 3.1	↑ 11.6	2.1 to 2.6		2.4 ± 0.15		3
Turbidity (field) (NTU)	5.54	5.72	4	1.5	0.8 to 25.1		5.9 ± 2.5		12
Tannin & Lignins (Tannic Acid) (mg/L)		0.2 U	0.2 U	0.2 U	0.2 U to 0.33		0.24 ± 0.04		3

underlined/bold - values exceed a regulatory standard listed below.

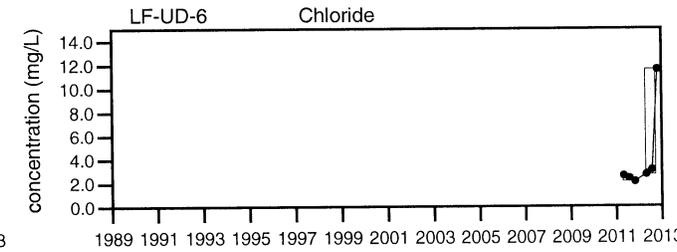
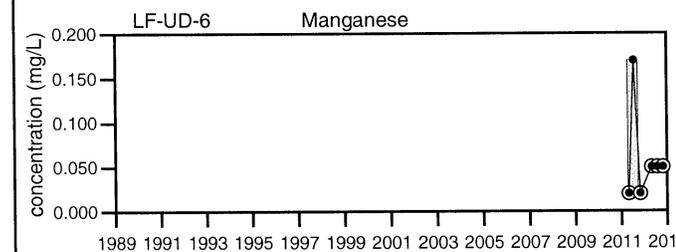
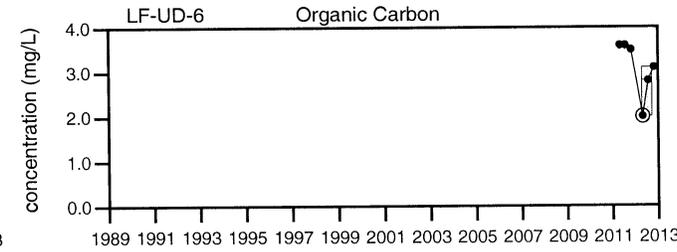
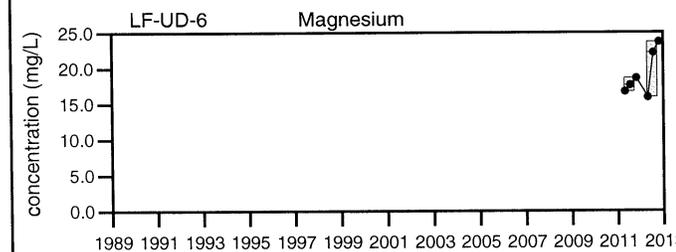
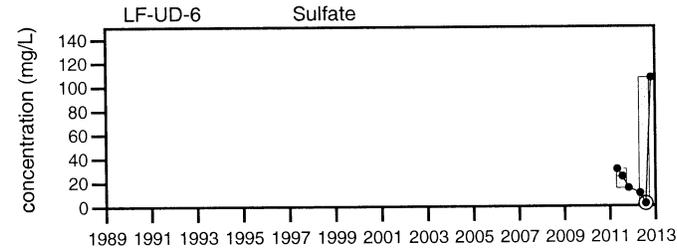
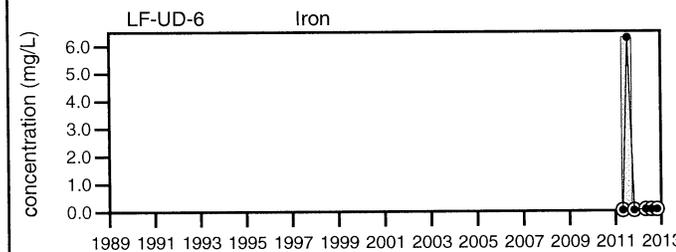
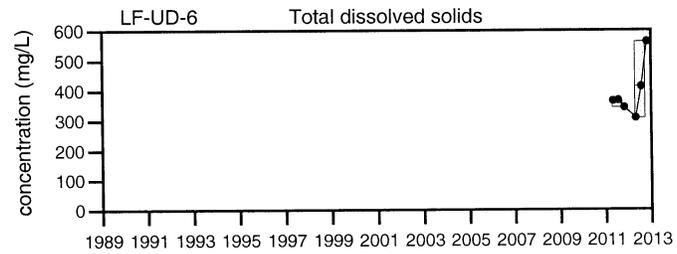
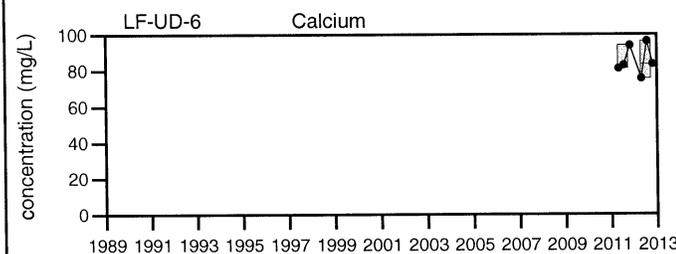
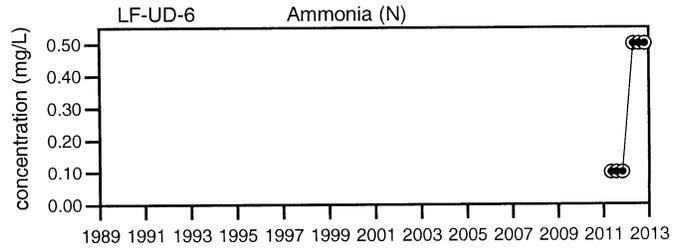
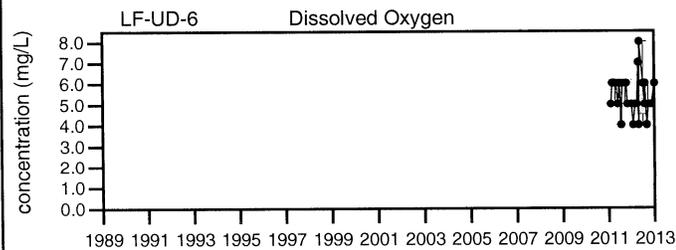
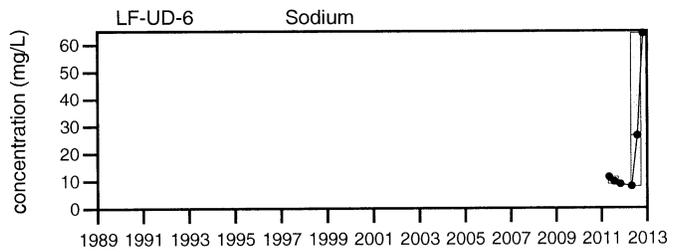
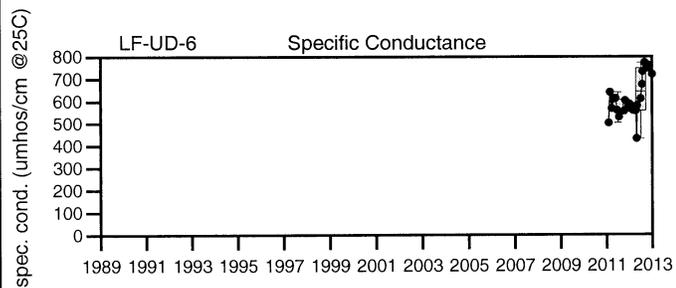
↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

This location is monitored triannually for field and lab parameters and monthly for field parameters only.

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed H2= water level higher than pipes. See LF-COMP for readings. F6= No flow. Sample not taken F-12= Pipe under water, no sample taken. G7= Field measurements elevated due to recent cleaning of underdrain pipe. H6= Pipe under water, could not measure flow.



**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- Sample Event
- BDL

**Juniper Ridge Landfill  
LF-UD-6**

Sevee & Maher Engineers, Inc.

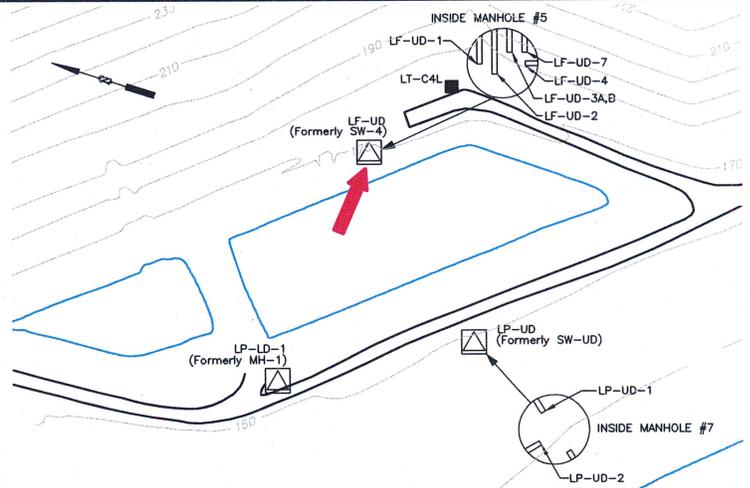
# LF-UD-7

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

LF-UD-7 monitors the landfill underdrain from Cell #7 and Manhole #5.



Sampled: **Monthly and 3 Times Annually**

Sampled Since: **11/30/2011**

Sampling Method: **Grab**

## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance (µmhos/cm @25°C)	H8	H8	H8	H8	No historical data for Specific Conductance.				
pH (Standard Units)	H8	H8	H8	H8	No historical data for pH.				
Alkalinity (CaCO3) (field) (mg/L)	H8	H8	H8	H8	No historical data for Alkalinity (CaCO3) (field).				
Arsenic (mg/L)		H2	F6	F6	No historical data for Arsenic.				
Cadmium (mg/L)		H2	F6	F6	No historical data for Cadmium.				
Calcium (mg/L)		H2	F6	F6	No historical data for Calcium.				
Copper (mg/L)		H2	F6	F6	No historical data for Copper.				
Iron (mg/L)		H2	F6	F6	No historical data for Iron.				
Magnesium (mg/L)		H2	F6	F6	No historical data for Magnesium.				
Manganese (mg/L)		H2	F6	F6	No historical data for Manganese.				
Nickel (mg/L)		H2	F6	F6	No historical data for Nickel.				
Potassium (mg/L)		H2	F6	F6	No historical data for Potassium.				
Sodium (mg/L)		H2	F6	F6	No historical data for Sodium.				
Ammonia (N) (mg/L)		H2	F6	F6	No historical data for Ammonia (N).				
Nitrate (N) (mg/L)		H2	F6	F6	No historical data for Nitrate (N).				
Phosphate Phosphorus (mg/L)		H2	F6	F6	No historical data for Phosphate Phosphorus.				
Total Dissolved Solids (mg/L)		H2	F6	F6	No historical data for Total Dissolved Solids.				
Total Suspended Solids (mg/L)		H2	F6	F6	No historical data for Total Suspended Solids.				
Sulfate (mg/L)		H2	F6	F6	No historical data for Sulfate.				
Bicarbonate (CaCO3) (mg/L)		H2	F6	F6	No historical data for Bicarbonate (CaCO3).				
Organic Carbon (mg/L)		H2	F6	F6	No historical data for Organic Carbon.				
Chemical Oxygen Demand (mg/L)		H2	F6	F6	No historical data for Chemical Oxygen Demand.				
Chloride (mg/L)		H2	F6	F6	No historical data for Chloride.				
Turbidity (field) (NTU)	H8	H8	H8	H8	No historical data for Turbidity (field).				
Tannin & Lignins (Tannic Acid) (mg/L)		H2	F6	F6	No historical data for Tannin & Lignins (Tannic Acid).				

underlined/bold - values exceed a regulatory standard listed below.

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

This location is monitored triannually for field and lab parameters and monthly for field parameters only.

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed H2= water level higher than pipes. See LF-COMP for readings. F6= No flow. Sample not taken F-12= Pipe under water, no sample taken. G7= Field measurements elevated due to recent cleaning of underdrain pipe. H6= Pipe under water, could not measure flow.

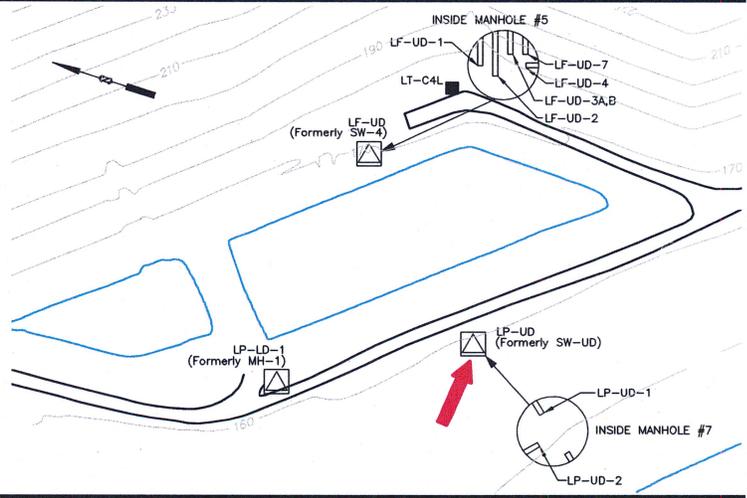
# LP-COMP

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

Manhole #7 composite sample



Sampled: See comments below

Sampled Since: 10/27/04

Sampling Method: Grab

## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance (µmhos/cm @25°C)	323	331	355		260	to 665	380 ± 32		12
pH (Standard Units)	7.8	7.4	7		6.7	to 8.4	7.3 ± 0.13		12
Alkalinity (CaCO3) (field) (mg/L)	125	150	125		83	to 260	130 ± 14		12
Turbidity (field) (NTU)	1.74	0.48	0.79		0	to 4	1.2 ± 0.36		12

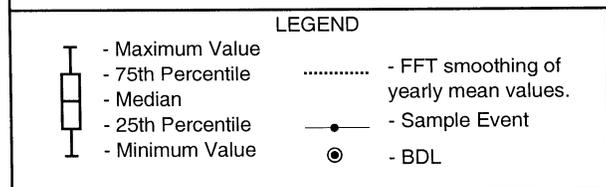
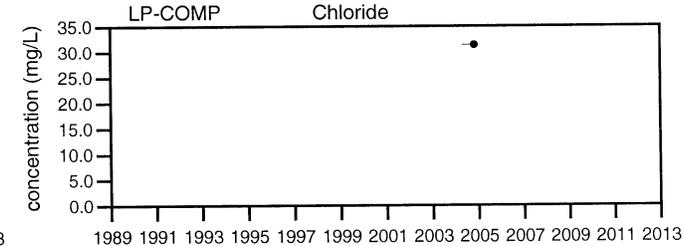
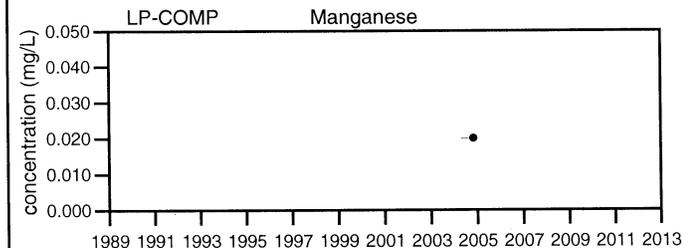
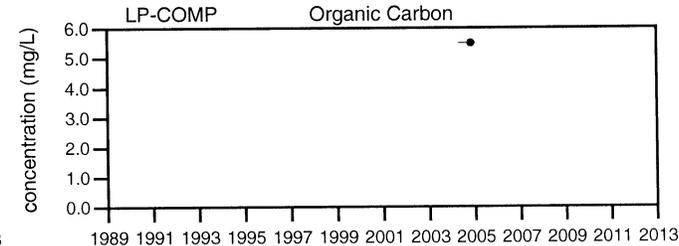
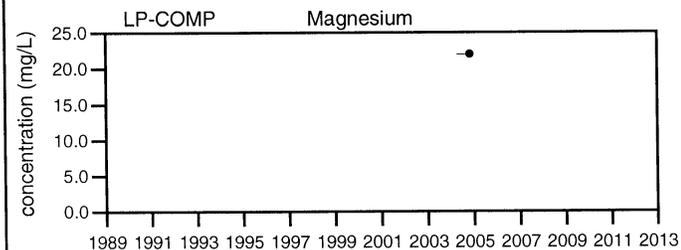
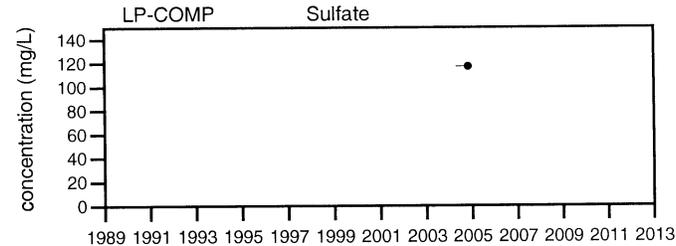
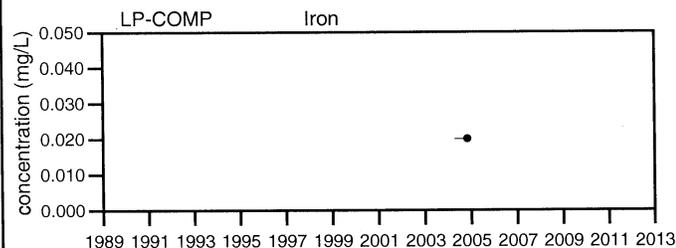
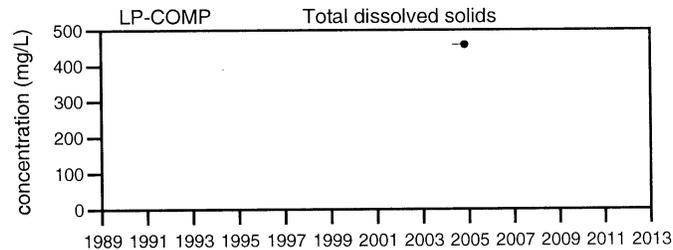
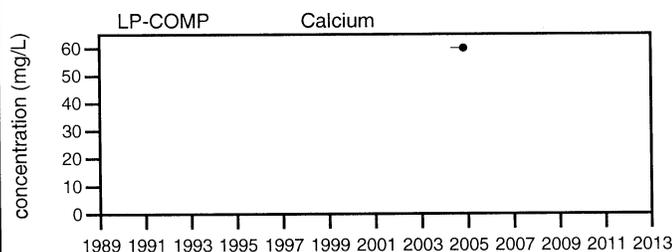
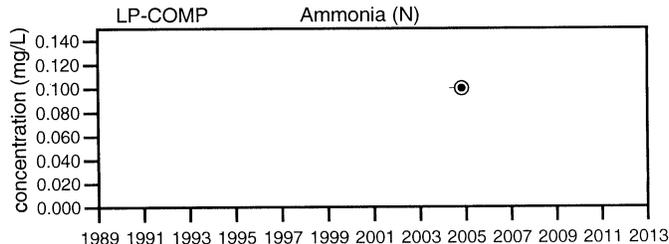
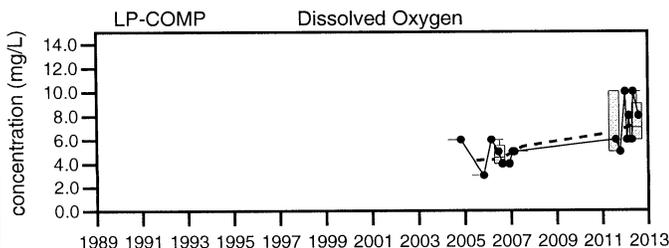
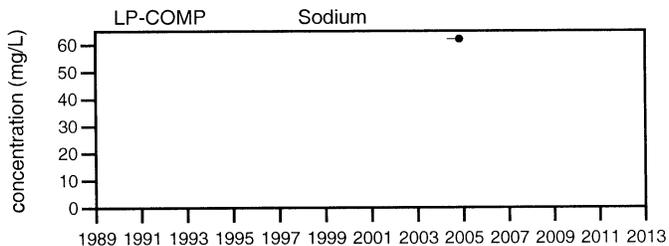
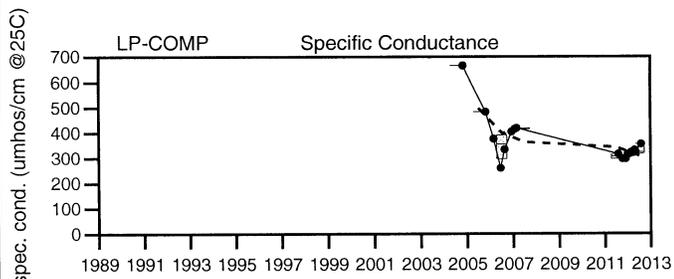
underlined/bold - values exceed a regulatory standard listed below.

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

This location is monitored monthly for field parameters only when the water level is higher than the LP sample location pipes in Manhole #7.

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed H2= water level higher than pipes. See LF-COMP for readings. F6= No flow. Sample not taken F-12= Pipe under water, no sample taken. G7= Field measurements elevated due to recent cleaning of underdrain pipe. H6= Pipe under water, could not measure flow.



Juniper Ridge Landfill

LP-COMP

Sevee & Maher Engineers, Inc.

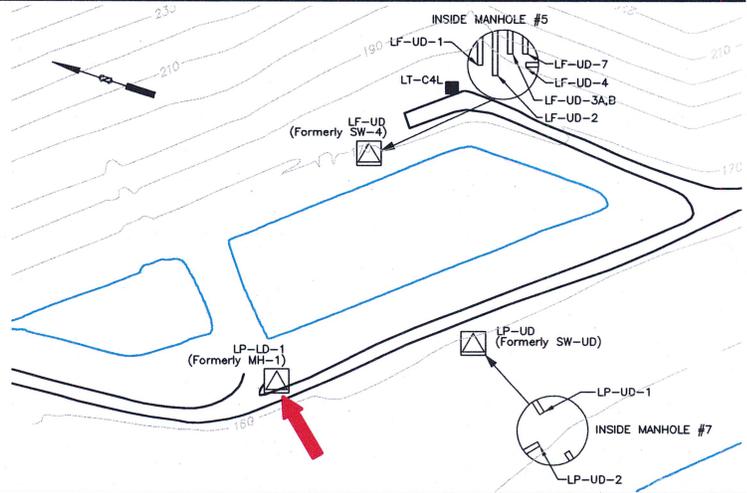
# LP-LD-1

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

LP-LD-1 is located at Manhole #1 and monitors the leak detection layer beneath the leachate pond.



Sampled: **Monthly**  
 Sampled Since: **07/28/04**

Sampling Method: **Grab**

## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance ( $\mu\text{mhos/cm @25}^\circ\text{C}$ )		184	206	123	56	to 944	380 $\pm$ 26		72
pH (Standard Units)		8	7.5	7.1	5.8	to 8.6	7.3 $\pm$ 0.06		72
Alkalinity (CaCO <sub>3</sub> ) (field) (mg/L)		65	110	100	25	to 425	130 $\pm$ 11		72
Turbidity (field) (NTU)		2	2.1	1.5	0	to 25	2.9 $\pm$ 0.49		72

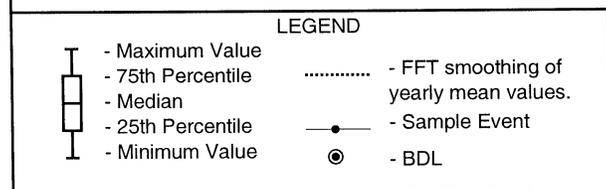
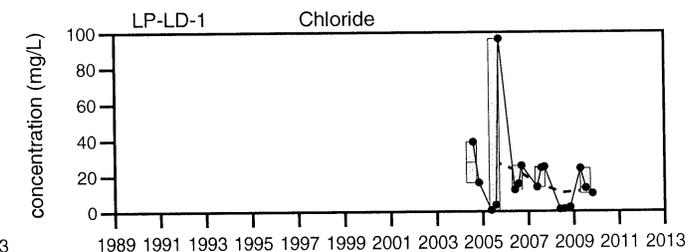
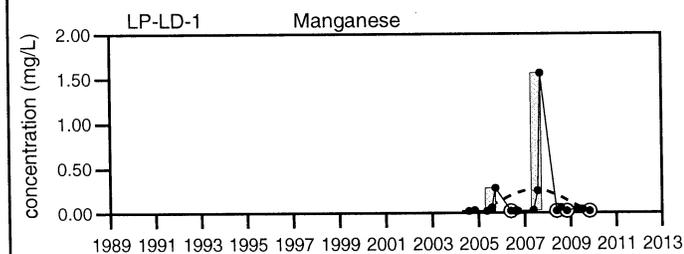
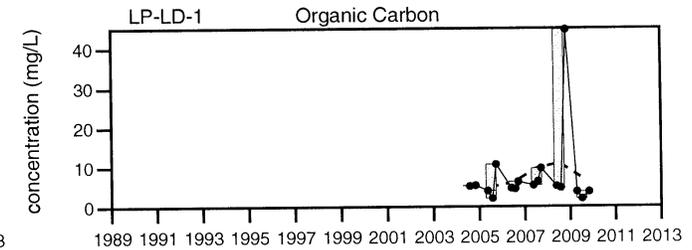
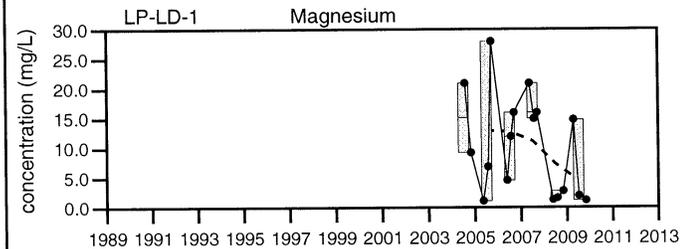
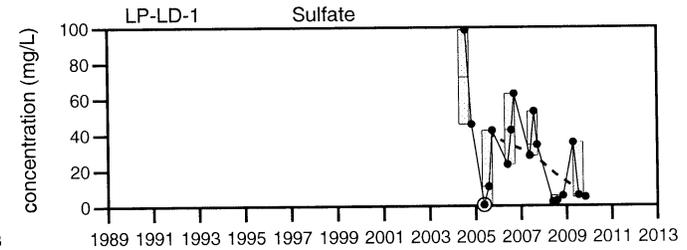
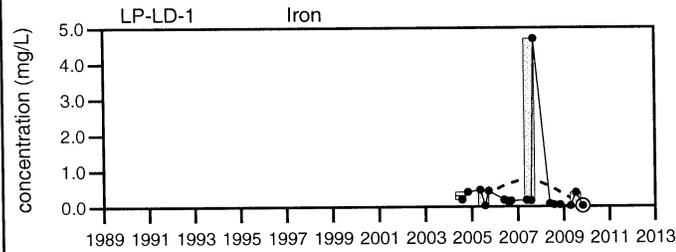
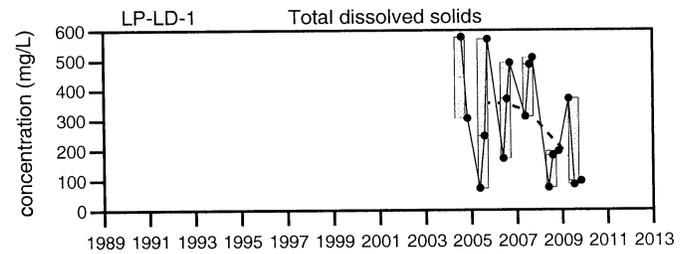
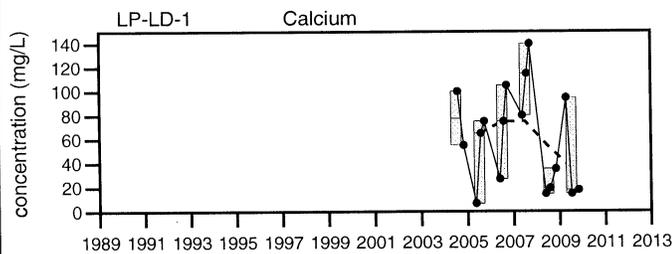
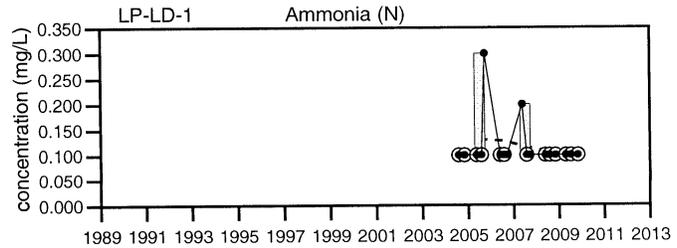
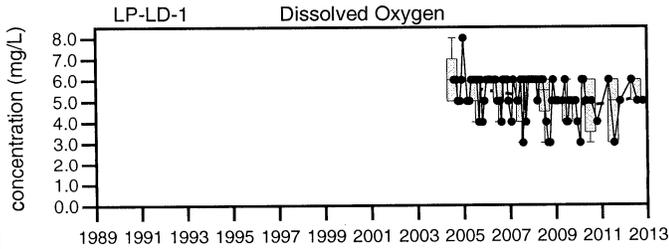
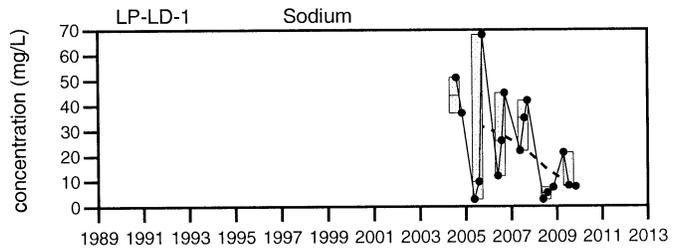
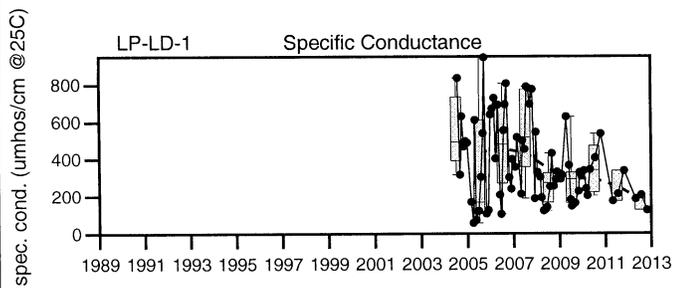
underlined/bold - values exceed a regulatory standard listed below.

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER  
 This location is monitored monthly for field parameters only.

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed H2= water level higher than pipes. See LF-COMP for readings. F6= No flow. Sample not taken F-12= Pipe under water, no sample taken. G7= Field measurements elevated due to recent cleaning of underdrain pipe. H6= Pipe under water, could not measure flow. H9=No flow from pipe, See LP-COMP for readings.



## Juniper Ridge Landfill

### LP-LD-1

Sevee & Maher Engineers, Inc.

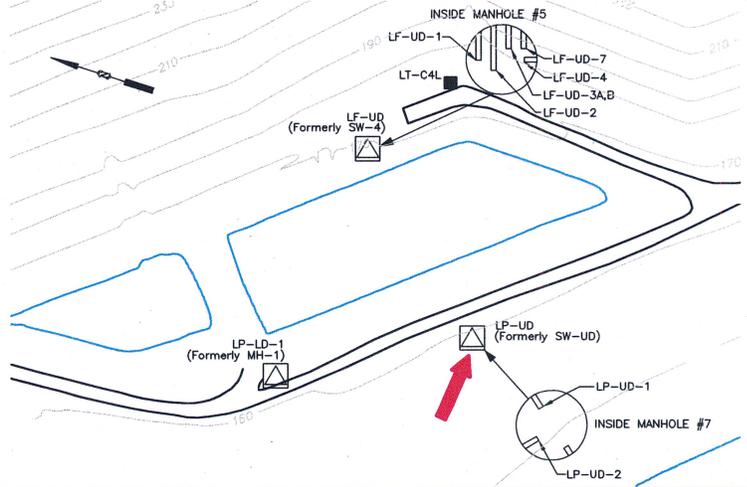
# LP-UD-1

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

LP-UD-1 is located at Manhole #7 and monitors the leachate underdrain from the southern end of the leachate pond.



Sampled: **Monthly and 3 Times Annually**

Sampled Since: **07/28/04**

Sampling Method: **Grab**

## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance (µmhos/cm @25°C)	H9	H9	H9	F6	517	to 517	520 ± 0		1
pH (Standard Units)	H9	H9	H9	F6	6.8	to 6.8	6.8 ± 0		1
Alkalinity (CaCO3) (field) (mg/L)	H9	H9	H9	F6	125	to 125	130 ± 0		1
Arsenic (mg/L)		F6	F6	F6	No historical data for Arsenic.				
Cadmium (mg/L)		F6	F6	F6	No historical data for Cadmium.				
Calcium (mg/L)		F6	F6	F6	No historical data for Calcium.				
Copper (mg/L)		F6	F6	F6	No historical data for Copper.				
Iron (mg/L)		F6	F6	F6	No historical data for Iron.				
Magnesium (mg/L)		F6	F6	F6	No historical data for Magnesium.				
Manganese (mg/L)		F6	F6	F6	No historical data for Manganese.				
Nickel (mg/L)		F6	F6	F6	No historical data for Nickel.				
Potassium (mg/L)		F6	F6	F6	No historical data for Potassium.				
Sodium (mg/L)		F6	F6	F6	No historical data for Sodium.				
Ammonia (N) (mg/L)		F6	F6	F6	No historical data for Ammonia (N).				
Nitrate (N) (mg/L)		F6	F6	F6	No historical data for Nitrate (N).				
Phosphate Phosphorus (mg/L)		F6	F6	F6	No historical data for Phosphate Phosphorus.				
Total Dissolved Solids (mg/L)		F6	F6	F6	No historical data for Total Dissolved Solids.				
Total Suspended Solids (mg/L)		F6	F6	F6	No historical data for Total Suspended Solids.				
Sulfate (mg/L)		F6	F6	F6	No historical data for Sulfate.				
Bicarbonate (CaCO3) (mg/L)		F6	F6	F6	No historical data for Bicarbonate (CaCO3).				
Organic Carbon (mg/L)		F6	F6	F6	No historical data for Organic Carbon.				
Chemical Oxygen Demand (mg/L)		F6	F6	F6	No historical data for Chemical Oxygen Demand.				
Chloride (mg/L)		F6	F6	F6	No historical data for Chloride.				
Turbidity (field) (NTU)	H9	H9	H9	F6	0	to 0	0 ± 0		1
Tannin & Lignins (Tannic Acid) (mg/L)		F6	F6	F6	No historical data for Tannin & Lignins (Tannic Acid).				

underlined/bold - values exceed a regulatory standard listed below.

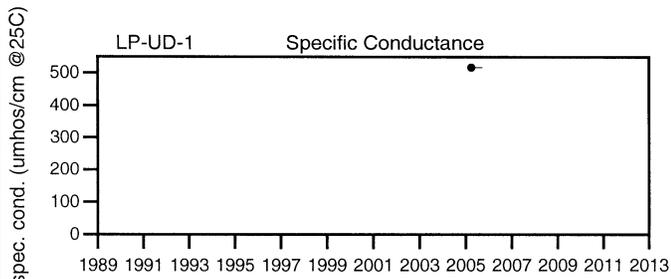
↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

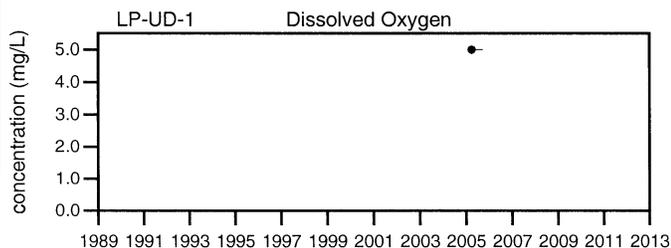
Q2= APRIL Q3= JULY Q4= OCTOBER

This location is monitored triannually for field and lab parameters and monthly for field parameters only.

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed H2= water level higher than pipes. See LF-COMP for readings. F6= No flow. Sample not taken F-12= Pipe under water, no sample taken. G7= Field measurements elevated due to recent cleaning of underdrain pipe. H6= Pipe under water, could not measure flow. H9=No flow from pipe, See LP-COMP for readings.



No data for Sodium at LP-UD-1



No data for Ammonia (N) at LP-UD-1

No data for Calcium at LP-UD-1

No data for Total dissolved solids at LP-UD-1

No data for Iron at LP-UD-1

No data for Sulfate at LP-UD-1

No data for Magnesium at LP-UD-1

No data for Organic Carbon at LP-UD-1

No data for Manganese at LP-UD-1

No data for Chloride at LP-UD-1

LEGEND

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- Sample Event
- BDL

## Juniper Ridge Landfill LP-UD-1

Sevee & Maher Engineers, Inc.

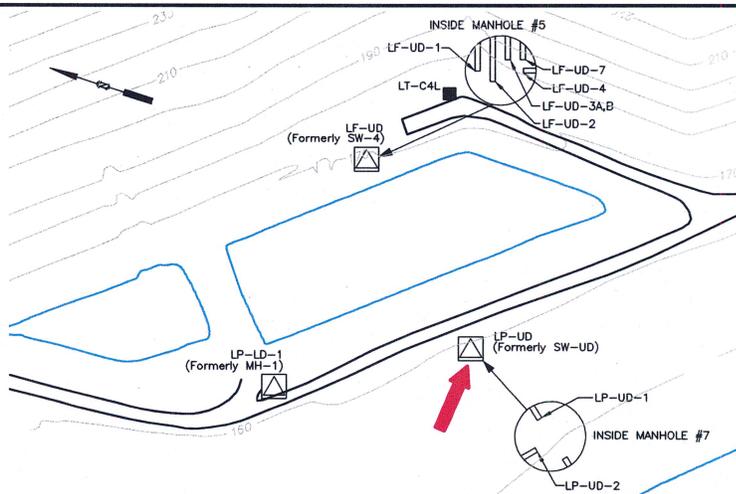
# LP-UD-2

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

LP-UD-2 is located in Manhole #7 and monitors the water quality of the leachate underdrain on the north end of the leachate pond.



Sampled: **Monthly and 3 Times Annually**

Sampled Since: **07/28/04**

Sampling Method: **Grab**

## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance (µmhos/cm @25°C)	H5	322	342	286	210	to 834	360 ± 11		79
pH (Standard Units)	H5	7.6	7	7.4	5.9	to 8	7.1 ± 0.04		79
Alkalinity (CaCO3) (field) (mg/L)	H5	130	185	125	50	to 350	140 ± 6		78
Arsenic (mg/L)		0.006	0.008	↑ 0.012	0.001 U	to 0.011	0.0033 ± 0.000		23
Cadmium (mg/L)		0.0006 U	0.0006	0.0006 U	0.0002 U	to 0.0016	0.00035 ± 8E-05		21
Calcium (mg/L)		29.9	40.5	29.9	28.8	to 60	37 ± 1.6		23
Copper (mg/L)		0.005	0.003	0.003 U	0.001 U	to 0.01	0.0028 ± 0.000		21
Iron (mg/L)		0.11	0.05 U	0.05 U	0.02 U	to 2.86	0.2 ± 0.13		23
Magnesium (mg/L)		9.7	11.7	10	7.7	to 21	11 ± 0.57		23
Manganese (mg/L)		0.05 U	0.05 U	0.05 U	0.02 U	to 0.36	0.039 ± 0.02		23
Nickel (mg/L)		0.005 U	0.005 U	0.005 U	0.002 U	to 0.007	0.0024 ± 0.000		21
Potassium (mg/L)		2.9	3.2	2.4	2.3	to 25	4.6 ± 0.99		23
Sodium (mg/L)		8.5	9.7	9	7	to 58	15 ± 2.3		23
Ammonia (N) (mg/L)		↑ 0.5 U	↑ 0.5 U	↑ 0.5 U	0.1 U	to 0.1 U	0.1 ± 0		23
Nitrate (N) (mg/L)		0.3 U	0.3 U	0.3 U	0.1	to 2.3	0.4 ± 0.09		23
Phosphate Phosphorus (mg/L)		0.04 U	0.04 U	0.04 U	0.01 U	to 0.11	0.02 ± 0.005		23
Total Dissolved Solids (mg/L)		165	192	287	151	to 455	220 ± 13		23
Total Suspended Solids (mg/L)		4 U	4 U	4 U	4 U	to 73	7.3 ± 3		23
Sulfate (mg/L)		9.9	8.5	8.6	2.7	to 116	20 ± 5		23
Bicarbonate (CaCO3) (mg/L)		123	143	128	90	to 228	140 ± 5.6		23
Organic Carbon (mg/L)		2 U	2 U	2 U	0.7 U	to 6.3	1.9 ± 0.27		23
Chemical Oxygen Demand (mg/L)		10 U	10 U	10 U	3 U	to 18	5.3 ± 0.84		23
Chloride (mg/L)		5.2	5.1	5.6	2.3	to 31.1	10 ± 1.2		23
Turbidity (field) (NTU)	H5	2.5	3	1.3	0	to 60	2 ± 0.77		79
Tannin & Lignins (Tannic Acid) (mg/L)		0.2 U	0.2 U	0.2 U	0.2 U	to 0.29	0.2 ± 0.004		23

underlined/bold - values exceed a regulatory standard listed below.

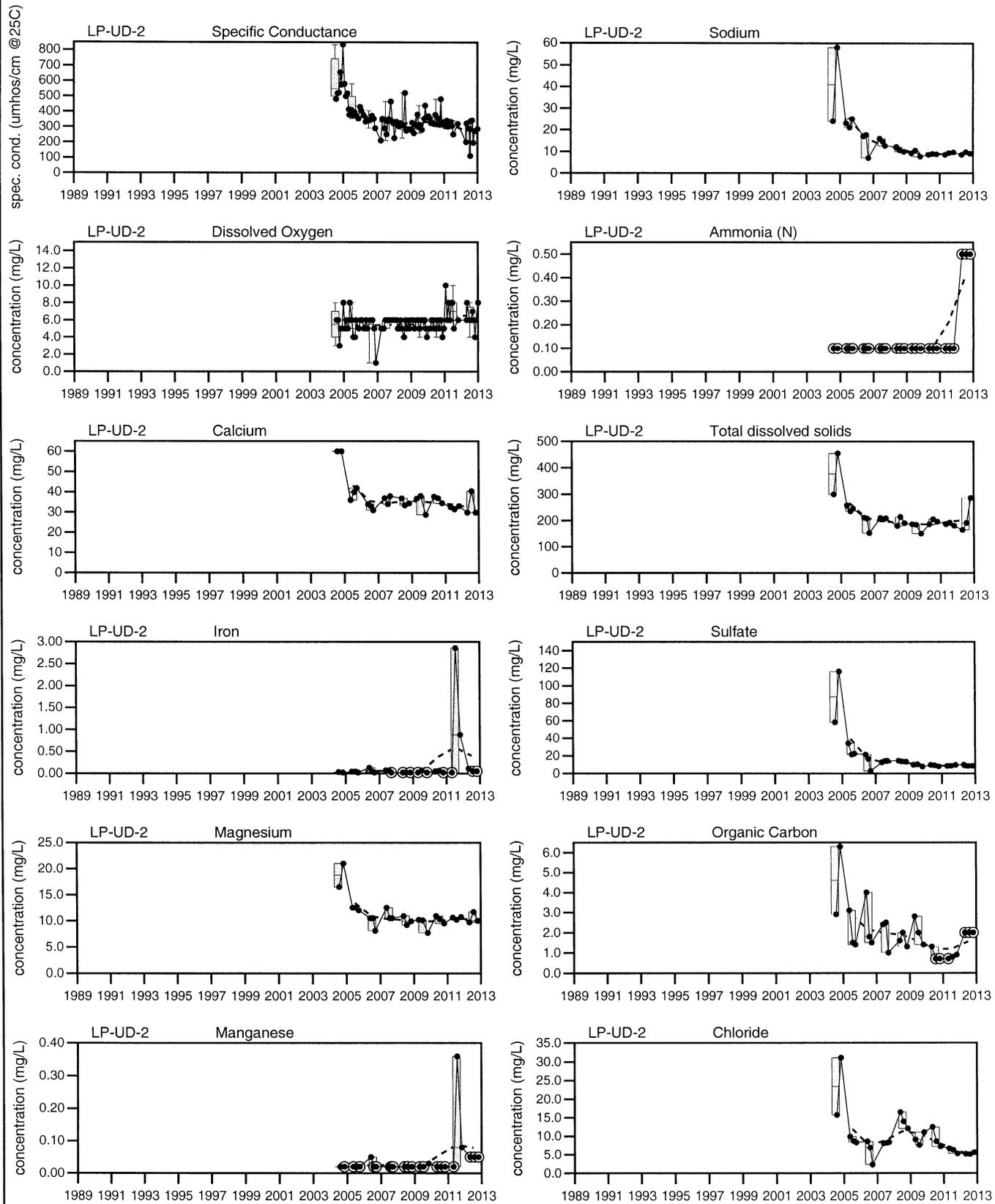
↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

This location is monitored triannually for field and lab parameters and monthly for field parameters only.

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed H2= water level higher than pipes. See LF-COMP for readings. F6= No flow. Sample not taken F-12= Pipe under water, no sample taken. G7= Field measurements elevated due to recent cleaning of underdrain pipe. H6= Pipe under water, could not measure flow. H9=No flow from pipe, See LP-COMP for readings.



**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- ..... - FFT smoothing of yearly mean values.
- - Sample Event
- ⊙ - BDL

Juniper Ridge Landfill  
LP-UD-2

Sevee & Maher Engineers, Inc.

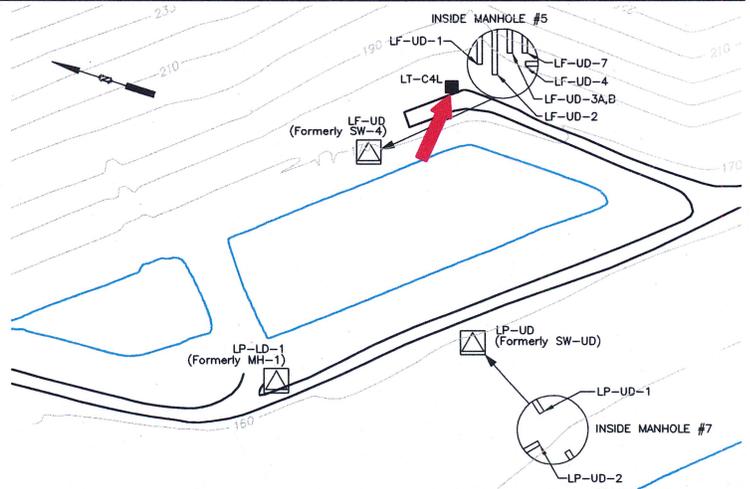
# LT-C4L

Juniper Ridge Landfill

annual stats 2012 minus leachate

## Well Description

Leachate collection location for cells #1, #2, #3A, #3B, #4 and #7.



Sampled: **3 Times Annually**

Sampled Since: **04/15/2009**

Sampling Method: **Grab**

## Chemical Summary

Indicator Parameters	2012				Historical				
	Q1	Q2	Q3	Q4	Min	Max	Mean	SE	n
Specific Conductance (µmhos/cm @25°C)	↓ 11470	25300	19800		15850 to 30700		24000 ± 1700		9
pH (Standard Units)	↓ 6.7	↓ 6.8	6.9		6.9 to 7.6		7.1 ± 0.08		9
Alkalinity (CaCO3) (field) (mg/L)	↓ 688	D3	D3		750 to 1813		1400 ± 190		5
Arsenic (mg/L)	0.07	0.11	↑ 0.177		0.059 to 0.121		0.096 ± 0.007		9
Cadmium (mg/L)	0.005	0.003 U	0.004		0.0009 to 0.012		0.0044 ± 0.001		9
Calcium (mg/L)	482	845	934		305 to 1759		740 ± 170		9
Copper (mg/L)	0.015 U	↑ 0.056	0.024		0.004 to 0.036		0.012 ± 0.003		9
Iron (mg/L)	↑ 63	↑ 82	↑ 45.3		9.61 to 43.3		23 ± 4.2		9
Magnesium (mg/L)	↓ 179	466	433		205 to 514		370 ± 32		9
Manganese (mg/L)	↑ 23.6	↑ 26	↑ 14		1.8 to 8.5		3.3 ± 0.73		9
Nickel (mg/L)	0.045	0.122	0.084		0.03 to 0.153		0.091 ± 0.01		9
Potassium (mg/L)	↓ 714	1719	1100		1066 to 1982		1600 ± 100		9
Sodium (mg/L)	↓ 1024	2337	1842		1520 to 2612		2200 ± 130		9
Total Kjeldahl Nitrogen (mg/L)	↓ 290	710	↓ 490		500 to 910		730 ± 50		9
Ammonia (N) (mg/L)	274	↑ 742	459		74 to 714		550 ± 74		9
Nitrate (N) (mg/L)	↑ 15 U	↑ 6 U	↑ 17.9		5 U to 5.6		14 ± 2.9		9
Phosphate Phosphorus (mg/L)		0.77	↓ 0.46		0.59 to 1.2		0.91 ± 0.09		6
Total Dissolved Solids (mg/L)	↓ 6080	15210	14570		8250 to 19816		15000 ± 1300		9
Total Suspended Solids (mg/L)	108	106	36		5 to 230		70 ± 24		9
Sulfate (mg/L)	133	↓ 50.2	213		60 U to 342		120 ± 29		9
Bicarbonate (CaCO3) (mg/L)	↓ 1370	↑ 3630	2740		1400 to 3360		2700 ± 200		9
Organic Carbon (mg/L)	935	↑ 2120	1740		182 to 1970		660 ± 220		9
Biochemical Oxygen Demand (mg/L)	1120 G	3090	3190		39 to 4050		950 ± 460		9
Chemical Oxygen Demand (mg/L)	2960	↑ 6700	5900		959 to 6640		2800 ± 600		9
Chloride (mg/L)	↓ 2560	6350	9880		4300 to 21500		14000 ± 2100		9
Turbidity (field) (NTU)	14.9	D3	D3		6.1 to 1100		250 ± 130		8
Tannin & Lignins (Tannic Acid) (mg/L)		67	84		3.6 to 97		46 ± 13		6

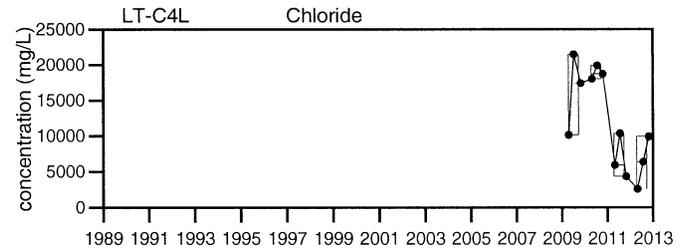
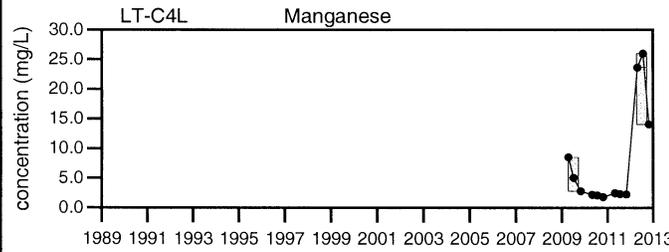
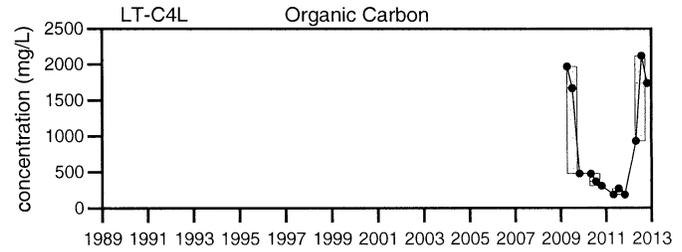
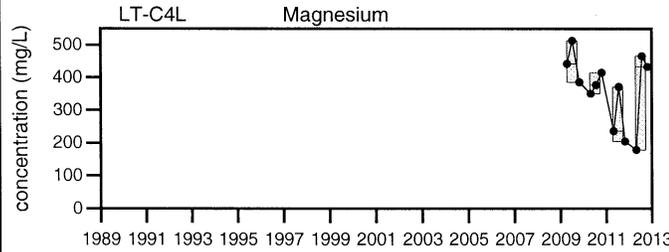
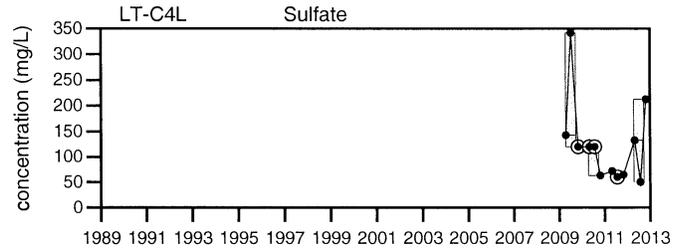
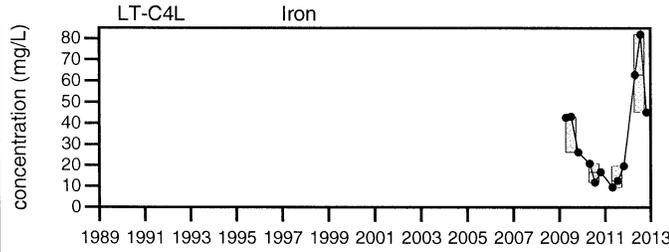
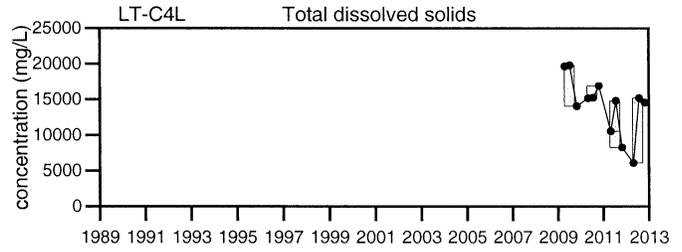
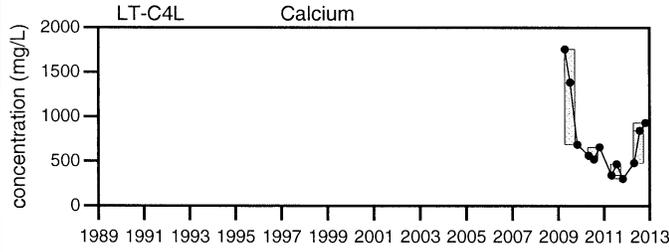
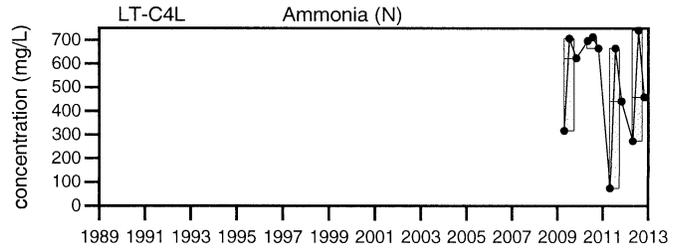
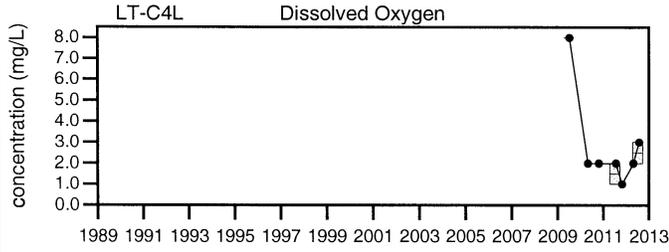
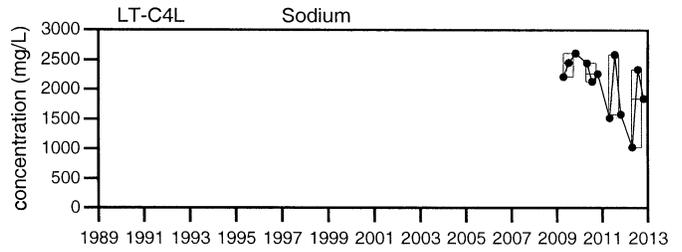
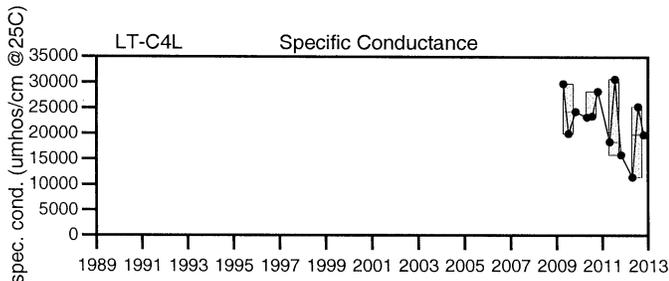
underlined/bold - values exceed a regulatory standard listed below.

↑ indicates a value greater than the historical maximum value; ↓ indicates a value less than the historical minimum value.

## Comments

Q2= APRIL Q3= JULY Q4= OCTOBER

U= sample below PQL or MDL J= estimated quantity D= location dry F= location frozen I=insufficient water for sample collection A=sample location could not be accessed != the sampling location was damaged or destroyed.



**LEGEND**

- Maximum Value
- 75th Percentile
- Median
- 25th Percentile
- Minimum Value
- Sample Event
- BDL

Juniper Ridge Landfill  
LT-C4L

Sevee & Maher Engineers, Inc.

**APPENDIX D**

**MANN-KENDALL TREND ANALYSIS RESULTS**

**Summary of Mann-Kendall Trend Analysis  
95% Confidence (alpha=0.05)  
Juniper Ridge Landfill 2012**

Location	Increasing Trends		Decreasing Trends		No Trends	
	Trend Analysis 3-yr	Trend Analysis 5-yr	Trend Analysis 3-yr	Trend Analysis 5-yr	Trend Analysis 3-yr	Trend Analysis 5-yr
DP-4	Na, Cl	Na	DO, HCO3	DO, Ca, Fe, Mg, Mn, K, TDS, TSS, HCO3, OC, TANNIC	Spec Cond, pH, Temp, Eh, As, Cd, Ca, Cu, Fe, Mg, Mn, Ni, K, TKN, TDS, TSS, SO4, ALK (fld), OC, COD, TURB (fld), TANNIC (NH3-N, NO3-N)	Spec Cond, pH, Temp, Eh, As, Cd, Cu, Ni, TKN, NH3-N, NO3-N, SO4, ALK (fld), COD, Cl, TURB (fld)
LF-COMP	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data
LF-UD-1	Temp, Eh	Spec Cond, Temp, K, P, TSS		TURB (fld)	Spec Cond, pH, DO, As, Cd, Ca, Cu, Fe, Mg, Mn, Ni, K, Na, NH3-N, NO3-N, P, TDS, TSS, SO4, HCO3, ALK (fld), OC, COD, Cl, TURB (fld), TANNIC	pH, Eh, DO, As, Cd, Ca, Cu, Fe, Mg, Mn, Ni, Na, NH3-N, NO3-N, TDS, SO4, HCO3, ALK (fld), OC, COD, Cl, TANNIC
LF-UD-2	Temp, Eh, Cl	Spec Cond, Temp, Mn, TDS, Cl	pH	NO3-N, TURB (fld)	Spec Cond, DO, As, Cd, Ca, Fe, Mg, Mn, Ni, K, Na, NH3-N, NO3-N, P, TDS, TSS, SO4, HCO3, ALK (fld), OC, COD, TURB (fld), TANNIC (Cu)	pH, Eh, DO, As, Cd, Ca, Cu, Fe, Mg, Ni, K, Na, NH3-N, P, TSS, SO4, HCO3, ALK (fld), OC, COD, TANNIC
LF-UD-3A,B	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data
LF-UD-4 <sup>1</sup>	Temp, Eh	Insufficient Data		Insufficient Data	Spec Cond, pH, DO, ALK (fld), TURB (fld)	Insufficient Data
LF-UD-5and6	Spec Cond, Eh,	Insufficient Data	SO4	Insufficient Data	pH, Temp, DO, As, Cd, Ca, Cu, Fe, Mg, Mn, Ni, K, Na, NO3-N, P, TDS, TSS, HCO3, ALK (fld), OC, COD, Cl, TURB (fld), TANNIC (NH3-N)	Insufficient Data
LF-UD-6	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data
LF-UD-7	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data
LP-COMP	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data
LP-LD-1 <sup>1</sup>	Temp			pH	Spec Cond, pH, Temp, Eh, DO, ALK (fld), TURB (fld)	Spec Cond, pH, Temp, Eh, DO, ALK (fld), TURB (fld)
LP-UD-1	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data
LP-UD-2	Temp, Eh, K, TURB (fld)	Spec Cond, As, HCO3, ALK (fld)	Spec Cond, pH, Cl	NO3-N, SO4, OC, Cl, TURB (fld)	DO, As, Cd, Ca, Cu, Fe, Mg, Mn, Ni, Na, NO3-N, P, TDS, TSS, SO4, HCO3, ALK (fld), OC, COD, TANNIC (NH3-N)	pH, Temp, Eh, DO, Cd, Ca, Cu, Fe, Mg, Mn, Ni, K, Na, P, TDS, TSS, COD, TANNIC (Mn, NH3-N)
LT-C4L	Mn	Insufficient Data	Eh, TKN	Insufficient Data	Spec Cond, pH, Temp, DO, As, Cd, Ca, Cu, Fe, Mg, Ni, K, Na, NH3-N, NO3-N, P, TDS, TSS, SO4, S=, HCO3, ALK (fld), OC, BOD5, COD, Cl, TURB (fld), TANNIC	Insufficient Data
MW04-102	Mg, K, Na, TKN	Mg, HCO3, TURB (fld)		Cl	Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Fe, Ni, NO3-N, TDS, TSS, SO4, HCO3, ALK (fld), OC, COD, Cl, TURB (fld), TANNIC (Cd, Cu, Mn, NH3-N)	Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Cu, Fe, Ni, K, Na, TKN, NO3-N, TDS, TSS, SO4, ALK (fld), OC, COD, Cl, TANNIC (Mn, NH3-N)
MW04-105	Mn		Na, Cl	Spec Cond, DO, Ca, Mg, K, Na, TDS, SO4, HCO3, ALK (fld), OC, Cl	Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Fe, Mg, K, TKN, TDS, TSS, SO4, HCO3, ALK (fld), OC, COD, TURB (fld), TANNIC (Cu, Mn, Ni, NH3-N, NO3-N)	pH, Temp, Eh, As, Cd, Cu, Fe, Mn, Ni, TKN, NO3-N, TSS, COD, TURB (fld), TANNIC (NH3-N)

**Summary of Mann-Kendall Trend Analysis  
95% Confidence (alpha=0.05)  
Juniper Ridge Landfill 2012**

Location	Increasing Trends		Decreasing Trends		No Trends	
	Trend Analysis 3-yr	Trend Analysis 5-yr	Trend Analysis 3-yr	Trend Analysis 5-yr	Trend Analysis 3-yr	Trend Analysis 5-yr
MW04-109R	TURB (fld)	Insufficient Data	SO4, OC	Insufficient Data	Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Mg, Mn, K, Na, TKN, TDS, TSS, HCO3, ALK (fld), COD, Cl, TURB (fld), TANNIC (Cu, Fe, Ni, NH3-N, NO3-N)	Insufficient Data
MW09-901		Insufficient Data	Spec Cond, Eh, Ca, Mg, K, TDS, HCO3	Insufficient Data	pH, Temp, DO, As, Cu, Fe, Mn, Ni, Na, TKN, TSS, SO4, ALK (fld), OC, Cl, TURB (fld), TANNIC (Cd, NH3-N, NO3-N, COD)	Insufficient Data
MW11-207R	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data
MW12-303R	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data
MW-204			Eh, Ca, Cl	Spec Cond, Eh, DO, Ca, Mg, Na, TDS, HCO3	Spec Cond, pH, Temp, DO, As, Cd, Fe, Mg, K, Na, TKN, TDS, TSS, SO4, HCO3, ALK (fld), OC, COD, TURB (fld), TANNIC (Cu, Mn, Ni, NH3-N, NO3-N)	pH, Temp, As, Cd, Cu, Fe, Ni, K, TKN, NO3-N, TSS, SO4, ALK (fld), OC, COD, Cl, TURB (fld), TANNIC (Mn, NH3-N)
MW-206		Spec Cond, Fe, Mg, TDS, COD, TURB (fld)		SO4	Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Cu, Fe, Mg, Mn, Ni, K, Na, TKN, NH3-N, TDS, TSS, SO4, HCO3, ALK (fld), OC, COD, Cl, TURB (fld), TANNIC (NO3-N)	pH, Temp, Eh, DO, As, Cd, Ca, Cu, Ni, K, Na, TKN, NH3-N, NO3-N, TSS, HCO3, ALK (fld), OC, Cl, TANNIC (Mn)
MW-212	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data	Insufficient Data
MW-216BR	Spec Cond, Ca, Mg, TDS, ALK (fld)	Insufficient Data	pH, Fe, Mn, Na, SO4	Insufficient Data	Temp, Eh, DO, As, Cd, K, TKN, TSS, HCO3, OC, COD, Cl, TURB (fld), TANNIC (Cu, Ni, NH3-N, NO3-N)	Insufficient Data
MW-223A	Spec Cond, Ca, Mg, K, Na, TDS, HCO3, Cl	Spec Cond, As, Ca, Mg, K, Na, TDS, HCO3, Cl, TURB (fld)			pH, Temp, Eh, DO, As, TKN, NO3-N, TSS, SO4, ALK (fld), OC, TURB (fld), TANNIC (Cd, Cu, Fe, Mn, Ni, NH3-N, COD)	pH, Temp, Eh, DO, Cd, Cu, Fe, Ni, TKN, NO3-N, TSS, SO4, ALK (fld), OC, COD, TANNIC (Mn, NH3-N)
MW-223B	Mg, TDS, SO4, Cl	Spec Cond, Mg, Mn, K, NH3-N, TDS, Cl	HNO3		Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Fe, Mn, K, Na, TKN, NH3-N, NO3-N, TSS, ALK (fld), OC, COD, TURB (fld), TANNIC (Cu, Ni)	pH, Temp, Eh, DO, As, Cd, Ca, Cu, Fe, Mn, Ni, Na, TKN, NO3-N, TSS, SO4, HCO3, ALK (fld), OC, COD, TURB (fld), TANNIC
MW-227	Spec Cond, Mg, SO4, ALK (fld)	Spec Cond, As, TURB (fld)		DO, Na	pH, Temp, Eh, DO, As, Cd, Ca, Fe, K, Na, TKN, NH3-N, NO3-N, TDS, TSS, HCO3, OC, Cl, TURB (fld), TANNIC (Cu, Mn, Ni, COD)	pH, Temp, Eh, Cd, Ca, Cu, Fe, Mg, Ni, K, TKN, NO3-N, TDS, TSS, SO4, HCO3, ALK (fld), OC, COD, Cl, TANNIC (Mn, NH3-N)
MW-301		As, TURB (fld)		Mg, Na	Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Fe, Mg, Mn, K, Na, TKN, TDS, TSS, SO4, HCO3, ALK (fld), OC, Cl, TURB (fld), TANNIC (Cu, Ni, NH3-N, NO3-N, COD)	Spec Cond, pH, Temp, Eh, DO, Cd, Ca, Cu, Fe, Mn, Ni, K, TKN, NO3-N, TDS, TSS, SO4, HCO3, ALK (fld), OC, COD, Cl, TANNIC (NH3-N)

**Summary of Mann-Kendall Trend Analysis  
95% Confidence (alpha=0.05)  
Juniper Ridge Landfill 2012**

Location	Increasing Trends		Decreasing Trends		No Trends	
	Trend Analysis 3-yr	Trend Analysis 5-yr	Trend Analysis 3-yr	Trend Analysis 5-yr	Trend Analysis 3-yr	Trend Analysis 5-yr
MW-302R	pH, TURB (fid)	Na, SO4, Cl		OC	Spec Cond, Temp, Eh, DO, As, Ca, Cu, Mg, Mn, K, Na, TKN, NO3-N, TDS, TSS, SO4, HCO3, ALK (fid), OC, Cl, TANNIC (Cd, Fe, Ni, NH3-N, COD)	Spec Cond, pH, Temp, Eh, DO, As, Ca, Cu, Fe, Mg, Mn, Ni, K, TKN, NO3-N, TDS, TSS, HCO3, ALK (fid), COD, TURB (fid), TANNIC (Cd, NH3-N)
MW-303	Spec Cond, Ca, Mg, K, Na, TDS, HCO3, TURB (fid)	Spec Cond, As, Ca, Mg, K, Na, TDS, HCO3, ALK (fid), Cl, TURB (fid)		Eh, DO	pH, Temp, Eh, DO, As, Cd, Cu, Fe, Mn, Ni, TKN, NH3-N, NO3-N, TSS, SO4, ALK (fid), OC, COD, Cl, TANNIC	pH, Temp, Eh, DO, Cd, Cu, Fe, Mn, Ni, TKN, NH3-N, NO3-N, TSS, SO4, OC, COD, TANNIC
MW-304A	Mg, Na, TDS	As	Cl	SO4	Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Cu, Fe, Mn, K, TKN, NH3-N, TSS, SO4, HCO3, ALK (fid), TURB (fid), TANNIC (Ni, NO3-N, TDS, OC, COD)	Spec Cond, pH, Temp, Eh, DO, Cd, Ca, Cu, Fe, Mg, Ni, K, Na, TKN, NO3-N, TDS, TSS, HCO3, ALK (fid), OC, COD, Cl, TURB (fid), TANNIC (Mn, NH3-N)
MW-401A		As	Ca	Ca, SO4, OC	Spec Cond, pH, Temp, Eh, DO, As, Cd, Mg, K, Na, TKN, TDS, TSS, SO4, HCO3, ALK (fid), OC, Cl, TURB (fid), TANNIC (Cu, Fe, Mn, Ni, NH3-N, NO3-N, COD)	Spec Cond, pH, Temp, Eh, DO, Cd, Cu, Fe, Mg, Ni, K, Na, TKN, NO3-N, TDS, TSS, HCO3, ALK (fid), COD, Cl, TURB (fid), TANNIC (Mn, NH3-N)
MW-401B				Ca, Fe, Mg, Mn, SO4, OC, Cl	Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Fe, Mg, Mn, K, Na, TKN, TDS, TSS, SO4, HCO3, ALK (fid), OC, COD, Cl, TURB (fid), TANNIC (Cu, Ni, NH3-N, NO3-N)	Spec Cond, pH, Temp, Eh, DO, As, Cd, Cu, Ni, K, Na, TKN, NO3-N, TDS, TSS, HCO3, ALK (fid), COD, TURB (fid), TANNIC (NH3-N)
MW-402A		As		pH, OC	Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Cu, Mg, K, Na, TKN, NH3-N, TDS, TSS, SO4, HCO3, ALK (fid), OC, Cl, TURB (fid), TANNIC (Fe, Mn, Ni, NO3-N, COD)	Spec Cond, Temp, Eh, DO, Cd, Ca, Cu, Mg, K, Na, TKN, NH3-N, NO3-N, TDS, TSS, SO4, HCO3, ALK (fid), Cl, TURB (fid), TANNIC (Fe, Mn, Ni, COD)
MW-402B		As, TURB (fid)			Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Mg, Mn, K, Na, TKN, TDS, TSS, SO4, HCO3, ALK (fid), OC, Cl, TURB (fid), TANNIC (Cu, Fe, Ni, NH3-N, NO3-N, COD)	Spec Cond, pH, Temp, Eh, DO, Cd, Ca, Cu, Fe, Mg, Mn, Ni, K, Na, TKN, NH3-N, NO3-N, TDS, TSS, SO4, HCO3, ALK (fid), OC, Cl, TANNIC (COD)
P-04-02	Mn, K, Na, TKN, TDS, TSS	Mn, TDS, TSS, TURB (fid)		pH, Ca, Mg, HCO3	Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Cu, Fe, Mg, NH3-N, NO3-N, SO4, HCO3, ALK (fid), OC, COD, Cl, TURB (fid), TANNIC (Ni)	Spec Cond, Temp, Eh, DO, As, Cd, Cu, Fe, Ni, K, Na, TKN, SO4, ALK (fid), OC, COD, Cl, TANNIC (NH3-N, NO3-N)
P-04-04		TURB (fid)		Ca, K, HCO3	Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Mg, K, Na, TKN, NH3-N, TDS, TSS, SO4, HCO3, ALK (fid), OC, COD, Cl, TURB (fid), TANNIC (Cu, Fe, Mn, Ni, NO3-N)	Spec Cond, pH, Temp, Eh, DO, As, Cd, Cu, Fe, Mg, Ni, Na, TKN, NH3-N, NO3-N, TDS, TSS, SO4, ALK (fid), OC, COD, Cl, TANNIC (Mn)
PWS10-1		Insufficient Data	Spec Cond, As, Ca, K, Na, TDS, HCO3, Cl	Insufficient Data	pH, Temp, Eh, DO, Cd, Cu, Fe, Mg, Mn, Ni, NH3-N, P, TSS, SO4, ALK (fid), OC, COD, TURB (fid), TANNIC (NO3-N)	Insufficient Data

**Summary of Mann-Kendall Trend Analysis**  
**95% Confidence (alpha=0.05)**  
**Juniper Ridge Landfill 2012**

Location	Increasing Trends		Decreasing Trends		No Trends	
	Trend Analysis 3-yr	Trend Analysis 5-yr	Trend Analysis 3-yr	Trend Analysis 5-yr	Trend Analysis 3-yr	Trend Analysis 5-yr
PWS10-2	Cu	Insufficient Data	Cl	Insufficient Data	Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Fe, Mg, Mn, Ni, K, Na, NH3-N, NO3-N, P, TDS, TSS, SO4, HCO3, ALK (fld), OC, COD, TURB (fld), TANNIC	Insufficient Data
PWS10-3	Cu	Insufficient Data	Spec Cond, Ca, Mg, TDS, HCO3	Insufficient Data	pH, Temp, Eh, DO, As, Cd, Fe, Mn, K, Na, NH3-N, NO3-N, P, TSS, SO4, ALK (fld), OC, COD, Cl, TURB (fld), TANNIC (Ni)	Insufficient Data
SW-1		SO4	Na, Cl		Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Cu, Fe, Mg, Mn, Ni, K, NH3-N, P, TDS, TSS, SO4, HCO3, ALK (fld), OC, BOD5, COD, TURB (fld), TANNIC (NO3-N)	Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Cu, Fe, Mg, Mn, Ni, K, Na, NO3-N, P, TDS, TSS, HCO3, ALK (fld), OC, BOD5, COD, Cl, TURB (fld), TANNIC (NH3-N)
SW-2	Cu				Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Fe, Mg, Mn, Ni, K, Na, NH3-N, P, TDS, TSS, SO4, HCO3, ALK (fld), OC, BOD5, COD, Cl, TURB (fld), TANNIC	Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Cu, Fe, Mg, Mn, Ni, K, Na, NH3-N, NO3-N, P, TDS, TSS, SO4, HCO3, ALK (fld), OC, COD, Cl, TURB (fld), TANNIC (BOD5)
SW-3			Cl	Cl, TANNIC	Spec Cond, pH, Temp, Eh, DO, As, Ca, Cu, Fe, Mg, Mn, Ni, K, Na, NH3-N, P, TDS, TSS, SO4, HCO3, ALK (fld), OC, BOD5, COD, TURB (fld), TANNIC (Cd, NO3-N)	Spec Cond, pH, Temp, Eh, DO, As, Cd, Ca, Cu, Fe, Mg, Mn, Ni, K, Na, NH3-N, NO3-N, P, TDS, TSS, SO4, HCO3, ALK (fld), OC, COD, TURB (fld) (BOD5)
SW-DP1	P	Eh, Mn		Na, OC, COD, Cl	Spec Cond, pH, Temp, Eh, DO, As, Ca, Cu, Fe, Mg, Mn, Ni, K, Na, TDS, TSS, SO4, HCO3, ALK (fld), OC, COD, Cl, TURB (fld), TANNIC (Cd, NH3-N, NO3-N)	Spec Cond, pH, Temp, DO, As, Cd, Ca, Cu, Fe, Mg, Ni, K, NH3-N, NO3-N, P, TDS, TSS, SO4, HCO3, ALK (fld), TURB (fld), TANNIC
SW-DP6		Insufficient Data	Ca, Na, TDS, Cl	Insufficient Data	Spec Cond, pH, Temp, Eh, DO, As, Cd, Cu, Fe, Mg, Mn, Ni, K, NH3-N, NO3-N, P, TSS, SO4, HCO3, ALK (fld), OC, COD, TURB (fld), TANNIC	Insufficient Data

<p><b>Key</b>          ALK (fld) = Alkalinity (Ca CO3) (field)          COD = Chemical Oxygen Demand          NO3-N = Nitrate (N)          pH = pH          Spec Cond = Specific Conductance          Temp = Temperature          TURB (fld) = Turbidity (field)</p>	<p>ALK = Alkalinity (CaCO3)          Cl = Chloride          DO = Dissolved Oxygen          HCO3 = Bicarbonate (CaCO3)          OC = Organic Carbon          S = Sulfide          TANNIC = Tannin &amp; Lignins (Tannic Acid)          TKN = Total Kjeldahl Nitrogen</p>	<p>BOD5 = Biological Oxygen Demand          Eh = Corrected Eh          NH3-N = Ammonia (N)          P = Phosphate Phosphorus          SO4 = Sulfate          TDS = Total Dissolved Solids          TSS = Total Suspended Solids</p>
--	---	---

- Values below the laboratory PQL (non-detects) are divided by 2. All other data qualifiers are ignored but any associated value is used.
- Samples collected for data quality control are not analyzed.
- Data sets with less than 5 data points are not analyzed.

**Summary of Mann-Kendall Trend Analysis**  
**95% Confidence (alpha=0.05)**  
**Juniper Ridge Landfill 2012**

- Data sets with a period shorter than the intended period of analysis (e.g., 3-yr analysis or 5-yr analysis) are not analyzed.
- Significant events in historical data can affect the distribution in a way that compromises the assumption of a monotonic data set. Events could include the cessation of filtering, a spill, changing sampling protocols or analytical method changes that alter the detection limit.

Notes:

Parameters in parentheses and bold text were excluded from statistical screen due to all or most data values being non-detect with variable laboratory detection limits. These parameters were identified with statistically significant trends (95% confidence level), but are considered for the purposes of this analysis to have no discernible statistically significant trends.

Footnotes

1. Sufficient data for field parameters only.

REFERENCES:

State of Wisconsin, Department of Natural Resources, Remediation and Redevelopment Program Mann-Kendall Statistical Test, Form 4400-215 (2/2001).

Gilbert, R.O., Statistical Methods for Environmental Pollution Monitoring, Van Nostrand Reinhold, 1987, pp.204-240 and 272.

Hollander, M. and Wolfe, A.M., Nonparametric Statistical Methods, John Wiley Sons, 1999.

**APPENDIX E**

**DETECTED 2012 VOCs, SVOCs,  
PESTICIDES, HERBICIDES, AND PCBs  
FOR LEACHATE**

LOCATION (LF-UD-6)	PARAMETER NAME	DATE	CONCENTRATION/ QUALIFIER	UNITS	SAMPLE ID
LF-UD-6	Tetrachloroethene	4/24/2012	1.5	ug/L	LFUD6X539
LT-C4L	Acetone	4/24/2012	974	ug/L	LTC4LX51F
		7/24/2012	2460	ug/L	LTC4LX56E
		10/23/2012	2710	ug/L	LTC4LX5D5
	1,2-Dichloroethane	4/24/2012	10	ug/L	LTC4LX51F
		4/24/2012	3440	ug/L	LTC4LX51F
	Methyl Ethyl Ketone	7/24/2012	9540	ug/L	LTC4LX56E
		10/23/2012	7490	ug/L	LTC4LX5D5
	4-Methyl-2-Pentanone	7/24/2012	55	ug/L	LTC4LX56E
	Toluene	4/24/2012	13	ug/L	LTC4LX51F
		7/24/2012	6.8	ug/L	LTC4LX56E
	Ethylbenzene	4/24/2012	5.8	ug/L	LTC4LX51F
		4/24/2012	6.9	ug/L	LTC4LX51F
	m,p-Xylene	7/24/2012	5	ug/L	LTC4LX56E
4/24/2012		6.4	ug/L	LTC4LX51F	
Trichlorofluoromethane	4/24/2012	6.4	ug/L	LTC4LX51F	
	7/24/2012	35	ug/L	LTC4LX56E	

**Concentration Qualifier Notes:**

- F6 - No flow. Sample not taken.
- H2 - Waterlevel higher than pipes. See LF-COMP for readings

**APPENDIX F**

**2012 UNDERDRAIN AND LEAK DETECTION FIELD DATA**

**SUMMARY REPORT**

SEVIEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

**Underdrain and Leak Detection Field Data**

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
1/26/2012	XX	LFOMPX581	381	7.5	17	372	6	140	1.05	
2/24/2012	XX	LFOMPX589	366	7.5	13.7	371	5	145	0.91	
3/23/2012	XX	LFOMPX5A0								
4/16/2012	XX	LFOMPX5A8								
4/24/2012	XX	LFXXX58B	314	7.2	17.8	403	6	85	4.4	
5/3/2012	XX	LFOMPX5B2	400	7	18.7	446	6	140	11.82	
6/29/2012	XX	LFOMPX5B0	394	6.9	22.5	444	5	125	0.07	
7/31/2012	XX	LFOMPX5C4	389	7.3	29.7	383	8	150	0.33	
8/31/2012	XX	LFOMPX5F5	421	6.9	22.1	384	6	150	0.27	
9/27/2012	XX	LFOMPX5FG	373	7.3	21.2	348	8	150	0.14	
11/13/2012	XX	LFOMPX5G7	307	7.6	17.7	355	6	135	3.91	
12/31/2012	XX	LFOMPX5G1	306	7.7	11.4	406	8	130	5.27	

**LF-UD-1**

1/26/2012	XX	LFUD1X589	173	7.5	13.7	371	8	150	2.03	0.0006
2/24/2012	XX	LFUD1X591	382	7.4	15.3	371	5	150	2.23	0.0006
3/23/2012	XX	LFUD1X59C	349	7.2	16.7	399	6	150	0.22	0.0003
4/16/2012	XX	LFUD1X5A3	359	7	17.3	387	6	150	0.04	0.0006
4/24/2012	XX	LFUD1X525	H2	H2	H2	H2	H2	H2	H2	H2
5/3/2012	XX	LFUD1X5AE	364	7	16.7	438	8	150	0.79	0.0006
6/29/2012	XX	LFUD1X5B5	338	6.6	21.4	427	6	125	0.64	0.0006
7/24/2012	XX	LFUD1X574	355	6.5	20.4	316	6	200	1.8	0.0022
7/31/2012	XX	LFUD1X5B9	375	7.1	24.1	341	8	160	0.17	0.0003
8/31/2012	XX	LFUD1X5EH	384	6.7	21.1	343	5	135	0.32	0.0003
9/27/2012	XX	LFUD1X5F8	317	8.1	18.6	375	6	125	0.01	0.0003
10/23/2012	XX	LFUD1X5DF	F6	F6	F6	F6	F6	F6	F6	F6
11/13/2012	XX	LFUD1X5FJ	288	8	14.8	362	6	135	0.87	
12/31/2012	XX	LFUD1X5GA	290	7.7	10.6	409	8	120	0.72	

**LF-UD-2**

1/26/2012	XX	LFUD2X58A	297	8	16.8	357	8	115	0.37	0.0011
2/24/2012	XX	LFUD2X592	310	7.3	16.8	273	4	130	0.82	0.0011
3/23/2012	XX	LFUD2X58D	302	7.25	17.9	393	5	125	0.26	0.0011
4/16/2012	XX	LFUD2X5A4	311	7	20.9	391	6	130	0.18	0.0011
4/24/2012	XX	LFUD2X526	H2	H2	H2	H2	H2	H2	H2	H2
5/3/2012	XX	LFUD2X5A4F	318	6.9	18.5	458	6	115	0.1	0.0011
6/29/2012	XX	LFUD2X5B6	305	6.8	22.8	444	6	100	0.21	0.0011
7/24/2012	XX	LFUD2X575	316	6.8	22.6	495	5	225	1.5	0.0056
7/31/2012	XX	LFUD2X5B8	345	7.1	28.4	364	8	120	0.01	0.0011
8/31/2012	XX	LFUD2X5E1	368	6.8	22.6	349	6	125	0	0.0011
9/27/2012	XX	LFUD2X5F9	321	8.1	21.3	360	6	150	0.01	0.0006
10/23/2012	XX	LFUD2X5D0	307	7.1	14.3	518	5	100	1.2	0.0045
11/13/2012	XX	LFUD2X5G0	276	8	17.5	346	6	115	0.63	0.0011
12/31/2012	XX	LFUD2X5G8	293	7.7	13.7	399	6	115	0.72	0.0003

**LF-UD-3A,B**

1/26/2012	XX	LFXXX58D	H8							
2/24/2012	XX	LFXXX595	H8							
3/23/2012	XX	LFXXX59G	F6							

SEVEE & MAHER ENGINEERS, INC.  
4 BLANCHARD ROAD  
CUMBERLAND CENTER, ME 04021

SUMMARY REPORT

Underdrain and Leak Detection Field Data

REPORT PREPARED: 1/17/2013 14:13  
FOR: Juniper Ridge Landfill

(LF-UD-3A,B)

Specific Conductance  
µmhos/cm  
@25°C

pH

Temperature  
Degrees Celsius

Corrected Eh  
mV

Dissolved Oxygen  
mg/L

Alkalinity  
(CaCO3) (field)  
mg/L

Turbidity (field)  
NTU

Flow Rate  
cfs

Date

Type

Sample ID

Date	Type	Sample ID	Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
4/16/2012	XX	LFXXX6A7	F6	F6	F6	F6	F6	F6	F6	
4/24/2012	XX	LFXXX6B4	H2	H2	H2	H2	H2	H2	H2	
5/3/2012	XX	LFXXX6A1	H8	H8	H8	H8	H8	H8	H8	
6/29/2012	XX	LFXXX6B9	H8	H8	H8	H8	H8	H8	H8	
7/24/2012	XX	LFXXX6B1	F6	F6	F6	F6	F6	F6	F6	
7/31/2012	XX	LFXXX6C0	H8	H8	H8	H8	H8	H8	H8	
8/31/2012	XX	LFXXX6F1	H8	H8	H8	H8	H8	H8	H8	
9/27/2012	XX	LFXXX6FC	H8	H8	H8	H8	H8	H8	H8	
10/23/2012	XX	LFXXX6EC	F6	F6	F6	F6	F6	F6	F6	
11/13/2012	XX	LFXXX6G3	H8	H8	H8	H8	H8	H8	H8	
12/31/2012	XX	LFXXX6GE	H8	H8	H8	H8	H8	H8	H8	

LF-UD-4

1/26/2012	XX	LFUDA69F	H2	H2	H2	H2	H2	H2	H2	H2
2/24/2012	XX	LFUDA696	H8	H8	H8	H8	H8	H8	H8	H8
3/23/2012	XX	LFUDA69H	444	7.3	17.3	395	5	200	0.29	0.0006
4/16/2012	XX	LFUDA6A8	437	7.2	20.7	390	8	200	0.32	0.0011
4/24/2012	XX	LFXXX636	H2	H2	H2	H2	H2	H2	H2	H2
5/3/2012	XX	LFUDA6AJ	H2	H2	H2	H2	H2	H2	H2	H2
6/29/2012	XX	LFUDA6BA	H8	H8	H8	H8	H8	H8	H8	H8
7/24/2012	XX	LFXXX6B2	434	6.9	23.2	488	6	300	1.2	0.0045
7/31/2012	XX	LFUDA6C1	487	7.3	30.7	403	8	140	0.19	0.0006
8/31/2012	XX	LFUDA6F2	485	6.9	22.6	375	5	200	0.11	0.0006
9/27/2012	XX	LFUDA6FD	447	7.9	21	375	6	170	0.03	0.0006
10/23/2012	XX	LFXXX6CA	382	7	16.2	571	5	150	1.6	0.0022
11/13/2012	XX	LFUDA6G4	387	7.8	17.3	355	6	200	0.85	0.0003
12/31/2012	XX	LFUDA6GF	416	7.8	12.1	358	6	165	0.49	0.0003

LF-UD-Sand6

1/26/2012	XX	LFXXX68G	473	8.3	11.9	359	8	150	14.95	
2/24/2012	XX	LFXXX697	460	8.1	15.2	348	5	175	3.16	
3/23/2012	XX	LFXXX69I	486	7.8	16.6	382	6	190	1.58	
4/16/2012	XX	LFXXX6A9	487	8	22.8	357	6	200	6.06	
4/24/2012	XX	LFXXX637	389	7.4	18.8	427	6	95	4.6	
5/3/2012	XX	LFXXX6B0	491	8	17.4	370	8	160	1.16	
6/29/2012	XX	LFXXX6BB	473	7.2	23.1	416	6	175	0.55	
7/24/2012	XX	LFXXX6B4	482	7.3	22.4	417	6	260	3	
7/31/2012	XX	LFXXX6C2	500	7.5	23.6	355	6	200	0.13	
8/31/2012	XX	LFXXX6F3	514	7.3	21.5	317	6	200	0.12	
9/27/2012	XX	LFXXX6FE	407	7.9	18	354	6	170	30.88	
10/23/2012	XX	LFXXX6C7	488	7.3	14.5	423	4	160	6.7	
11/13/2012	XX	LFXXX6G5	378	7.3	16.8	390	7	175	0.2	
12/31/2012	XX	LFXXX6GG	388	8.3	10.7	303	8	125	1.48	0.0003

LF-UD-6

1/26/2012	XX	LFUD6X58H	580	7.4	14.7	379	4	175	5.54	
2/24/2012	XX	LFUD6X586	559	7.3	15.3	375	5	250	27.87	
3/23/2012	XX	LFUD6X58J	556	7.5	16.4	387	5	205	13.84	
4/16/2012	XX	LFUD6X5AA	557	7.2	21.6	381	7	250	2.47	
4/24/2012	XX	LFUD6X539	431	7.4	16.8	490	4	105	4.2	
5/3/2012	XX	LFUD6X5B1	580	7.2	17.2	390	8	280	5.72	

**SUMMARY REPORT**

**Underdrain and Leak Detection Field Data**

<b>(LF-UD-6)</b>		Specific Conductance µmhos/cm @25°C	pH	Temperature Degrees Celsius	Corrected Eh mV	Dissolved Oxygen mg/L	Alkalinity (CaCO3) (field) mg/L	Turbidity (field) NTU	Flow Rate cfs
Date	Type	Sample ID							
6/29/2012	XX	LFUD6X9BC	611	19.7	415	6	250	11.23	
7/24/2012	XX	LFUD6X986	675	20.3	409	5	360	4	0.0022
7/31/2012	XX	LFUD6X9C3	733	20.05	352	6	275	0.3	
8/31/2012	XX	LFUD6X9F4	773	19.3	329	4	175	0.98	
9/27/2012	XX	LFUD6X9FF	748	17.2	372	5	165	0.57	
10/23/2012	XX	LFUD6X9C9	762	13.7	443	5	240	0.8	0.0022
11/13/2012	XX	LFUD6X9G6	748	16.8	377	5	250	1.5	
12/31/2012	XX	LFUD6X9GH	720	14.7	362	6	250	0.82	
<b>LF-UD-7</b>									
1/26/2012	XX	LFUD7X990	H8	H8	H8	H8	H8	H8	
2/24/2012	XX	LFUD7X98B	H8	H8	H8	H8	H8	H8	
3/23/2012	XX	LFUD7X9A2	F6	F6	F6	F6	F6	F6	
4/16/2012	XX	LFUD7X9AD	F6	F6	F6	F6	F6	F6	
4/24/2012	XX	LFUD7X93A	H2	H2	H2	H2	H2	H2	
5/3/2012	XX	LFUD7X984	H2	H2	H2	H2	H2	H2	
6/29/2012	XX	LFUD7X98F	H8	H8	H8	H8	H8	H8	
7/24/2012	XX	LFXX9X987	F6	F6	F6	F6	F6	F6	
7/31/2012	XX	LFUD7X9C6	H8	H8	H8	H8	H8	H8	
8/31/2012	XX	LFUD7X9F7	H8	H8	H8	H8	H8	H8	
9/27/2012	XX	LFUD7X9F1	H8	H8	H8	H8	H8	H8	
10/23/2012	XX	LFXX9X9EF	F6	F6	F6	F6	F6	F6	
11/13/2012	XX	LFUD7X9G9	H8	H8	H8	H8	H8	H8	
12/31/2012	XX	LFUD7X9GJ	H8	H8	H8	H8	H8	H8	
<b>LP-COMP</b>									
1/26/2012	XX	LPOMPX98J	315	7.6	371	6	110	1.47	
2/24/2012	XX	LPOMPX99A	323	7.8	354	8	125	1.74	
3/23/2012	XX	LPOMPX9A1	320	7.6	360	6	125	0.39	
4/16/2012	XX	LPOMPX9AC	331	7.3	377	6	150	0.48	
5/3/2012	XX	LPOMPX9B3	324	7.4	395	10	120	0.42	
7/31/2012	XX	LPOMPX9C5	355	7	363	8	125	0.79	
<b>LP-LD-1</b>									
4/24/2012	XX	LPD1X929	184	7	383	6	65	2	
7/24/2012	XX	LPD1X978	206	15.4	381	5	110	2.1	
10/23/2012	XX	LPD1X9DJ	123	13.2	411	5	100	1.5	
<b>LP-UD-1</b>									
1/26/2012	XX	LPUD1X98B	H9	H9	H9	H9	H9	H9	
2/24/2012	XX	LPUD1X993	H9	H9	H9	H9	H9	H9	
3/23/2012	XX	LPUD1X99E	H9	H9	H9	H9	H9	H9	
4/16/2012	XX	LPUD1X9A5	H5	H5	H5	H5	H5	H5	
4/24/2012	XX	LPUD1X9Z7	F6	F6	F6	F6	F6	F6	
5/3/2012	XX	LPUD1X9AG	H9	H9	H9	H9	H9	H9	
6/29/2012	XX	LPUD1X9B7	F6	F6	F6	F6	F6	F6	
7/24/2012	XX	LPUD1X976	F6	F6	F6	F6	F6	F6	
7/31/2012	XX	LPUD1X9BI	H9	H9	H9	H9	H9	H9	
8/31/2012	XX	LPUD1X9EJ	F6	F6	F6	F6	F6	F6	
9/27/2012	XX	LPUD1X9FA	F6	F6	F6	F6	F6	F6	
10/23/2012	XX	LPUD1X9DH	F6	F6	F6	F6	F6	F6	

REPORT PREPARED: 1/17/2013 14:13  
 FOR: Juniper Ridge Landfill

**SUMMARY REPORT**

Page 4 of 4  
 SEVEE & MAHER ENGINEERS, INC.  
 4 BLANCHARD ROAD  
 CUMBERLAND CENTER, ME 04021

**Underdrain and Leak Detection Field Data**

Date	Type	Sample ID	Specific Conductance	pH	Temperature	Corrected Eh	Dissolved Oxygen	Alkalinity (CaCO3) (field)	Turbidity (field)	Flow Rate
			µmhos/cm @25°C	Standard Units	Degrees Celsius	mV	mg/L	mg/L	NTU	cfs
11/13/2012	XX	LPUD1X6G1	F6	F6	F6	F6	F6	F6	F6	
12/31/2012	XX	LPUD1X6GC	F6	F6	F6	F6	F6	F6	F6	
<b>LP-UD-2</b>										
1/26/2012	XX	LPUD2X6BC	H5	H5	H5	H5	H5	H5	H5	H5
2/24/2012	XX	LPUD2X694	H5	H5	H5	H5	H5	H5	H5	H5
3/23/2012	XX	LPUD2X69F	H5	H5	H5	H5	H5	H5	H5	H5
4/16/2012	XX	LPUD2X6A6	F6	F6	F6	F6	F6	F6	F6	F6
4/24/2012	XX	LPUD2X628	200	6.9	10.3	409	6	100	2.5	
5/3/2012	XX	LPUD2X6AH	322	7.6	16.6	373	8	130	0.27	
6/29/2012	XX	LPUD2X6B8	287	7	17.21	422	6	100	1.23	0.0006
7/24/2012	XX	LPUD2X677	110	6.7	18.9	468	6	185	3	0.0033
7/31/2012	XX	LPUD2X6BJ	338	7	20.3	360	6	130	0.14	0.0011
8/31/2012	XX	LPUD2X6F0	342	6.6	19	298	7	125	0.23	0.0003
9/27/2012	XX	LPUD2X6FB	196	6.8	17.6	368	6	115	0.39	0.0003
10/23/2012	XX	LPUD2X6DI	272	6.8	14.1	453	4	105	1.3	0.0033
11/13/2012	XX	LPUD2X6G2	272	7.2	12.5	364	6	125	0.36	0.0003
12/31/2012	XX	LPUD2X6GD	286	7.4	7.6	350	8	110	0.64	0.0006

**Notes:**  
 TYPE - Sample Type Qualifier where D = Duplicate Sample.  
 Blank Cells appear when a parameter was not analyzed.

**Concentration Qualifier Notes:**

- F6 - No flow. Sample not taken.
- H2 - Waterlevel higher than pipes. See LF-COMP for readings
- H5 - Waterlevel higher than pipes. See LP-COMP for readings
- H8 - No flow from pipe. See LF-COMP for readings
- H9 - No flow from pipe. See LP-COMP for readings
- I - The sampling location yielded insufficient quantity to collect a sample.

**APPENDIX G**

**SUMMARY OF LEACHATE POND UNDERDRAIN  
AVERAGE DAILY SPECIFIC CONDUCTANCE  
MEASUREMENTS**

2012 LEACHATE POND UNDERDRAIN DAILY  
AVERAGE SPECIFIC CONDUCTANCE

Date	Leachate Pond Underdrain Specific Conductance (µmhos/cm)
1/1/2012	158
1/2/2012	160
1/3/2012	160
1/4/2012	159
1/5/2012	161
1/6/2012	156
1/7/2012	156
1/8/2012	160
1/9/2012	156
1/10/2012	165
1/11/2012	170
1/12/2012	173
1/13/2012	165
1/14/2012	164
1/15/2012	163
1/16/2012	161
1/17/2012	157
1/18/2012	157
1/19/2012	166
1/20/2012	155
1/21/2012	159
1/22/2012	165
1/23/2012	158
1/24/2012	128
1/25/2012	144
1/26/2012	144
1/27/2012	155
1/28/2012	150
1/29/2012	144
1/30/2012	144
1/31/2012	145
2/1/2012	145
2/2/2012	146
2/3/2012	159
2/4/2012	168
2/5/2012	168
2/6/2012	168
2/7/2012	165
2/8/2012	169
2/9/2012	169
2/10/2012	171
2/11/2012	176

2/12/2012	179
2/13/2012	169
2/14/2012	167
2/15/2012	167
2/16/2012	166
2/17/2012	158
2/18/2012	167
2/19/2012	165
2/20/2012	167
2/21/2012	165
2/22/2012	161
2/23/2012	147
2/24/2012	162
2/25/2012	160
2/26/2012	161
2/27/2012	160
2/28/2012	163
2/29/2012	163
3/1/2012	179
3/2/2012	177
3/3/2012	168
3/4/2012	164
3/5/2012	141
3/6/2012	154
3/7/2012	153
3/8/2012	154
3/9/2012	148
3/10/2012	148
3/11/2012	149
3/12/2012	154
3/13/2012	158
3/14/2012	165
3/15/2012	168
3/16/2012	154
3/17/2012	166
3/18/2012	162
3/19/2012	172
3/20/2012	185
3/21/2012	179
3/22/2012	182
3/23/2012	162
3/24/2012	164
3/25/2012	168
3/26/2012	169
3/27/2012	169
3/28/2012	161
3/29/2012	166
3/30/2012	167

3/31/2012	160
4/1/2012	164
4/2/2012	160
4/3/2012	163
4/4/2012	166
4/5/2012	172
4/6/2012	168
4/7/2012	173
4/8/2012	170
4/9/2012	171
4/10/2012	169
4/11/2012	167
4/12/2012	165
4/13/2012	165
4/14/2012	166
4/15/2012	175
4/16/2012	188
4/17/2012	197
4/18/2012	183
4/19/2012	173
4/20/2012	172
4/21/2012	163
4/22/2012	162
4/23/2012	162
4/24/2012	152
4/25/2012	140
4/26/2012	144
4/27/2012	144
4/28/2012	144
4/29/2012	137
4/30/2012	139
5/1/2012	143
5/2/2012	162
End of recordings due to MEDEP approved change in operation (underdrain now day-lighted and water not held for monitoring)	

**APPENDIX H**

**2012 AND HISTORICAL GAS MEASUREMENT DATA**

Date	Methane Equivalent % Vol.	Methane Equivalent (Ambient) % Vol.	Hydrogen Sulfide ppm	Hydrogen Sulfide (Ambient) ppm	Oxygen % Vol.	Carbon Dioxide % Vol.
------	------------------------------	--	-------------------------	-----------------------------------	------------------	--------------------------

**DP-4**

DP-4 is located downgradient of the landfill and leachate pond and monitors groundwater quality within the overburden.

5/5/2004	0.1 US					
8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1		0		20.3	
8/1/2005	0.1 US		0		20.3	
9/20/2005	0.1 US		0		20.8	
12/27/2005	0.1 US		0		21	0
5/22/2006	0.1 US		0		21.1	0
7/26/2006	0.1 US		0		20.7	0
9/11/2006	0.1 US		0		19.7	0
10/4/2006	0.1 US		0		18.6	0
5/15/2007	0.1 US		0		20.6	0
7/25/2007	0.1 US		0		20.2	0
9/10/2007	0.1 US		0		20.3	0
5/19/2008	0.1 US		0		21.1	0
7/29/2008	0.1 US		0		21	0
10/29/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		21	0
7/6/2009	0.1 US		0		20.6	0
10/26/2009	0.1 US		0		20.4	0
4/26/2010	0.1 US		0		19.8	0
7/19/2010	0.1 US		0		20.4	0
10/18/2010	0.1 US	0.1 US	0	0	21.2	0
4/25/2011	0.1 US	0.1 US	0	0	20.7	0
7/18/2011	0.1 US	0.1 US	0	0	20.3	0
10/24/2011	0.1 US	0.1 US	0	0	20.8	0
4/25/2012	0.1 US	0.1 US	0	0	20.4	0
7/25/2012	0.1 US	0.1 US	0	0	20.7	0
10/24/2012	0.1 US	0.1 US	0	0	20.9	0

**LF-UD**

Manhole

8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1		0		20.7	
8/1/2005	0.1 US		0		19.8	
9/21/2005	0.1 US		0		20.6	
12/27/2005	0.1 US		0		20.9	0
5/22/2006	0.1 US		0		20.5	0
7/26/2006	0.1 US		0		20	0
9/11/2006	0.1 US		0		20.5	0
10/4/2006	0.1 US		0		18.6	0
5/15/2007	0.1 US		0		20.2	0
7/25/2007	0.1 US		0		20.3	0
9/10/2007	0.1 US		0		20.3	0
5/20/2008	0.1 US		0		21.1	0
7/28/2008	0.1 US		0		19.9	0
10/29/2008	0.1 US		0		M	0
4/15/2009	0.1 US		0		20.4	0
7/7/2009	0.1 US		0		20.6	0
10/27/2009	0.1 US		0		20.2	0

Date	Methane Equivalent	Methane Equivalent (Ambient)	Hydrogen Sulfide	Hydrogen Sulfide (Ambient)	Oxygen	Carbon Dioxide
	% Vol.	% Vol.	ppm	ppm	% Vol.	% Vol.

**LF-UD**

Manhole

4/27/2010	0.1 US		0		20.5	0
7/21/2010	0.1 US		0		20.1	0
10/19/2010	0.1 US	0.1 US	0	0	21	0
4/26/2011	0.1 US	0.1 US	0	0	20.8	0
7/19/2011	0.1 US	0.1 US	0	0	19.8	0
10/26/2011	0.1 US	0.1 US	0	0	20.6	0
4/24/2012	0.1 US	0.1 US	0	0	20.5	0
7/24/2012	0.1 US	0.1 US	0	0	20.2	0
10/23/2012	0.1 US	0.1 US	0	0	21.1	0

**LP-LD**

Manhole

8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1		0		20.7	
8/1/2005	0.1 US		0		20.2	
9/21/2005	0.1 US		0		20.8	
12/27/2005	0.1 US		0		20.8	0
5/22/2006	0.1 US		0		20.5	0
7/26/2006	0.1 US		0		20	0
9/11/2006	0.1 US		0		20.5	0
10/4/2006	0.1 US		0		18.6	0
5/15/2007	0.1 US		0		20.2	0
7/25/2007	0.1 US		0		20.4	0
9/10/2007	0.1 US		0		20.3	0
5/20/2008	0.1 US		0		20.9	0
7/28/2008	0.1 US		0		20.8	0
10/29/2008	0.1 US		0		M	0
4/15/2009	0.1 US		0		19.8	0
7/7/2009	0.1 US		0		20.6	0
10/27/2009	0.1 US		0		20.1	0
4/27/2010	0.1 US		0		20.6	0
7/19/2010	0.1 US		0		20.4	0
10/19/2010	0.1 US	0.1 US	0	0	21	0
4/26/2011	0.1 US	0.1 US	0	0	20.8	0
7/19/2011	0.1 US	0.1 US	0	0	19.9	0
10/26/2011	0.1 US	0.1 US	0	0	20.6	0
4/24/2012	0.1 US	0.1 US	0	0	20.3	0
7/24/2012	0.1 US	0.1 US	0	0	20.7	0
10/23/2012	0.1 US	0.1 US	0	0	20.9	0

**LP-UD**

LP-UD is a composite sample from the leachate pond underdrain.

8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1 US		0		20.7	
8/1/2005	0.1 US		0		19.8	
9/21/2005	0.1 US		0		20.8	
12/27/2005	0.1 US		0		20.8	0
5/22/2006	0.1 US		0		20.9	0
7/26/2006	0.1 US		0		20	0
9/11/2006	0.1 US		0		20.6	0
10/4/2006	0.1 US		0		18.3	0

Date	Methane Equivalent % Vol.	Methane Equivalent (Ambient) % Vol.	Hydrogen Sulfide ppm	Hydrogen Sulfide (Ambient) ppm	Oxygen % Vol.	Carbon Dioxide % Vol.
------	------------------------------	---	-------------------------	--------------------------------------	------------------	--------------------------

**LP-UD**

LP-UD is a composite sample from the leachate pond underdrain.

5/15/2007	0.1 US		0		20.2	0
7/25/2007	0.1 US		0		20.3	0
9/10/2007	0.1 US		0		20.3	0
5/20/2008	0.1 US		0		20.9	0
7/28/2008	0.1 US		0		19.8	0
10/29/2008	0.1 US		0		M	0
4/15/2009	0.1 US		0		20.3	0
7/7/2009	0.1 US		0		20.7	0
10/27/2009	0.1 US		0		20.1	0
4/27/2010	0.1 US		0		20.1	0
7/21/2010	0.1 US		0		20.6	0
10/19/2010	0.1 US	0.1 US	0	0	21	0
4/26/2011	0.1 US	0.1 US	0	0	20.8	0
7/19/2011	0.1 US	0.1 US	0	0	20	0
10/26/2011	0.1 US	0.1 US	0	0	20.7	0
4/24/2012	0.1 US	0.1 US	0	0	20.5	0
7/24/2012	0.1 US	0.1 US	0	0	20.7	0
10/23/2012	0.1 US	0.1 US	0	0	21.2	0

**LT-C4L**

Cell #4 leachate collection location.

4/14/2009	0.1 US		0		21.2	0
7/7/2009	0.1 US		0		20.7	0
10/28/2009	0.1 US		0		20.2	0
4/27/2010	0.1 US		0		20.5	0
7/21/2010	0.1 US		0		20.1	0
10/19/2010	0.1 US	0.1 US	0	0	21.4	0
4/27/2011	0.1 US	0.1 US	0	0	20.8	0
7/19/2011	0.1 US	0.1 US	0	0	20.3	0
10/25/2011	0.1 US	0.1 US	0	0	20.2	0
4/24/2012	0.1 US	0.1 US	0	0	20.3	0
7/25/2012	0.1 US	0.1 US	0	0	20.7	0
10/23/2012	0.1 US	0.1 US	0	0	21.1	0

**MW04-102**

MW04-102 monitors groundwater in the overburden downgradient of the landfill and upgradient of Stormwater Detention Pond-1.

3/25/2005	0.1 US					
7/25/2005	0.1 US		0		20.5	
9/20/2005	0.1 US		4		20.6	
12/27/2005	0.1 US		0		20.7	0
5/22/2006	0.1 US		0		20.7	0
7/26/2006	0.1 US		0		20.4	0
9/11/2006	0.1 US		0		20.7	0
10/4/2006	0.1 US		0		19.8	0
5/15/2007	0.1 US		0		19.8	0
7/25/2007	0.1 US		0		20.5	0
9/10/2007	0.1 US		0		20.3	0
5/20/2008	0.1 US		0		21.2	0
7/29/2008	0.1 US		0		20.8	0
10/27/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		19.7	0
7/7/2009	0.1 US		0		20.6	0
10/27/2009	0.1 US		0		20.7	0

Date	Methane Equivalent % Vol.	Methane Equivalent (Ambient) % Vol.	Hydrogen Sulfide ppm	Hydrogen Sulfide (Ambient) ppm	Oxygen % Vol.	Carbon Dioxide % Vol.
------	------------------------------	--	-------------------------	-----------------------------------	------------------	--------------------------

**MW04-102**

MW04-102 monitors groundwater in the overburden downgradient of the landfill and upgradient of Stormwater Detention Pond-1.

4/27/2010	0.1 US		0		20.8	0
7/21/2010	0.1 US		0		20.1	0
10/19/2010	0.1 US	0.1 US	0	0	21.1	0
4/25/2011	0.1 US	0.1 US	0	0	21.1	0
7/19/2011	0.1 US	0.1 US	0	0	20.2	0
10/25/2011	0.1 US	0.1 US	0	0	21	0
4/25/2012	0.1 US	0.1 US	0	0	20.3	0
7/23/2012	0.1 US	0.1 US	0	0	20.2	0
10/22/2012	0.1 US	0.1 US	0	0	21.2	0

**MW04-105**

MW04-105 monitors groundwater in the overburden downgradient of the landfill and Stormwater Detention Pond-1.

3/25/2005	0.1 US					
7/25/2005	0.1 US		0		20.1	
9/20/2005	0.1 US		9		20.9	
12/27/2005	0.1 US		0		20.9	0
5/22/2006	0.1 US		0		20.8	0
7/26/2006	0.1 US		0		20.3	0
9/11/2006	0.1 US		0		20.2	0
10/4/2006	0.1 US		0		19.7	0
5/15/2007	0.1 US		0		21.3	0
7/25/2007	0.1 US		0		20.5	0
9/10/2007	0.1 US		0		20.3	0
5/19/2008	0.1 US		0		21	0
7/29/2008	0.1 US		0		20.9	0
10/27/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		20	0
7/6/2009	0.1 US		0		19.8	0
10/26/2009	0.1 US		0		20.6	0
4/27/2010	0.1 US		0		20.7	0
7/19/2010	0.1 US		0		20.5	0
10/18/2010	0.1 US	0.1 US	0	0	21.2	0
4/26/2011	0.1 US	0.1 US	0	0	20.9	0
7/18/2011	0.1 US	0.1 US	0	0	20.2	0
10/25/2011	0.1 US	0.1 US	0	0	21	0
4/25/2012	0.1 US	0.1 US	0	0	20.3	0
7/23/2012	0.1 US	0.1 US	0	0	20.2	0
10/22/2012	0.1 US	0.1 US	0	0	21.1	0

**MW04-109**

MW04-109 monitors groundwater in the overburden downgradient of the landfill and Stormwater Detention Pond-2.

3/25/2005	0.1 US					
7/26/2005	0.1 US		0		19.2	
9/20/2005	0.1 US		5		20.9	
12/27/2005	0.1 US		0		20.8	0
5/22/2006	0.1 US		0		20.8	0
7/26/2006	0.1 US		0		20.5	0
9/11/2006	0.1 US		0		19.5	0
10/4/2006	0.1 US		0		19.8	0
5/15/2007	0.1 US		0		20.1	0
7/25/2007	0.1 US		0		20.6	0
9/10/2007	0.1 US		0		20.3	0

Date	Methane Equivalent % Vol.	Methane Equivalent (Ambient) % Vol.	Hydrogen Sulfide ppm	Hydrogen Sulfide (Ambient) ppm	Oxygen % Vol.	Carbon Dioxide % Vol.
------	------------------------------	--	-------------------------	-----------------------------------	------------------	--------------------------

**MW04-109**

MW04-109 monitors groundwater in the overburden downgradient of the landfill and Stormwater Detention Pond-2.

5/19/2008	0.1 US		0		20.9	0
7/29/2008	0.1 US		0		20.9	0
10/28/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		19.9	0
7/6/2009	DE		DE		DE	DE

**MW04-109R**

MW04-109R is located to the south of Cell #5 of the expansion landfill and near Manhole #5. This well monitors water quality within the overburden downgradient of the landfill.

4/27/2010	0.1 US		0		20.8	0
7/20/2010	0.1 US		0		20.4	0
10/19/2010	0.1 US	0.1 US	0	0	21.3	0
4/26/2011	0.1 US	0.1 US	0	0	21	0
7/19/2011	0.1 US	0.1 US	0	0	20.4	0
10/25/2011	0.1 US	0.1 US	0	0	20.3	0
4/25/2012	0.1 US	0.1 US	0	0	20.3	0
7/23/2012	0.1 US	0.1 US	0	0	20.4	0
10/23/2012	0.1 US	0.1 US	0	0	21.2	0

**MW09-901**

MW09-901 is located to the south of Cell #5 and detention pond #2 of the expansion landfill. This well monitors water quality within the overburden downgradient of the landfill.

4/27/2010	0.1 US		0		20.7	0
7/20/2010	0.1 US		0		20.3	0
10/19/2010	0.1 US	0.1 US	0	0	21.3	0
4/26/2011	0.1 US	0.1 US	0	0	21	0
7/19/2011	0.1 US	0.1 US	0	0	20.2	0
10/25/2011	0.1 US	0.1 US	0	0	21	0
4/25/2012	0.1 US	0.1 US	0	0	20.3	0
7/23/2012	0.1 US	0.1 US	0	0	20.3	0
10/23/2012	0.1 US	0.1 US	0	0	21.1	0

**MW11-207R**

MW11-207R monitors bedrock groundwater quality upgradient of the landfill. This well replaced MW-207.

7/20/2011	0.1 US	0.1 US	0	0	20.2	0
10/24/2011	0.1 US	0.1 US	0	0	20.8	0
4/25/2012	0.1 US	0.1 US	0	0	20.3	0
7/23/2012	0.1 US	0.1 US	0	0	20.1	0
10/22/2012	0.1 US	0.1 US	0	0	21.2	0

**MW12-303R**

MW12-303R was installed in September 2012 to replace MW-303.

10/22/2012	0.1 US	0.1 US	0	0	21.1	0
------------	--------	--------	---	---	------	---

**MW-204**

MW-204 monitors the overburden water quality downgradient from the landfill.

5/5/2004	0.1 US					
8/4/2004	23					
10/27/2004	0.1 US					
5/9/2005	0.1		0		20.3	
8/1/2005	0.1 US		0		20.1	
9/20/2005	0.1 US		0		20.8	
12/27/2005	0.1 US		0		20.9	0
5/22/2006	0.1 US		0		20.9	0
7/26/2006	0.9		0		19.7	1.7
9/11/2006	0.1 US		0		18.9	0
10/4/2006	0.1 US		0		19.1	0

Date	Methane Equivalent % Vol.	Methane Equivalent (Ambient) % Vol.	Hydrogen Sulfide ppm	Hydrogen Sulfide (Ambient) ppm	Oxygen % Vol.	Carbon Dioxide % Vol.
------	------------------------------	--	-------------------------	-----------------------------------	------------------	--------------------------

**MW-204**

MW-204 monitors the overburden water quality downgradient from the landfill.

5/15/2007	0.1 US		0		20.8	0
7/25/2007	0.1 US		0		20.2	0
9/10/2007	0.1 US		0		20.4	0
5/21/2008	0.1 US		0		20.4	0
7/30/2008	0.8		0		18.7	1.9
10/28/2008	5.3		0		M	2.9
4/13/2009	0.1 US		0		20.9	0
7/6/2009	0.1 US		0		19.7	0
10/26/2009	0.1 US		0		20.6	0
4/27/2010	0.1 US		0		20.5	0
7/19/2010	0.1 US		0		20.4	0
10/19/2010	0.1 US	0.1 US	0	0	21.2	0
4/27/2011	0.1 US	0.1 US	0	0	20.9	0
7/19/2011	0.1 US	0.1 US	0	0	20.4	0
10/25/2011	0.1 US	0.1 US	0	0	20	0
4/25/2012	0.1 US	0.1 US	0	0	20.2	0
7/23/2012	0.1 US	0.1 US	0	0	20.4	0
10/24/2012	0.1 US	0.1 US	0	0	20.9	0

**MW-206**

MW-206 monitors overburden water quality upgradient of the landfill.

5/5/2004	0.1 US					
8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1 US		0		21.6	
8/1/2005	0.1 US		0		20.3	
9/19/2005	0.1 US		5		20.5	
12/27/2005	0.1 US		0		20.7	0
5/22/2006	0.1 US		0		20.8	0
7/26/2006	0.1 US		0		20.4	0
9/11/2006	0.1 US		0		20.3	0
10/4/2006	0.1 US		0		19.2	0
5/15/2007	0.1 US		0		20.1	0
7/25/2007	0.1 US		0		20.6	0
9/10/2007	0.1 US		0		20.2	0
5/20/2008	0.1 US		0		20.1	0
7/29/2008	0.1 US		0		20.9	0
10/27/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		20	0
7/6/2009	0.1 US		0		19.7	0
10/28/2009	0.1 US		0		20.7	0
4/26/2010	0.1 US		0		20.4	0
7/19/2010	0.1 US		0		20	0
10/18/2010	0.1 US	0.1 US	0	0	21.1	0
4/25/2011	0.1 US	0.1 US	0	0	20.4	0
7/18/2011	0.1 US	0.1 US	0	0	20.5	0
10/24/2011	0.1 US	0.1 US	0	0	20.6	0
4/25/2012	0.1 US	0.1 US	0	0	20.3	0
7/23/2012	0.1 US	0.1 US	0	0	20.2	0
10/22/2012	0.1 US	0.1 US	0	0	21.1	0

**MW-207**

MW-207 monitors bedrock groundwater quality upgradient of the landfill.

Date	Methane Equivalent % Vol.	Methane Equivalent (Ambient) % Vol.	Hydrogen Sulfide ppm	Hydrogen Sulfide (Ambient) ppm	Oxygen % Vol.	Carbon Dioxide % Vol.
------	------------------------------	--	-------------------------	-----------------------------------	------------------	--------------------------

**MW-207**

MW-207 monitors bedrock groundwater quality upgradient of the landfill.

5/5/2004	0.1 US					
8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1 US		0		20.2	
8/1/2005	0.1 US		0		20.4	
9/19/2005	0.1 US		0		20.6	
12/27/2005	0.1 US		0		20.6	0
5/22/2006	0.1 US		0		21.1	0
7/26/2006	0.1 US		0		20.6	0
9/11/2006	0.1 US		0		19.9	0
10/4/2006	0.1 US		0		19.2	0
5/15/2007	0.1 US		0		20.7	0
7/25/2007	0.1 US		0		20.1	0.5
9/10/2007	0.1 US		0		20.2	0
5/19/2008	0.1 US		0		20.4	0
7/29/2008	0.1 US		0		20.8	0
10/28/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		20.1	0
7/6/2009	0.1 US		0		19.7	0
10/26/2009	0.1 US		0		20.6	0
4/26/2010	0.1 US		0		20.2	0
7/19/2010	0.1 US		0		20	0
10/18/2010	0.1 US	0.1 US	0	0	21.1	0
4/25/2011	0.1 US	0.1 US	0	0	20.2	0

**MW-212**

MW-212 monitors the overburden groundwater upgradient of the landfill.

5/5/2004	0.1 US					
8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1 US		0		20.2	
8/1/2005	0.1 US		0		20.3	
9/20/2005	0.1 US		0		20.7	
12/27/2005	0.1 US		0		20.6	0
5/22/2006	0.1 US		0		21.1	0
7/26/2006	0.1 US		0		19.5	0.5
9/11/2006	0.1 US		0		19.8	0
10/4/2006	0.1 US		0		19.3	0
5/15/2007	0.1 US		0		22.1	0
7/25/2007	0.1 US		0		20.6	0
9/10/2007	0.1 US		0		20.3	0
5/19/2008	0.1 US		0		20.4	0
7/29/2008	0.1 US		0		20.8	0
10/28/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		20.2	0
7/6/2009	0.1		0		19.3	0.6
10/26/2009	0.1 US		0		20.5	0
4/26/2010	0.1 US		0		20.3	0
7/19/2010	0.1 US		0		19.9	0
10/18/2010	0.1 US	0.1 US	0	0	21	0
4/25/2011	0.1 US	0.1 US	0	0	19.9	0
7/18/2011	0.1 US	0.1 US	0	0	20.1	0

Date	Methane Equivalent	Methane Equivalent (Ambient)	Hydrogen Sulfide	Hydrogen Sulfide (Ambient)	Oxygen	Carbon Dioxide
	% Vol.	% Vol.	ppm	ppm	% Vol.	% Vol.

**MW-212**

MW-212 monitors the overburden groundwater upgradient of the landfill.

10/24/2011	0.1 US	0.1 US	0	0	17.2	3.6
4/25/2012	0.1 US	0.1 US	0	0	20.2	0
7/23/2012	0.1 US	0.1 US	0	0	20.2	0
10/22/2012	0.1 US	0.1 US	0	0	21	0

**MW-216B**

MW-216B monitors the overburden water quality downgradient of the landfill.

5/5/2004	0.1 US					
8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1		0		20.1	
8/1/2005	0.1 US		0		20.3	
9/22/2005	0.1 US		0		20.7	
12/27/2005	A		A		A	A
5/22/2006	0.1 US		0		20.9	0
7/26/2006	0.1 US		0		14.5	7.1
9/11/2006	0.1 US		0		17	6.5
10/4/2006	0.1 US		0		19.5	0
5/15/2007	0.1 US		0		16.5	3.3
7/25/2007	0.1 US		0		15.3	6.7
9/10/2007	0.1 US		0		20.4	0
5/20/2008	0.1 US		0		20.9	0
7/28/2008	0.1 US		0		21.1	0
10/28/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		19.9	0
7/6/2009	DE		DE		DE	DE

**MW-216BR**

MW-216BR is located to the south of Cell #5 of the expansion landfill and near Manhole #5. This well monitors water quality within the overburden downgradient of the landfill.

4/27/2010	0.1 US		0		20.7	0
7/20/2010	0.1 US		0		20.3	0
10/19/2010	0.1 US	0.1 US	0	0	21.2	0
4/26/2011	0.1 US	0.1 US	0	0	21	0
7/19/2011	0.1 US	0.1 US	0	0	20.4	0
10/25/2011	0.1 US	0.1 US	0	0	20.4	0
4/25/2012	0.1 US	0.1 US	0	0	20.3	0
7/23/2012	0.1 US	0.1 US	0	0	20.3	0
10/23/2012	0.1 US	0.1 US	0	0	21.2	0

**MW-223A**

MW-223A monitors the bedrock water quality downgradient of the landfill.

5/5/2004	0.1 US					
8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1 US		0		20.5	
8/1/2005	0.1 US		0		20.6	
9/21/2005	0.1 US		3		20.9	
12/27/2005	0.1 US		0		20.8	0
5/22/2006	0.1 US		0		20.7	0
7/26/2006	0.1 US		0		20.3	0
9/11/2006	0.1 US		0		20.5	0
10/4/2006	0.1 US		0		19.4	0
5/15/2007	0.1 US		0		19.9	0
7/25/2007	0.1 US		0		20.6	0

Date	Methane Equivalent % Vol.	Methane Equivalent (Ambient) % Vol.	Hydrogen Sulfide ppm	Hydrogen Sulfide (Ambient) ppm	Oxygen % Vol.	Carbon Dioxide % Vol.
------	------------------------------	---	-------------------------	--------------------------------------	------------------	--------------------------

**MW-223A**

MW-223A monitors the bedrock water quality downgradient of the landfill.

9/10/2007	0.1 US		0		20.4	0
5/20/2008	0.1 US		0		19.8	0
7/30/2008	0.1 US		0		21	0
10/28/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		19.6	0
7/7/2009	0.1 US		0		20.5	0
10/27/2009	0.1 US		0		20.5	0
4/27/2010	0.1 US		0		20.7	0
7/20/2010	0.1 US		0		20.4	0
10/19/2010	0.1 US	0.1 US	0	0	21.2	0
4/26/2011	0.1 US	0.1 US	0	0	21.1	0
7/19/2011	0.1 US	0.1 US	0	0	20.1	0
10/25/2011	0.1 US	0.1 US	0	0	20.9	0
4/25/2012	0.1 US	0.1 US	0	0	20.2	0
7/23/2012	0.1 US	0.1 US	0	0	20.1	0
10/23/2012	0.1 US	0.1 US	0	0	21.3	0

**MW-223B**

MW-223B monitors the overburden water quality downgradient of the landfill.

5/5/2004	0.1 US					
8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1 US		0		20.6	
8/1/2005	0.1 US		0		20.5	
9/21/2005	0.1 US		5		20.9	
12/27/2005	0.1 US		0		20.7	0
5/22/2006	0.1 US		0		20.7	0
7/26/2006	0.1 US		0		20.2	0
9/11/2006	0.1 US		0		20.5	0
10/4/2006	0.1 US		0		19.3	0
5/15/2007	0.1 US		0		19.9	0
7/25/2007	0.1 US		0		20.7	0
9/10/2007	0.1 US		0		20.4	0
5/20/2008	0.1 US		0		19.8	0
7/30/2008	0.1 US		0		21	0
10/28/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		19.4	0
7/7/2009	0.1 US		0		20.6	0
10/27/2009	0.1 US		0		20.6	0
4/27/2010	0.1 US		0		20.7	0
7/20/2010	0.1 US		0		20.4	0
10/19/2010	0.1 US	0.1 US	0	0	21.2	0
4/26/2011	0.1 US	0.1 US	0	0	21.1	0
7/19/2011	0.1 US	0.1 US	0	0	20	0
10/25/2011	0.1 US	0.1 US	0	0	20.9	0
4/25/2012	0.1 US	0.1 US	0	0	20.2	0
7/23/2012	0.1 US	0.1 US	0	0	20.1	0
10/23/2012	0.1 US	0.1 US	0	0	21.3	0

**MW-227**

MW-227 monitors water quality in the overburden downgradient of the landfill.

5/5/2004	0.1 US
8/4/2004	0.1 US

Date	Methane Equivalent % Vol.	Methane Equivalent (Ambient) % Vol.	Hydrogen Sulfide ppm	Hydrogen Sulfide (Ambient) ppm	Oxygen % Vol.	Carbon Dioxide % Vol.
------	------------------------------	---	-------------------------	--------------------------------------	------------------	--------------------------

**MW-227**

MW-227 monitors water quality in the overburden downgradient of the landfill.

10/27/2004	0.1 US					
5/9/2005	0.1 US		0		20.5	
8/1/2005	0.1 US		0		20.3	
9/21/2005	0.1 US		0		20.8	
12/27/2005	0.1 US		0		20.8	0
5/22/2006	0.1 US		0		20.7	0
7/26/2006	0.1 US		0		19.7	0
9/11/2006	0.1 US		0		20.2	0
10/4/2006	0.1 US		0		19.3	0
5/15/2007	0.1 US		0		20.1	0
7/25/2007	0.1 US		0		20.6	0
9/10/2007	0.1 US		0		20.3	0
5/20/2008	0.1 US		0		20.8	0
7/30/2008	0.1 US		0		21.2	0
10/27/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		19.7	0
7/7/2009	0.1 US		0		20.6	0
10/27/2009	0.1 US		0		20.4	0
4/27/2010	0.1 US		0		20.8	0
7/20/2010	0.1 US		0		20.3	0
10/19/2010	0.1 US	0.1 US	0	0	21.3	0
4/26/2011	0.1 US	0.1 US	0	0	20.9	0
7/19/2011	0.1 US	0.1 US	0	0	20.1	0
10/25/2011	0.1 US	0.1 US	0	0	20.8	0
4/25/2012	0.1 US	0.1 US	0	0	20.3	0
7/23/2012	0.1 US	0.1 US	0	0	20.1	0
10/23/2012	0.1 US	0.1 US	0	0	21.2	0

**MW-301**

MW-301 monitors the water quality within the bedrock downgradient of the landfill.

5/5/2004	0.1 US					
8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1		0		20.1	
8/1/2005	0.1 US		0		19.9	
9/22/2005	0.1 US		7		20.1	
12/27/2005	0.1 US		0		20.8	0
5/22/2006	0.1 US		0		21.1	0
7/26/2006	0.1 US		0		20.1	0
9/11/2006	0.1 US		0		20.1	0
10/4/2006	0.1 US		0		19.3	0
5/15/2007	0.1 US		0		20.6	0
7/25/2007	0.1 US		0		19.8	0.01
9/10/2007	0.1 US		0		20.3	0
5/19/2008	0.1 US		0		20.9	0
7/30/2008	0.1 US		0		20.5	0
10/28/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		21.1	0
7/6/2009	0.1 US		0		19.7	0
10/26/2009	0.1 US		0		20.4	0
4/26/2010	0.1 US		0		19.8	0
7/19/2010	0.1 US		0		20.4	0

Date	Methane Equivalent	Methane Equivalent (Ambient)	Hydrogen Sulfide	Hydrogen Sulfide (Ambient)	Oxygen	Carbon Dioxide
	% Vol.	% Vol.	ppm	ppm	% Vol.	% Vol.

**MW-301**

MW-301 monitors the water quality within the bedrock downgradient of the landfill.

10/19/2010	0.1 US	0.1 US	0	0	21.2	0
4/27/2011	0.1 US	0.1 US	0	0	20.9	0
7/20/2011	0.1 US	0.1 US	0	0	20.1	0
10/25/2011	0.1 US	0.1 US	0	0	20.1	0
4/25/2012	0.1 US	0.1 US	0	0	20.2	0
7/25/2012	0.1 US	0.1 US	0	0	20.7	0
10/24/2012	0.1 US	0.1 US	0	0	20.9	0

**MW-302**

MW-302 monitors the water quality in the shallow bedrock beside the landfill, but not directly downgradient of the landfill.

5/5/2004	0.1 US					
8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1 US		0		21.4	
8/1/2005	0.1 US		0		19.9	
9/19/2005	0.1 US		3		20.7	
12/27/2005	0.1 US		0		20.7	0
5/22/2006	0.1 US		0		20.8	0
7/26/2006	0.1 US		0		20.2	0
9/11/2006	0.1 US		0		21.1	0
10/4/2006	0.1 US		0		19.5	0
5/15/2007	0.1 US		0		22.5	0
7/25/2007	0.1 US		0		20.6	0
9/10/2007	DE		DE		DE	DE

**MW-302R**

MW-302R monitors the water quality in the shallow bedrock beside the landfill, but not directly downgradient of the landfill.

5/20/2008	0.1 US		0		21.1	0
7/29/2008	0.1 US		0		20.9	0
10/27/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		20.2	0
7/6/2009	0.1 US		0		19.8	0
10/27/2009	0.1 US		0		21	0
4/26/2010	0.1 US		0		20.2	0
7/19/2010	0.1 US		0		20.4	0
10/18/2010	0.1 US	0.1 US	0	0	21	0
4/25/2011	0.1 US	0.1 US	0	0	20.4	0
7/18/2011	0.1 US	0.1 US	0	0	20.5	0
10/24/2011	0.1 US	0.1 US	0	0	20.5	0
4/25/2012	0.1 US	0.1 US	0	0	20.2	0
7/23/2012	0.1 US	0.1 US	0	0	20.3	0
10/22/2012	0.1 US	0.1 US	0	0	21.2	0

**MW-303**

MW-303 monitors the background overburden water quality at the site upgradient of the landfill.

5/5/2004	0.1 US					
8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1 US		0		21.4	
8/1/2005	0.1 US		0		20.3	
9/19/2005	0.1 US		0		20.9	
12/27/2005	0.1 US		0		20.8	0
5/22/2006	0.1 US		0		20.9	0

Date	Methane Equivalent	Methane Equivalent (Ambient)	Hydrogen Sulfide	Hydrogen Sulfide (Ambient)	Oxygen	Carbon Dioxide
	% Vol.	% Vol.	ppm	ppm	% Vol.	% Vol.

**MW-303**

MW-303 monitors the background overburden water quality at the site upgradient of the landfill.

7/26/2006	0.1 US		0		19.7	0
9/11/2006	0.1 US		0		20.3	0
10/4/2006	0.1 US		0		19.3	0
5/15/2007	0.1 US		0		20.2	0
7/25/2007	0.1 US		0		20.6	0
9/10/2007	0.1 US		0		20.3	0
5/19/2008	0.1 US		0		20.9	0
7/29/2008	0.1 US		0		20.9	0
10/27/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		20.1	0
7/6/2009	0.1 US		0		19.6	0
10/28/2009	0.1 US		0		20.6	0
4/26/2010	0.1 US		0		20.1	0
7/19/2010	0.1 US		0		20.3	0
10/18/2010	0.1 US	0.1 US	0	0	21.1	0
4/25/2011	0.1 US	0.1 US	0	0	20.4	0
7/18/2011	0.1 US	0.1 US	0	0	20.5	0
10/24/2011	0.1 US	0.1 US	0	0	20.6	0
4/25/2012	0.1 US	0.1 US	0	0	20.3	0
7/23/2012	!	!	!	!	!	!

**MW-304A**

MW-304A monitors the water quality in the upper portion of the bedrock upgradient of the landfill.

8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1 US		0		21.4	
8/1/2005	0.1 US		0		20.2	
9/19/2005	0.1 US		5		20.5	
12/27/2005	0.1 US		0		20.6	0
5/22/2006	0.1 US		0		21	0
7/26/2006	0.1 US		0		20.8	0
9/11/2006	0.1 US		0		20.7	0
10/4/2006	0.1 US		0		19.4	0
5/15/2007	0.1 US		0		20.1	0
7/25/2007	0.1 US		0		20.7	0
9/10/2007	0.1 US		0		20.4	0
5/20/2008	0.1 US		0		21.2	0
7/29/2008	0.1 US		0		20.9	0
10/27/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		20.1	0
7/6/2009	0.1 US		0		19.7	0
10/27/2009	0.1 US		0		20.8	0
4/26/2010	0.1 US		0		19.9	0
7/19/2010	0.1 US		0		19.9	0
10/18/2010	0.1 US	0.1 US	0	0	21	0
4/25/2011	0.1 US	0.1 US	0	0	20.3	0
7/18/2011	0.1 US	0.1 US	0	0	20.5	0
10/24/2011	0.1 US	0.1 US	0	0	20.6	0
4/25/2012	0.1 US	0.1 US	0	0	20.3	0
7/23/2012	0.1 US	0.1 US	0	0	20.2	0
10/22/2012	0.1 US	0.1 US	0	0	21.1	0

Date	Methane Equivalent	Methane Equivalent (Ambient)	Hydrogen Sulfide	Hydrogen Sulfide (Ambient)	Oxygen	Carbon Dioxide
	% Vol.	% Vol.	ppm	ppm	% Vol.	% Vol.

**MW-401A**

MW-401A monitors bedrock water quality downgradient of the landfill and leachate pond.

8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1 US		0		21.4	
8/1/2005	0.1 US		0		20.7	
9/21/2005	0.1 US		0		20.8	
12/27/2005	0.1 US		0		20.8	0
5/22/2006	0.1 US		0		20.7	0
7/26/2006	0.1 US		0		19.7	0
9/11/2006	0.1 US		0		20.3	0
10/4/2006	0.1 US		0		19.9	0
5/15/2007	0.1 US		0		20.1	0
7/25/2007	0.1 US		0		20.5	0
9/10/2007	0.1 US		0		20.3	0
5/20/2008	0.1 US		0		20.9	0
7/28/2008	0.1 US		0		21.2	0
10/29/2008	0.1 US		0		M	0
4/13/2009	0.1 US		0		20.9	0
7/7/2009	0.1 US		0		20.9	0
10/28/2009	0.1 US		0		20.2	0
4/27/2010	0.1 US		0		20.5	0
7/21/2010	0.1 US		0		20.1	0
10/20/2010	0.1 US	0.1 US	0	0	21.1	0
4/25/2011	0.1 US	0.1 US	0	0	20.5	0
7/18/2011	0.1 US	0.1 US	0	0	20.1	0
10/24/2011	0.1 US	0.1 US	0	0	20.9	0
4/25/2012	0.1 US	0.1 US	0	0	20.3	0
7/23/2012	0.1 US	0.1 US	0	0	20.3	0
10/22/2012	0.1 US	0.1 US	0	0	21.2	0

**MW-401B**

MW-401B is located downgradient of the landfill and leachate pond and monitors groundwater quality in the overburden.

8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1 US		0		21.4	
8/1/2005	0.1 US		0		20.5	
9/21/2005	0.1 US		8		20.9	
12/27/2005	0.1 US		0		20.9	0
5/22/2006	0.1 US		0		20.7	0
7/26/2006	0.1 US		0		19.7	0
9/11/2006	0.1 US		0		20.3	0
10/4/2006	0.1 US		0		19.9	0
5/15/2007	0.1 US		0		20.1	0
7/25/2007	0.1 US		0		20.5	0
9/10/2007	0.1 US		0		20.3	0
5/20/2008	0.1 US		0		20.9	0
7/28/2008	0.1 US		0		21.2	0
10/29/2008	0.1 US		0		M	0
4/13/2009	0.1 US		0		21	0
7/7/2009	0.1 US		0		20.9	0
10/28/2009	0.1 US		0		20.2	0
4/27/2010	0.1 US		0		20.5	0

Date	Methane Equivalent	Methane Equivalent (Ambient)	Hydrogen Sulfide	Hydrogen Sulfide (Ambient)	Oxygen	Carbon Dioxide
	% Vol.	% Vol.	ppm	ppm	% Vol.	% Vol.

**MW-401B**

MW-401B is located downgradient of the landfill and leachate pond and monitors groundwater quality in the overburden.

7/21/2010	0.1 US		0		20.1	0
10/20/2010	0.1 US	0.1 US	0	0	21.1	0
4/25/2011	0.1 US	0.1 US	0	0	20.5	0
7/18/2011	0.1 US	0.1 US	0	0	20.1	0
10/24/2011	0.1 US	0.1 US	0	0	20.9	0
4/25/2012	0.1 US	0.1 US	0	0	20.3	0
7/23/2012	0.1 US	0.1 US	0	0	20.4	0
10/22/2012	0.1 US	0.1 US	0	0	21.2	0

**MW-402A**

MW-402A monitors water quality within the bedrock downgradient of the landfill.

8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1 US		0		20.6	
8/1/2005	0.1 US		0		20.3	
9/21/2005	0.1 US		3		20.6	
12/27/2005	0.1 US		0		20.8	0
5/22/2006	0.1 US		0		20.8	0
7/26/2006	0.1 US		0		19.5	0
9/11/2006	0.1 US		0		20.3	0
10/4/2006	0.1 US		0		19.4	0
5/15/2007	0.1 US		0		20.2	0
7/25/2007	0.1 US		0		20.6	0
9/10/2007	0.1 US		0		20.3	0
5/20/2008	0.1 US		0		20.9	0
7/28/2008	0.1 US		0		21.1	0
10/29/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		19.4	0
7/8/2009	0.1 US		0		20.5	0
10/28/2009	0.1 US		0		20.1	0
4/27/2010	0.1 US		0		20.5	0
7/21/2010	0.1 US		0		20.3	0
10/20/2010	0.1 US	0.1 US	0	0	21.2	0
4/27/2011	0.1 US	0.1 US	0	0	20.8	0
7/20/2011	0.1 US	0.1 US	0	0	20.2	0
10/26/2011	0.1 US	0.1 US	0	0	20.8	0
4/24/2012	0.1 US	0.1 US	0	0	20.2	0
7/25/2012	0.1 US	0.1 US	0	0	20.9	0
10/24/2012	0.1 US	0.1 US	0	0	20.9	0

**MW-402B**

MW-402B monitors water quality within the overburden downgradient of the landfill.

8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1 US		0		20.7	
8/1/2005	0.1 US		0		20.3	
9/21/2005	0.1 US		3		20.6	
12/27/2005	0.1 US		0		20.8	0
5/22/2006	0.1 US		0		20.7	0
7/26/2006	0.1 US		0		19.5	0
9/11/2006	0.1 US		0		20.3	0
10/4/2006	0.1 US		0		19.4	0
5/15/2007	0.1 US		0		20.2	0

Date	Methane Equivalent % Vol.	Methane Equivalent (Ambient) % Vol.	Hydrogen Sulfide ppm	Hydrogen Sulfide (Ambient) ppm	Oxygen % Vol.	Carbon Dioxide % Vol.
------	------------------------------	---	-------------------------	--------------------------------------	------------------	--------------------------

**P-04-02**

P-04-02 monitors the water quality in the overburden downgradient of the landfill, between the leachate pond and landfill toe.

10/27/2004	0.1 US					
5/9/2005	0.1		0		20	
8/1/2005	0.1 US		0		20.3	
9/22/2005	0.1 US		6		20.4	
12/27/2005	0.1 US		0		20.8	0
5/22/2006	0.1 US		0		21.3	0
7/26/2006	0.1 US		0		19.9	0
9/11/2006	0.1 US		0		20.3	0
10/4/2006	0.1 US		0		18.5	0
5/15/2007	0.1 US		0		20.5	0
7/25/2007	0.1 US		0		20.1	0
9/10/2007	0.1 US		0		20.3	0
5/21/2008	0.1 US		0		19.9	0
7/30/2008	0.1 US		0		20.6	0
10/29/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		21	0
7/6/2009	0.1 US		0		20.7	0
10/27/2009	0.1 US		0		20.3	0
4/26/2010	0.1 US		0		20	0
7/21/2010	0.1 US		0		20.1	0
10/20/2010	0.1 US	0.1 US	0	0	21.3	0
4/27/2011	0.1 US	0.1 US	0	0	20.8	0
7/20/2011	0.1 US	0.1 US	0	0	19.9	0
10/26/2011	0.1 US	0.1 US	0	0	20.6	0
4/25/2012	0.1 US	0.1 US	0	0	20.4	0
7/25/2012	0.1 US	0.1 US	0	0	20.9	0
10/24/2012	0.1 US	0.1 US	0	0	20.9	0

**P-04-04**

P-04-02 monitors the water quality in the overburden downgradient of the landfill, between the leachate pond and landfill toe.

5/5/2004	0.1 US					
8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1		0		19.9	
8/1/2005	0.1 US		0		20.4	
9/22/2005	0.1 US		4		20.6	
12/27/2005	0.1 US		0		20.8	0
5/22/2006	0.1 US		0		21.3	0
7/26/2006	0.1 US		0		19.8	0
9/11/2006	0.1 US		0		20.3	0
10/4/2006	0.1 US		0		18.5	0
5/15/2007	0.1 US		0		20.1	0
7/25/2007	0.1 US		0		20.1	0
9/10/2007	0.1 US		0		20.4	0
5/21/2008	0.1 US		0		20.3	0
7/30/2008	0.1 US		0		20.8	0
10/29/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		21	0
7/6/2009	0.1 US		0		20.6	0
10/27/2009	0.1 US		0		20.3	0
4/26/2010	0.1 US		0		20	0

Date	Methane Equivalent	Methane Equivalent (Ambient)	Hydrogen Sulfide	Hydrogen Sulfide (Ambient)	Oxygen	Carbon Dioxide
	% Vol.	% Vol.	ppm	ppm	% Vol.	% Vol.

**P-04-04**

P-04-02 monitors the water quality in the overburden downgradient of the landfill, between the leachate pond and landfill toe.

7/21/2010	0.1 US		0		20.2	0
10/20/2010	0.1 US	0.1 US	0	0	21.3	0
4/27/2011	0.1 US	0.1 US	0	0	20.8	0
7/20/2011	0.1 US	0.1 US	0	0	19.9	0
10/26/2011	0.1 US	0.1 US	0	0	20.6	0
4/25/2012	0.1 US	0.1 US	0	0	20.4	0
7/25/2012	0.1 US	0.1 US	0	0	20.9	0
10/24/2012	0.1 US	0.1 US	0	0	21	0

**S Property Line**

5/5/2004	0.1 US					
8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1 US		0		20.7	
8/1/2005	0.1 US		0		20.4	
9/19/2005	0.1 US		0		20.8	
12/27/2005	0.1 US		0		20.6	0
5/22/2006	0.1 US		0		20.7	0
7/26/2006	0.1 US		0		19.9	0
9/11/2006	0.1 US		0		20.8	0
10/4/2006	0.1 US		0		19.2	0
5/15/2007	0.1 US		0		20.2	0
7/25/2007	0.1 US		0		20.4	0
9/10/2007	0.1 US		0		20.1	0
5/21/2008	0.1 US		0		20.7	0
7/30/2008	0.1 US		0		20.8	0
10/28/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		20.7	0
7/6/2009	0.1 US		0		19.6	0
10/28/2009	0.1 US		0		20.2	0
4/27/2010	0.1 US		0		20.6	0
7/20/2010	0.1 US		0		20.2	0
10/20/2010	0.1 US	0.1 US	0	0	21	0
4/27/2011	0.1 US	0.1 US	0	0	20.7	0
7/20/2011	0.1 US	0.1 US	0	0	20	0
10/26/2011	0.1 US	0.1 US	0	0	20.6	0
4/24/2012	0.1 US	0.1 US	0	0	20.5	0
7/25/2012	0.1 US	0.1 US	0	0	20.6	0
10/24/2012	0.1 US	0.1 US	0	0	20.9	0

**W Property Line A**

5/5/2004	0.1 US					
8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1 US		0		20.7	
8/1/2005	0.1 US		0		20.1	
9/19/2005	0.1 US		0		20.8	
12/27/2005	0.1 US		0		20.7	0
5/22/2006	0.1 US		0		20.7	0
7/26/2006	0.1 US		0		19.7	0
9/11/2006	0.1 US		0		20.8	0

Date	Methane Equivalent % Vol.	Methane Equivalent (Ambient) % Vol.	Hydrogen Sulfide ppm	Hydrogen Sulfide (Ambient) ppm	Oxygen % Vol.	Carbon Dioxide % Vol.
------	------------------------------	--	-------------------------	-----------------------------------	------------------	--------------------------

**W Property Line A**

10/4/2006	0.1 US		0		19.3	0
5/15/2007	0.1 US		0		20.1	0
7/25/2007	0.1 US		0		20.3	0
9/10/2007	0.1 US		0		20.3	0
5/21/2008	0.1 US		0		20.6	0
7/30/2008	0.1 US		0		20.8	0
10/28/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		20.7	0
7/6/2009	0.1 US		0		19.6	0
10/28/2009	0.1 US		0		20.1	0
4/27/2010	0.1 US		0		20.5	0
7/20/2010	0.1 US		0		20.1	0
10/20/2010	0.1 US	0.1 US	0	0	21.1	0
4/27/2011	0.1 US	0.1 US	0	0	20.8	0
7/20/2011	0.1 US	0.1 US	0	0	20	0
10/26/2011	0.1 US	0.1 US	0	0	20.6	0
4/24/2012	0.1 US	0.1 US	0	0	20.5	0
7/25/2012	0.1 US	0.1 US	0	0	20.6	0
10/24/2012	0.1 US	0.1 US	0	0	20.9	0

**W Property Line B**

5/5/2004	0.1 US					
8/4/2004	0.1 US					
10/27/2004	0.1 US					
5/9/2005	0.1 US		0		20.7	
8/1/2005	0.1 US		0		20.3	
9/19/2005	0.1 US		0		20.8	
12/27/2005	0.1 US		0		20.6	0
5/22/2006	0.1 US		0		20.7	0
7/26/2006	0.1 US		0		19.7	0
9/11/2006	0.1 US		0		20.9	0
10/4/2006	0.1 US		0		19.3	0
5/15/2007	0.1 US		0		20	0
7/25/2007	0.1 US		0		20.3	0
9/10/2007	0.1 US		0		20.2	0
5/21/2008	0.1 US		0		20.7	0
7/30/2008	0.1 US		0		20.9	0
10/28/2008	0.1 US		0		M	0
4/14/2009	0.1 US		0		20.6	0
7/6/2009	0.1 US		0		19.7	0
10/28/2009	0.1 US		0		20.1	0
4/27/2010	0.1 US		0		20.5	0
7/20/2010	0.1 US		0		20.1	0
10/20/2010	0.1 US	0.1 US	0	0	21	0
4/27/2011	0.1 US	0.1 US	0	0	20.7	0
7/20/2011	0.1 US	0.1 US	0	0	20	0
10/26/2011	0.1 US	0.1 US	0	0	20.6	0
4/24/2012	0.1 US	0.1 US	0	0	20.5	0
7/25/2012	0.1 US	0.1 US	0	0	20.6	0
10/24/2012	0.1 US	0.1 US	0	0	20.9	0

Date	Methane Equivalent % Vol.	Methane Equivalent (Ambient) % Vol.	Hydrogen Sulfide ppm	Hydrogen Sulfide (Ambient) ppm	Oxygen % Vol.	Carbon Dioxide % Vol.
------	------------------------------	---	-------------------------	--------------------------------------	------------------	--------------------------

**Notes:** TYPE - Sample Type Qualifier where D = Duplicate Sample.

**Concentration Qualifier Notes:**

- ! - The sampling location was damaged or destroyed.
- A - The sampling location was Inaccessible
- DE - Decommissioned Location
- M - Results are missing or not reliable due to a meter malfunction.
- US - Not Detected above the reported reporting limit determined by interpreted instrument specification.

*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

**ATTACHMENT F**

**Landfill Gas Monitoring Evaluation**

**JUNIPER RIDGE LANDFILL**

**2012 ANNUAL GAS MONITORING  
EVALUATION**



Operated by NEWSME Landfill Operations, LLC  
2828 Bennoch Road, Old Town, Maine 04468 • (207) 394-4372

## TABLE OF CONTENTS

<u>Section No.</u>	<u>Title</u>	<u>Page No.</u>
1	Introduction .....	1-1
2	Well Field Activity .....	2-1
2.1	Active, New, and Discontinued Well Heads .....	2-1
2.2	Changes and Anomalies in Well Field .....	2-1
3	Landfill Gas Composition .....	3-1
4	Landfill Gas Flow.....	4-1
5	Energy Generated by Methane Combustion .....	5-1
6	Summary.....	6-1

**LIST OF FIGURES**

<u>Figure No.</u>	<u>Title</u>	<u>Page No.</u>
Figure 3-1	Monthly Average Landfill Gas Composition at JRL, 2011 & 2012 .....	3-2
Figure 4-1	Average Landfill Gas Flow Rate at JRL, 2011 & 2012 .....	4-1
Figure 5-1	Energy Generated by CH <sub>4</sub> Combustion at JRL Flare, 2011 & 2012 .....	5-1
Figure 5-2	Average Daily Energy Generated by CH <sub>4</sub> Combustion at JRL Flare .....	5-2

**LIST OF TABLES**

<u>Table No.</u>	<u>Title</u>	<u>Page No.</u>
Table 2-1	All Well Heads Monitored at JRL, 2012 .....	2-2
Table 4-1	Volumetric Flow of Landfill Gas at JRL, 2011 & 2012 .....	4-2
Table 5-1	Energy Generated by CH <sub>4</sub> Combustion at JRL, 2011 & 2012 .....	5-2

## **1 Introduction**

In accordance with the MEDEP Chapter 401, Solid Waste Management Rules, Section 401.4.D(4)(d), an evaluation of the gas monitoring results for the past year, including a comparison of the past year's results to the previous years' results is provided below.

Regular landfill gas monitoring activities occurred on site during 2012, including: (1) well-tuning of landfill collection trenches and wells, (2) continuous flow measurement at the landfill gas combustion flare, and (3) landfill gas composition measurement during well-tuning activities at the landfill gas combustion flare.

## **2 Well Field Activity**

During 2012, well field activities consisted of addition of new infrastructure, as well as discontinuing older infrastructure due to malfunction, or construction related activities. Anomalies associated with normal operation of the well-field were also monitored, a summary is provided below.

### **2.1 Active, New, and Discontinued Well Heads**

At the beginning of 2012, the JRL well field consisted of 123 active gas collection wells and trenches. During the course of the year, 17 new wells and trenches were installed. These included 13 gas collection trenches and 4 vertical wells. Two of the gas collection trenches (JR7South and JR7West) were added strictly for odor control purposes. One is located on the west side of cell 7. The second runs the whole length of the south end of cell 7. A total of 140 well heads were monitored over the course of the year, and by the end of the year, 128 remained active. A total of 8 gas collection trenches, 3 vertical wells, and 1 cleanout were discontinued during 2012. All of these, with the exception of 2 vertical wells, were discontinued due to low methane production (20% or less) over a two year period or longer. Two of the vertical wells (JR-GW—B and JR-GW-12), located in cell 3B, were temporarily capped and covered to allow for waste placement in cell 7. Table 2-1 shows all well heads that were monitored during 2012 and their status as of the end of 2012.

### **2.2 Changes and Anomalies in Well Field**

There were no notable changes or anomalies relative to flow, methane production, or gas temperature in the JRL well field during 2012.

**Table 2-1 All Well Heads Monitored at JRL, 2012**

WELL ID	WELL TYPE	WELL STATUS	WELL ID	WELL TYPE	WELL STATUS	WELL ID	WELL TYPE	WELL STATUS
JRGCT5PW	Cleanout	Discontinued	JR-GW-64	Gas Well	Active	JR-GW-02	Gas Well	Active
JR-LPC4A	Horizontal	Discontinued	JR-GW-65	Gas Well	Active	JR-GW-03	Gas Well	Active
JR-3E-01	Horizontal	Discontinued	JR-GW-66	Gas Well	Active	JR-GW-04	Gas Well	Active
JR-3E-02	Horizontal	Discontinued	JR-GW-74	Gas Well	Active	JR-GW-05	Gas Well	Active
JR-3W-02	Horizontal	Discontinued	JR-GW-75	Gas Well	Active	JR-GW-09	Gas Well	Active
JR-GCT10	Horizontal	Discontinued	JR-GW-82	Gas Well	Active	JR-GW-10	Gas Well	Active
JR-GCT17	Horizontal	Discontinued	JR-GW-83	Gas Well	Active	JR-GW-11	Gas Well	Active
JRGCT17A	Horizontal	Discontinued	JR-GW-90	Gas Well	Active	JR-GW-12	Gas Well	Temp Disc'd
JRGCT406	Horizontal	Discontinued	JR-GW-91	Gas Well	Active	JR-GW-17	Gas Well	Active
JR-GW--C	Gas Well	Discontinued	JR-GW--S	Gas Well	Active	JR-GW-18	Gas Well	Active
JRGCT701	Horizontal	Added in 2012	JR-GW--T	Gas Well	Active	JR-GW-19	Gas Well	Active
JRGCT702	Horizontal	Added in 2012	JR-LC-SE	Cleanout	Active	JR-GW-20	Gas Well	Active
JRGCT703	Horizontal	Added in 2012	JR-LC-SW	Cleanout	Active	JR-GW-21	Gas Well	Active
JRGCT704	Horizontal	Added in 2012	JR-LPC-1	Horizontal	Active	JR-GW-28	Gas Well	Active
JRGCT705	Horizontal	Added in 2012	JR-3W-01	Horizontal	Active	JR-GW-29	Gas Well	Active
JRGCT706	Horizontal	Added in 2012	JR-CT002	Condensate Trap	Active	JR-GW-30	Gas Well	Active
JRGCT707	Horizontal	Added in 2012	JRGC401A	Horizontal	Active	JR-GW-31	Gas Well	Active
JRGCT708	Horizontal	Added in 2012	JRGC402A	Horizontal	Active	JR-GW-37	Gas Well	Active
JRGCT709	Horizontal	Added in 2012	JRGC404A	Horizontal	Active	JR-GW-38	Gas Well	Active
JRGCT710	Horizontal	Added in 2012	JRGC405A	Horizontal	Active	JR-GW-39	Gas Well	Active
JR-GW-06	Gas Well	Added in 2012	JRGC406A	Horizontal	Active	JR-GW-46	Gas Well	Active
JR-GW-07	Gas Well	Added in 2012	JR-GCT01	Horizontal	Active	JR-GW-47	Gas Well	Active
JR-GW-15	Gas Well	Added in 2012	JR-GCT09	Horizontal	Active	JR-GW-48	Gas Well	Active
JR-GW-24	Gas Well	Added in 2012	JR-GCT18	Horizontal	Active	JR-GW--A	Gas Well	Active
JR7South	Horizontal	Added in 2012	JRGCT2A 1	Horizontal	Active	JR-GW--B	Gas Well	Temp Disc'd
JR7West	Horizontal	Added in 2012	JRGCT2A2	Horizontal	Active	JR-GW--D	Gas Well	Active
JRGCT507	Horizontal	Active	JRGCT2A3	Horizontal	Active	JR-GW--E	Gas Well	Active
JRGCT508	Horizontal	Active	JRGCT3A 1	Horizontal	Active	JR-GW--F	Gas Well	Active
JRGCT509	Horizontal	Active	JRGCT3A2	Horizontal	Active	JR-GW-G2	Gas Well	Active
JRGCT510	Horizontal	Active	JRGCT3A3	Gas Well	Active	JR-GW-H2	Gas Well	Active
JRGCT511	Horizontal	Active	JRGCT3A4	Horizontal	Active	JR-GW--I	Gas Well	Active
JRGCT512	Horizontal	Active	JRGCT3A5	Horizontal	Active	JR-GW--J	Gas Well	Active
JRGCT513	Horizontal	Active	JRGCT3B1	Horizontal	Active	JR-GW--K	Gas Well	Active
JRGCT514	Horizontal	Active	JRGCT3B2	Horizontal	Active	JR-GW--L	Gas Well	Active
JRGCT601	Horizontal	Active	JRGCT3B3	Horizontal	Active	JR-GW--M	Gas Well	Active
JRGCT602	Horizontal	Active	JRGCT3B4	Horizontal	Active	JR-GW--N	Gas Well	Active
JRGCT603	Horizontal	Active	JRGCT401	Horizontal	Active	JR-GW--O	Gas Well	Active
JRGCT604	Horizontal	Active	JRGCT402	Horizontal	Active	JR-GW--P	Gas Well	Active
JRGCT605	Horizontal	Active	JRGCT403	Horizontal	Active	JR-LC--5	Horizontal	Active
JRGCT606	Horizontal	Active	JRGCT404	Horizontal	Active	JR-LC--6	Horizontal	Active
JRGCT607	Horizontal	Active	JRGCT405	Horizontal	Active	JRLGV401	Horizontal	Active
JRGCT608	Horizontal	Active	JRGCT501	Horizontal	Active	JRLGV402	Horizontal	Active
JRGCT610	Horizontal	Active	JRGCT502	Horizontal	Active	JRLGV403	Horizontal	Active
JR-GW-54	Horizontal	Active	JRGCT503	Horizontal	Active	JRLGV404	Horizontal	Active
JR-GW-55	Gas Well	Active	JRGCT504	Horizontal	Active	JR-LPC-2	Gas Well	Active
JR-GW-57	Gas Well	Active	JRGCT505	Horizontal	Active	JR-LPC-3	Horizontal	Active
			JRGCT506	Horizontal	Active	JR-LPC-4	Horizontal	Active

### **3 Landfill Gas Composition**

During well-tuning activities, the gas composition of the landfill gas supplied to the flare was measured and concentrations of methane, carbon dioxide, and oxygen (CH<sub>4</sub>, CO<sub>2</sub>, O<sub>2</sub> respectively), and balance gas were recorded. During 2012, JRL staff operated the well field with the intent of maintaining a target CH<sub>4</sub> concentration in the range of 40-45% (by volume) in the gas supplied to the flare for both odor control and greenhouse gas reduction, and maintain an O<sub>2</sub> concentration at satisfactory low levels (i.e. < 5%) in order to maintain high efficiency in the vacuum system and prevent possible landfill complications associated with O<sub>2</sub> infiltration. Balance gas levels are also monitored, as a confirmation of landfill collection efficiency and O<sub>2</sub> infiltration prevention. The concentration of CO<sub>2</sub> at the flare is not of great concern but is measured in addition to the more important levels of CH<sub>4</sub> and O<sub>2</sub>.

Since gas composition is measured daily, monthly average gas compositions at the flare are computed from daily measurements. The monthly average concentrations of CH<sub>4</sub> and O<sub>2</sub> are shown in Figure 3-1. As can be seen, the concentration of CH<sub>4</sub> remained within the target range of 40-45% for the majority of the year, with February, March, September, October, and December experiencing concentrations below 40%. This is a similar pattern to the one observed in 2011. The average CH<sub>4</sub> concentration for 2012 was 40.6%, which was slightly lower, but similarly stable to the 2011 average concentration of 41.6%. . O<sub>2</sub> concentrations improved during 2012, averaging 0.7% for the year, less than the 2011 average of 1.5%. Concentrations remained below 1% for all but two months, October and November.

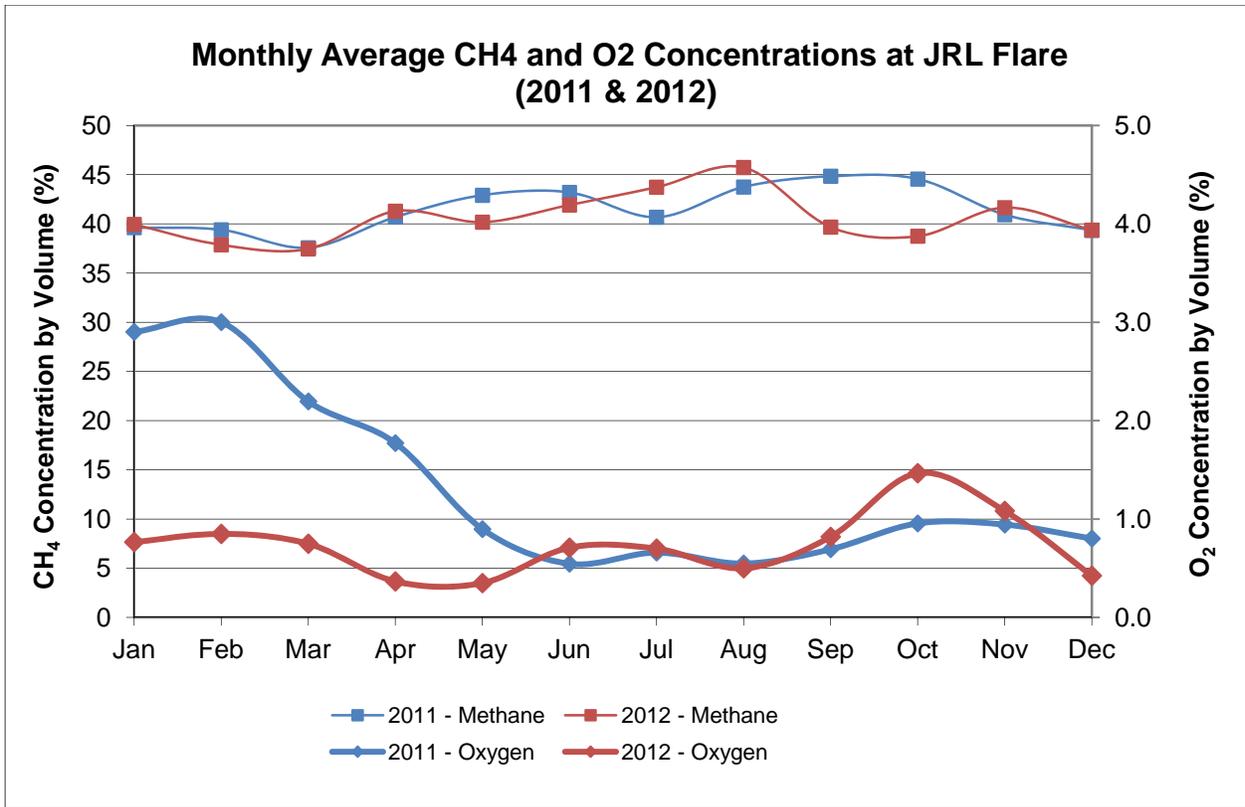


Figure 3-1 Monthly Average Landfill Gas Composition at JRL, 2011 & 2012

#### 4 Landfill Gas Flow

The flow rate of landfill gas supplied to the JRL flare was measured and recorded on a continuous basis. This data has been compiled into total monthly landfill gas flows. The average daily flow rate of landfill gas supplied to the flare at JRL each month during 2012 (and 2011 for comparison) is summarized on Figure 4-1. Table 4-1 shows the data reflected in Figure 4-1, and the total monthly landfill gas flows. The total flow during 2012 was 1,001 million standard cubic feet (MMSCF), a slight decrease of approximately 2.7% from total Flow recorded in 2011.

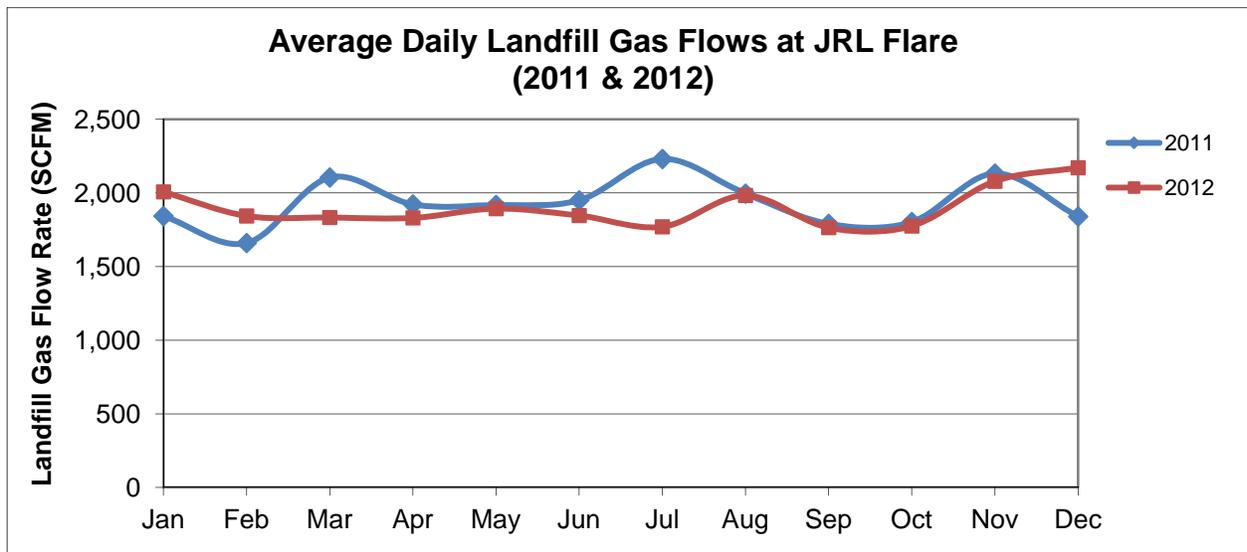


Figure 4-1 Average Landfill Gas Flow Rate at JRL, 2011 & 2012

**Table 4-1 Volumetric Flow of Landfill Gas at JRL, 2011 & 2012**

MONTH	TOTAL FLOW (MMSCF)		AVERAGE FLOW RATE (SCFM)	
	2012	2011	2012	2011
JAN	96.91	82.25	2,171	1,842
FEB	89.80	69.31	2,079	1,660
MAR	79.25	93.95	1,775	2,105
APR	76.20	83.02	1,764	1,922
MAY	88.51	85.6	1,983	1,918
JUN	79.01	84.24	1,770	1,950
JUL	79.75	99.55	1,846	2,230
AUG	84.51	89.07	1,893	1,995
SEP	79.06	77.32	1,830	1,790
OCT	81.83	80.47	1,833	1,803
NOV	76.99	92.07	1,844	2,131
DEC	89.60	82.13	2,007	1,840
<b>TOTALS</b>	<b>1,001</b>	<b>1,019</b>		

## 5 Energy Generated by Methane Combustion

JRL has a candle type flare which burns the methane (CH<sub>4</sub>) present in the landfill gas. CH<sub>4</sub> has an approximate heating value of 1009 BTU/SCF (BTU per standard cubic foot). Using this, along with the CH<sub>4</sub> concentrations and landfill gas flows shown in the previous sections, the energy generated by the combustion of CH<sub>4</sub> in the JRL flare was calculated. Figure 5-1 shows the monthly totals of energy generated and Figure 5-2 shows the average daily energy generated. The data reflected in both figures are shown in Table 5-1.

The total energy generated by combustion at JRL during 2012 was 407,169 MMBTUs, a decrease of 3.5% from 2011. Both flow and methane concentration remained fairly constant from 2011 to 2012, leading to a similar energy generation rate. An increase and subsequent decrease in total energy generation from August to September occurred, largely due to a variation in methane concentration, likely from tuning and wellfield maintenance activities.

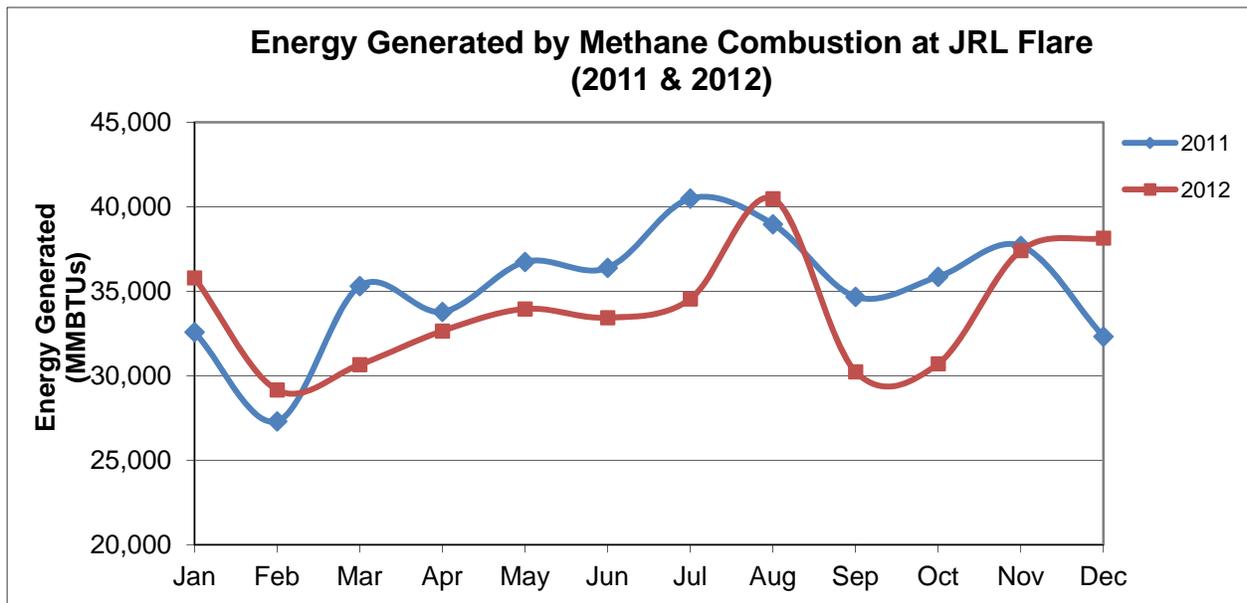


Figure 5-1 Energy Generated by CH<sub>4</sub> Combustion at JRL Flare, 2011 & 2012

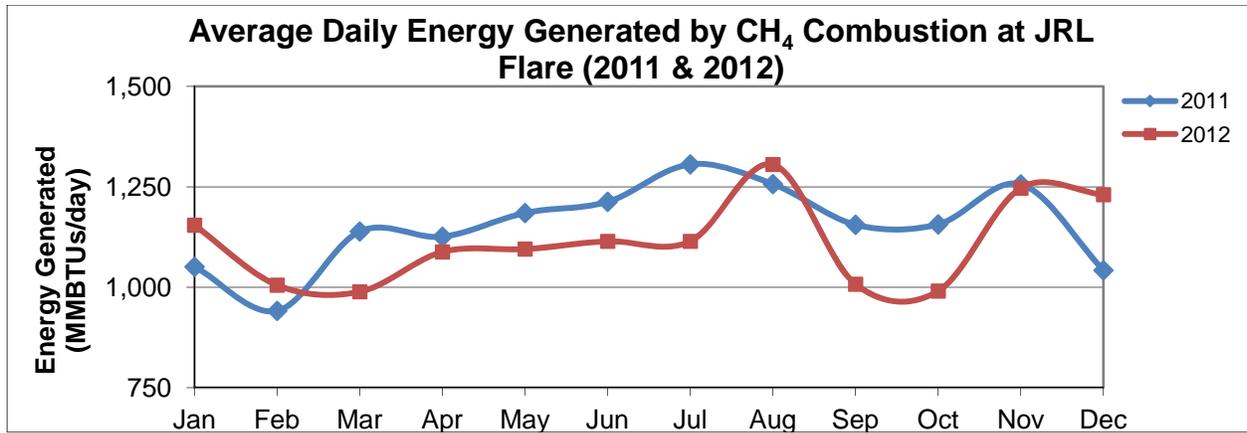


Figure 5-2 Average Daily Energy Generated by CH<sub>4</sub> Combustion at JRL Flare, 2011 & 2012

Table 5-1 Energy Generated by CH<sub>4</sub> Combustion at JRL, 2011 & 2012

MONTH	ENERGY GENERATED BY CH <sub>4</sub> COMBUSTION			
	MONTHLY TOTAL (MMBTUs)		DAILY AVERAGE (MMBTUs/day)	
	2012	2011	2012	2011
JAN	38,149	32,584	1,051	1,051
FEB	37,407	27,302	941	941
MAR	30,709	35,308	1,139	1,139
APR	30,234	33,779	1,126	1,126
MAY	40,478	36,735	1,185	1,185
JUN	34,549	36,388	1,213	1,213
JUL	33,435	40,489	1,306	1,306
AUG	33,955	38,968	1,257	1,257
SEP	32,647	34,672	1,156	1,156
OCT	30,657	35,857	1,157	1,157
NOV	29,157	37,687	1,256	1,256
DEC	35,794	32,315	1,042	1,042
<b>TOTALS</b>	<b>407,169</b>	<b>422,085</b>		

## 6 Summary

The JRL well field did not experience any drastic changes that are atypical of a normal secure landfill well field. During the course of the year, 17 new wells and trenches were installed. These included 13 gas collection trenches and 4 vertical wells. Also, 8 gas collection trenches, 3 vertical wells, and 1 cleanout were discontinued during 2012. Two of the vertical wells were temporarily discontinued due to waste placement.

Overall, average monthly methane ( $\text{CH}_4$ ) concentrations remained largely unchanged from 2011, remaining within the target range of 40-45% most of the year, averaging 40.6% for 2012, a decrease of 1% from 2011. Oxygen ( $\text{O}_2$ ) concentrations remained low throughout 2012, with only two months averaging above 1%. The annual average  $\text{O}_2$  concentration in 2012 was 0.7% at the landfill gas combustion flare, a significant decrease from the 2011 average of 1.5%.

The total flow of landfill gas at the JRL flare remained largely unchanged from 2011, with a slight decrease in total flow of 2.7%, month-to-month flows were also very similar to 2011. The total flow during 2011 was 1001 MMSCF. Also, the total energy generated by  $\text{CH}_4$  combustion at the JRL flare decreased slightly from 2011 by 3.5%. The total energy generated by combustion at JRL during 2012 was 407,169 MMBTUs.

*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

**ATTACHMENT G**

**Landfill Air Monitoring Evaluation**

**JUNIPER RIDGE LANDFILL**  
**2012 ANNUAL AIR MONITORING EVALUATION**



Operated by NEWSME Landfill Operations, LLC  
2828 Bennoch Road, Old Town, Maine 04468 • (207) 394-4372

## TABLE OF CONTENTS

<u>Section No.</u>	<u>Title</u>	<u>Page No.</u>
1.	Introduction .....	1-1
2.	Stationary H <sub>2</sub> S Monitoring Results .....	2-1
3.	Odor Complaints .....	3-1
4.	CH <sub>4</sub> Surface Scans .....	4-1
5.	Summary.....	5-1

## **LIST OF FIGURES**

<u>Figure No.</u>	<u>Title</u>	<u>Page No.</u>
Figure 1-1	Juniper Ridge Landfill H <sub>2</sub> S Single Point Monitoring Locations .....	1-2
Figure 2-1	Annual average H <sub>2</sub> S readings at all four SPM locations for 2011 & 2012 .....	2-3
Figure 2-2	Monthly average H <sub>2</sub> S readings - Access Road for 2011 & 2012 .....	2-3
Figure 2-3	Monthly average H <sub>2</sub> S readings - Fort James House for 2011 & 2012 .....	2-4
Figure 2-4	Monthly average H <sub>2</sub> S readings - Stage Coach Road for 2011 & 2012 .....	2-4
Figure 2-5	Monthly average H <sub>2</sub> S readings - West Coiley Road for 2011 & 2012 .....	2-5
Figure 4-1	Exceedances during quarterly CH <sub>4</sub> surface scans for 2011 & 2012 .....	4-3
Figure 4-2	Average concentrations during quarterly CH <sub>4</sub> surface scans for 2011 & 2012 .....	4-3

## **LIST OF TABLES**

<u>Table No.</u>	<u>Title</u>	<u>Page No.</u>
Table 2-1	Quantitative (4 ppb+) and detection (2 ppb+) readings .....	2-6
Table 3-1	Summary of Complaints at Juniper Ridge Landfill, 2011 & 2012 .....	3-2
Table 4-1	Exceedances found during 2011 & 2012 CH <sub>4</sub> surface scans .....	4-2

## **1. Introduction**

In accordance with the MEDEP Chapter 401, Solid Waste Management Rules, Section 401.D(4)(e), NEWSME Landfill Operations, LLC evaluated the air monitoring results for 2012, including a comparison of the 2012 results to the previous year's results. Two types of air monitoring activities occurred at the Juniper Ridge Landfill (JRL) during 2012; (1) hydrogen sulfide H<sub>2</sub>S monitoring with stationary continuous monitors and, (2) quarterly Methane (CH<sub>4</sub>) emission surface scans on the landfill intermediate cover. The air monitoring was completed in general accordance with the procedures specified in the JRL operations manual. H<sub>2</sub>S monitors consisted of Honeywell® Analytics MDA Single Point Monitors (SPM) utilizing hydrides, EP Chemcassettes® also provided by Honeywell®. Readings were taken at 15 minute intervals and data-logged. Monitors are located at four different locations surrounding the landfill as shown in Figure 1-1. CH<sub>4</sub> scans were completed using a MicroFID® (flame ionizing detector) mobile device and completed once every quarter by taking measurements at an approximate 100 ft spacing grid on the intermediate cover system. Cover penetrations in the pattern (i.e. gas collection piping, etc.) and noticeable punctures were also checked in addition to the grid readings.

Additionally, odor complaints from the 24-hour JRL odor complaint hotline provide an opportunity to evaluate the effectiveness of odor control measures at the JRL. Odor complaints for 2011 and 2012 are compared.



Figure 1-1 Juniper Ridge Landfill H<sub>2</sub>S Single Point Monitoring Locations

## **2. Stationary H<sub>2</sub>S Monitoring Results**

The Chemcassette® tapes utilized by the JRL are capable of continuously detecting hydrogen sulfide levels down to 2 ppb and quantitatively measuring down to 4 ppb. The summarized data provided below average on all readings, including non-detect (zero) readings taken at each instrument, therefore the average values (monthly and annually) are typically less than the individual reading detection limit of the Chemcassettes®. The quantitation limit is the lowest numerical value that can be determined with suitable precision and accuracy and the detection limit is the lowest numerical value that can be reasonably estimated by the instrument (typically half the quantitation limit).

Readings were taken at 15 minute intervals and data-logged. Raw data, along with associated weather data from the on-site weather station were provided to the MEDEP on a periodic basis. Routine maintenance occurred including Chemcassette® changeouts on a roughly 4-6 week basis. An annual factory service was also performed. Records of these activities were submitted to the MEDEP as well.

During the months of August, September, and October 2012, the Fort James SPM malfunctioned, leading to erroneous readings. Data obtained from surrounding SPM's, including an on-site SPM, proved the readings to be erroneous, and diagnosis and maintenance of the Fort James SPM corrected the problem. NEWSME maintains an additional South SPM which is a meter maintained on-site for operational purposes and not for record keeping purposes, seen in Figure 1-1. Due to the relative location of the South SPM to the Fort James SPM, the South SPM provides a good comparison of readings with the Fort James SPM. Therefore, readings from the South SPM were exchanged with erroneous readings from the

Fort James SPM during the time period in question. Readings from the South SPM are typically higher than readings on the Fort James SPM, since the South SPM is directly adjacent to the landfill and the Fort James meter is not, therefore this comparison provides a conservative estimate of actual readings at the Fort James SPM. These results are discussed below.

The annual average H<sub>2</sub>S readings for each of the four locations are presented in Figure 2-1. Due to the vast number of non-detect readings (readings below the detection limit of the instruments), the average H<sub>2</sub>S values for all four meters were below the detection limit of 2 ppb for both 2011 and 2012. Due to this fact, these average annual readings should be used only for qualitative comparison, and serve as evidence that the average H<sub>2</sub>S values are below the quantitation and detection limits of the Chemcassettes®. During 2012, no monthly average readings were above the detection limit, when averaging with non-detect readings (values less than 2 ppb) or zero readings.

Of the four H<sub>2</sub>S SPMs located around the JRL, three locations remained largely unchanged from average annual readings obtained in 2011. Both 2011 and 2012 average readings were below the detection limit of the instrument. Readings at the Access Road SPM decreased significantly from 2011. Monthly average readings from the other three locations correspond well with each other between 2011 and 2012, with average higher H<sub>2</sub>S levels occurring during summer months, and lower values occurring during colder winter months. Monthly average H<sub>2</sub>S readings for each location are shown in Figures 2-2 through 2-5 and should be used for comparative analysis only due to their low averages, below the quantitative and detection limits of the instruments.

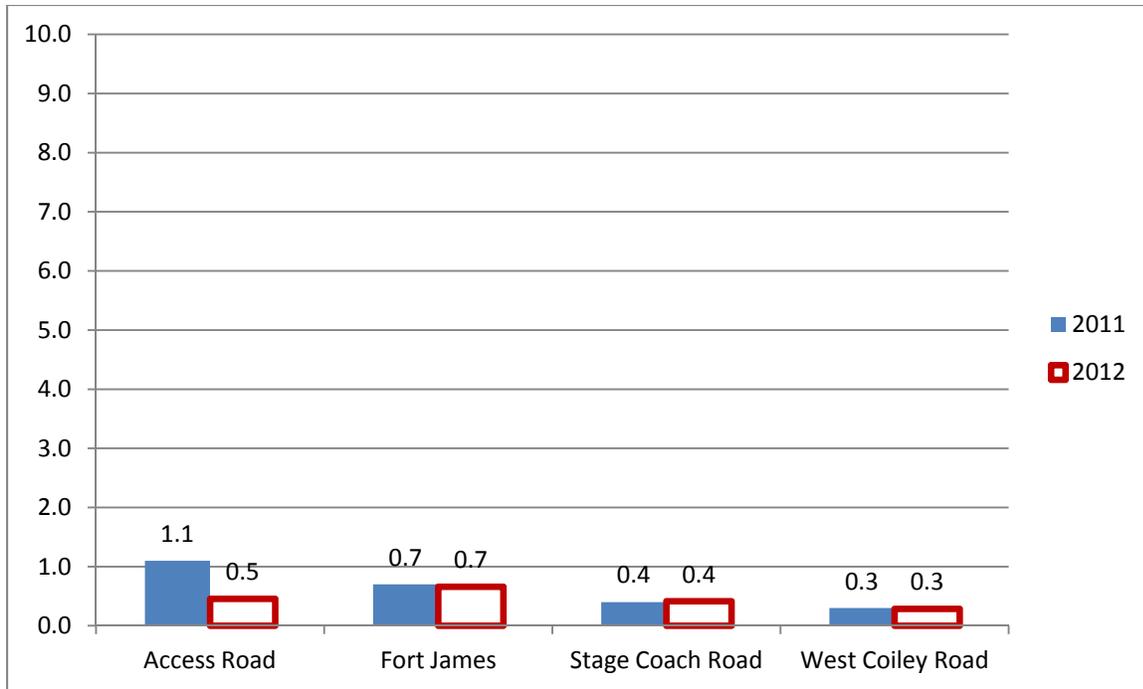


Figure 2-1 Annual average H<sub>2</sub>S readings at all four SPM locations for 2011 & 2012

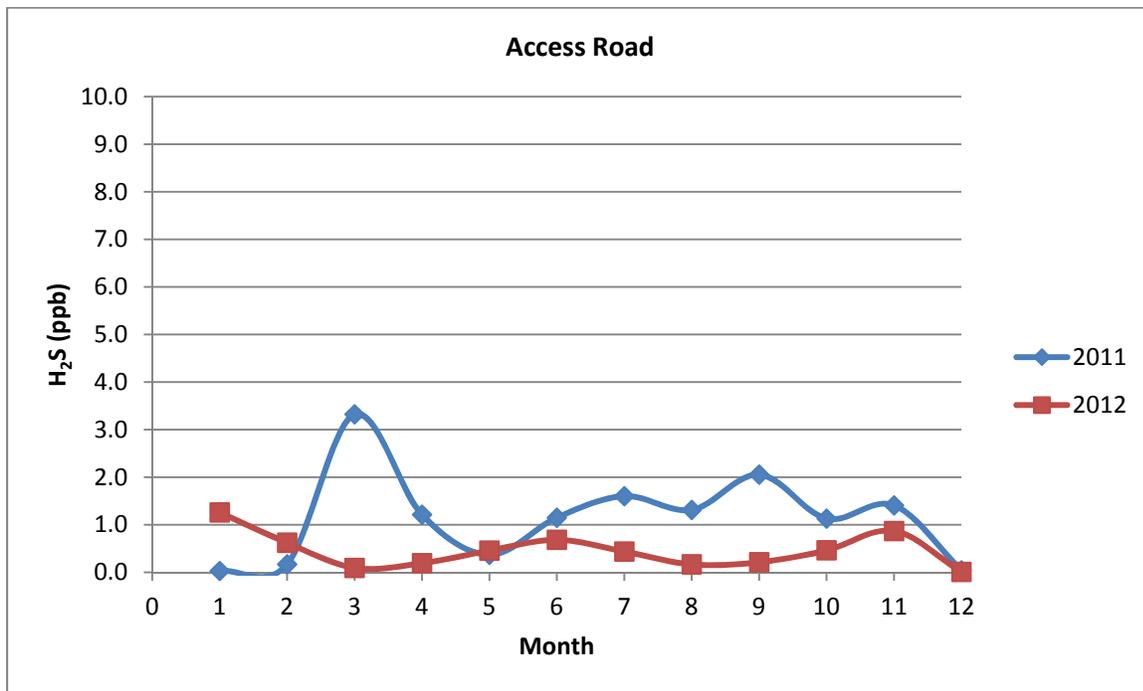


Figure 2-2 Monthly average H<sub>2</sub>S readings at the Access Road SPM location for 2011 & 2012

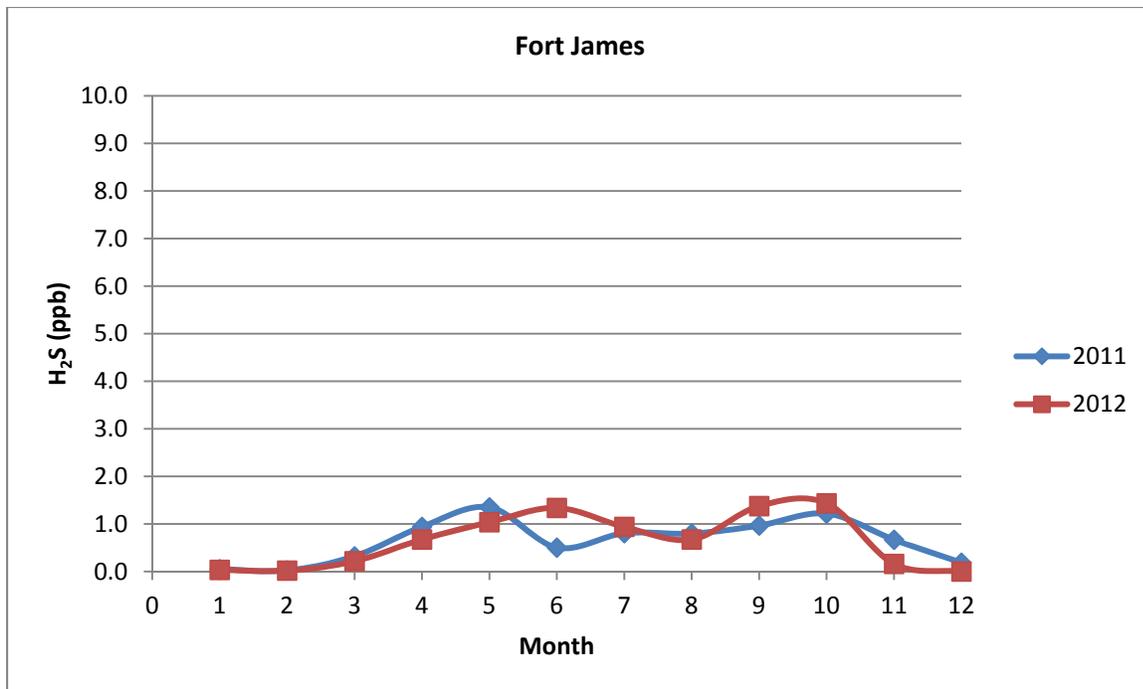


Figure 2-3 Monthly average H<sub>2</sub>S readings at the Fort James SPM location for 2011 & 2012

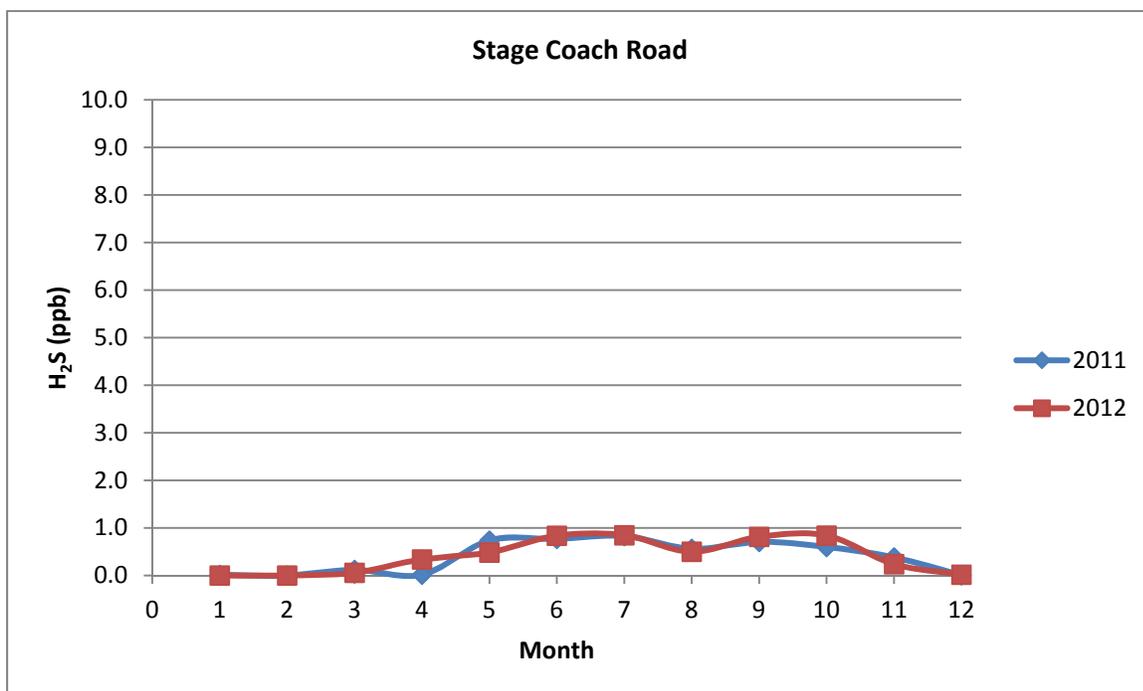
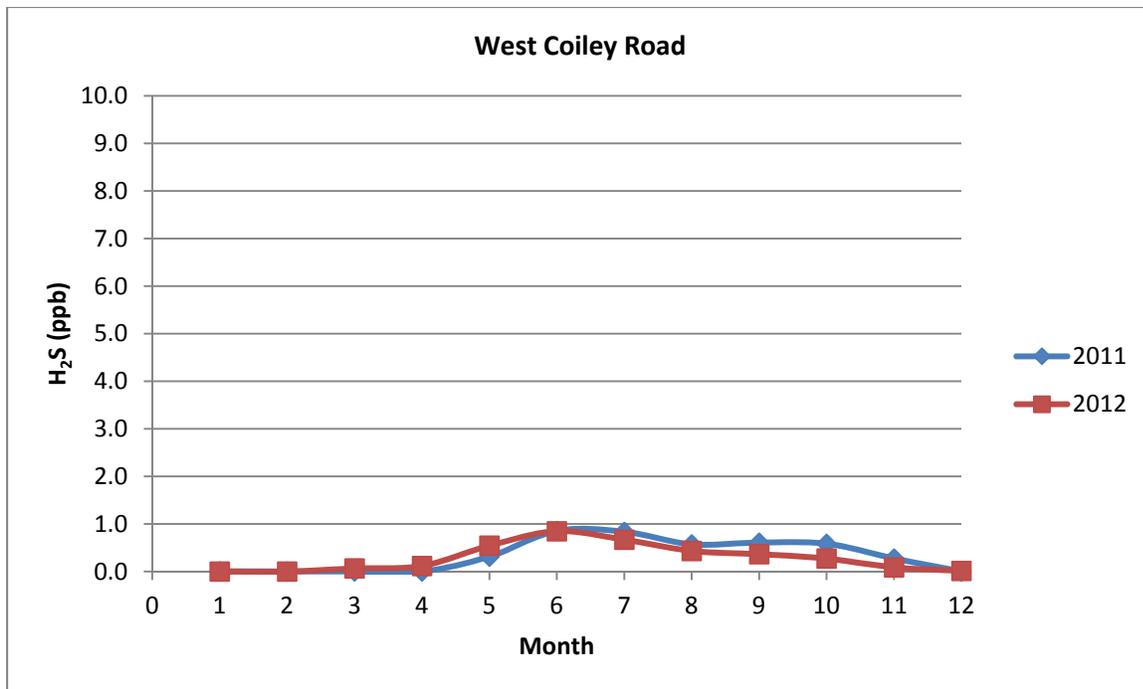


Figure 2-4 Monthly average H<sub>2</sub>S readings at the Stage Coach Road SPM location for 2011 & 2012



**Figure 2-5 Monthly average H<sub>2</sub>S readings at the West Coiley Road SPM location for 2011 & 2012**

The 2012 average site wide H<sub>2</sub>S level remained very low. Close attention was paid to the Access Road SPM during 2012 because of the variation in readings obtained from this SPM in 2011. The issues that apparently affected the Access Road SPM during 2011 were resolved during 2012 with meter calibrations and routine meter checks.

Due to the low average readings, a comparison was completed on readings above the quantitative limit (4 ppb) and detection limit (2 ppb) for 2011 and 2012. Readings above these levels were compared with total readings taken over the entirety of the year to determine the effective time at which quantifiable and detectable readings occurred. The results are shown in Table 2-1.

**Table 2-1 Quantitative (4 ppb+) and detection (2 ppb+) readings as a percentage of total annual readings**

Above:	Access Road		Fort James*		Stage Coach Road		West Coiley Road		Site Average		Total Readings
	4ppb	2ppb	4ppb	2ppb	4ppb	2ppb	4ppb	2ppb	4ppb	2ppb	
2011	10.4%	25.5%	2.5%	20.5%	0.2%	14.9%	0.9%	11.8%	<b>3.5%</b>	<b>18.2%</b>	34,016
2012	1.4%	14.7%	2.4%	15.4%	0.1%	15.0%	0.6%	9.9%	<b>2.5%</b>	<b>16.4%</b>	34,718
Change:	-9.1%	-10.8%	-0.1%	-5.1%	-0.2%	0.1%	-0.3%	-1.8%	-1.0%	-1.8%	

\* Readings from August, September, and October erroneous, replaced with South SPM readings

During 2011, 3.5% of total readings of all four meters were at or above the quantifiable limit of the meters and 18.2% of readings were at or above the detectable limit of the meters. During 2011, 2.5% of readings of meters were at or above the quantifiable limit, and 16.4% of readings were at or above the detectable limit. Overall, a decrease from 2011 to 2012 of -1.0% and -1.8% is seen in readings at or above the quantifiable and detectable limit of the meters respectively. The largest decrease in these readings, -9.1% and -10.8% for quantitative and detectable respectively, is seen in the Access Road SPM. This concurs with the average annual readings during 2012 at this meter which show a significant decrease from 2011 and further supports the likely influence on the Access Road SPM from sources other than the JRL during 2011. Both the Stage Coach Road SPM and the West Coiley Road SPM show slight decrease in quantifiable readings and slight decrease in detectable readings. The Fort James SPM, when corrected for the three months of erroneous readings, also shows slight decrease in quantifiable readings and a decrease in detectable readings.

Overall, both quantifiable and detectable readings have shown an overall decrease during 2012. The overall measurable readings around the entire site remained low during 2012.

### **3. Odor Complaints**

Complaints recorded via the 24-hour JRL complaint hotline are provided for 2011 and 2012 in Table 3-1 below. Detailed complaint logs were submitted to the MEDEP on a monthly basis during 2012. During 2012 the JRL complaint hotline received a total of seven landfill related complaints (all were odor related), compared with twenty seven for 2011 (of which 21 were odor related). Odor complaints were logged as they occurred, and site visits were completed to the location of the complaints to confirm these complaints. Close attention was paid to complaints in order to determine operational effectiveness of odor control measures at the landfill, and changes were made to these measures as necessary based on complaints. Of these complaints, only one was confirmed as likely coming from the landfill in 2012 as opposed to seven confirmed in 2011. The seven odor related complaints were dispersed over seven different months. An additional five non-enforceable offsite traffic related complaints were received during 2012. These complaints were related to traffic movement on public roadways.

**Table 3-1 Summary of Complaints at Juniper Ridge Landfill, 2011 & 2012**

<b>2011</b>	<b>-OBJECT OF COMPLAINT-</b>							<b>MONTH</b>
<b>MONTH</b>	<b>ODOR</b>	<b>NOISE</b>	<b>LIGHTS</b>	<b>DUST</b>	<b>TRAFFIC</b>	<b>BIRDS</b>	<b>OTHER</b>	<b>TOTAL</b>
JAN.	5	0	0	0	0	0	0	5
FEB.	0	0	0	0	0	0	0	0
MAR.	0	0	0	0	0	0	0	0
APR.	4	0	0	0	0	0	0	4
MAY	0	0	0	0	0	1	0	1
JUN.	1	0	0	0	0	0	0	1
JUL.	1	0	0	0	0	0	0	1
AUG.	4	0	0	0	0	0	0	4
SEP.	1	0	0	0	0	0	0	1
OCT.	1	0	0	0	0	0	1	2
NOV.	0	1	0	0	0	0	0	1
DEC.	4	1	0	1	1	0	0	7
<b>TOTALS</b>	<b>21</b>	<b>2</b>	<b>0</b>	<b>1</b>	<b>1</b>	<b>1</b>	<b>1</b>	<b>27</b>

<b>2012</b>	<b>COMPLAINT CATEGORY</b>						<b>MONTH</b>
<b>MONTH</b>	<b>ODOR</b>	<b>NOISE</b>	<b>LIGHTS</b>	<b>DUST</b>	<b>BIRDS</b>	<b>OTHER</b>	<b>TOTAL</b>
JAN.	0	0	0	0	0	0	0
FEB.	1	0	0	0	0	0	1
MAR.	0	0	0	0	0	0	0
APR.	1	0	0	0	0	0	1
MAY	0	0	0	0	0	0	0
JUN.	0	0	0	0	0	0	0
JUL.	0	0	0	0	0	0	0
AUG.	1	0	0	0	0	0	1
SEP.	1	0	0	0	0	0	1
OCT.	1	0	0	0	0	0	1
NOV.	1	0	0	0	0	0	1
DEC.	1	0	0	0	0	0	1
<b>TOTALS</b>	<b>7</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>7</b>

*\* An additional 5 non-enforceable off-site traffic related complaints have been received as of December 31, 2012.*

#### **4. CH<sub>4</sub> Surface Scans**

Landfill methane (CH<sub>4</sub>) emission surface scans are performed to determine the effectiveness of intermediate landfill cover systems in controlling landfill gas migration. Quarterly surface scans were completed on the landfill intermediate cover at JRL during 2012. Copies of the 2012 surface scans are provided in Attachment A and are kept on file in the Environmental Manager's office.

Surface scans were completed in general accordance with the New Source Performance Standard (NSPS) for municipal solid waste (MSW) landfills contained in 40 Code of Federal Regulations (CFR) Part 60, Subpart WWW, specifically Section 60.753(d) which states that each owner or operator of an MSE landfill with a gas collection and control system shall:

*“Operate the collection system so that the methane concentration is less than 500 parts per million above background at the surface of the landfill. To determine if this level is exceeded, the owner or operator shall conduct surface testing around the perimeter of the collection area and along a pattern that traverses the landfill at 30 meter intervals and where visual observations indicate elevated concentrations of landfill gas, such as distressed vegetation and cracks or seeps in the cover. The owner or operator may establish an alternative traversing pattern that ensures equivalent coverage...”*

Surface scans were completed using a MicroFID® (flame ionizing detector) mobile device that has a detection limit of 0.5 ppm and a concentration range of 0.5 to 50,000 ppm. During 2012, a total of six locations above the 500 ppm level were detected during the three scans performed, substantially less than the fifty six that were detected in 2011 during the four scans. A surface scan was not performed during the first quarter of 2012 due to weather restrictions

and safety concerns with snow/ice present on the synthetic intermediate cover. A quarterly breakdown is provided in Table 4-1. A majority of these readings above 500 ppm occurred around intermediate cover penetrations primarily around landfill gas collection piping, where boots had been damaged or moved due to landfill consolidation and settlement. These readings and their locations are documented, copies provided to the site supervisor and necessary corrective actions taken.

**Table 4-1 Readings above 500 ppm found during 2011 & 2012 CH<sub>4</sub> Surface Scans**

	Q1	Q2	Q3	Q4	TOTAL
2011	13	28	9	6	<b>56</b>
2012	NC	5	1	0	<b>6</b>

A comparison of scans from 2011 and 2012 shows a seasonal fluctuation in readings above 500 ppm as seen in Figure 4-1. This is expected with typically higher landfill anaerobic activity occurring during the warmer summer months, and less activity occurring during the colder winter months. During 2012, the average methane reading above the 500 ppm level was 999 ppm, as opposed to 1523 ppm during 2011. A quarterly comparison of average values from 2011 and 2012 is provided in Figure 4-2.

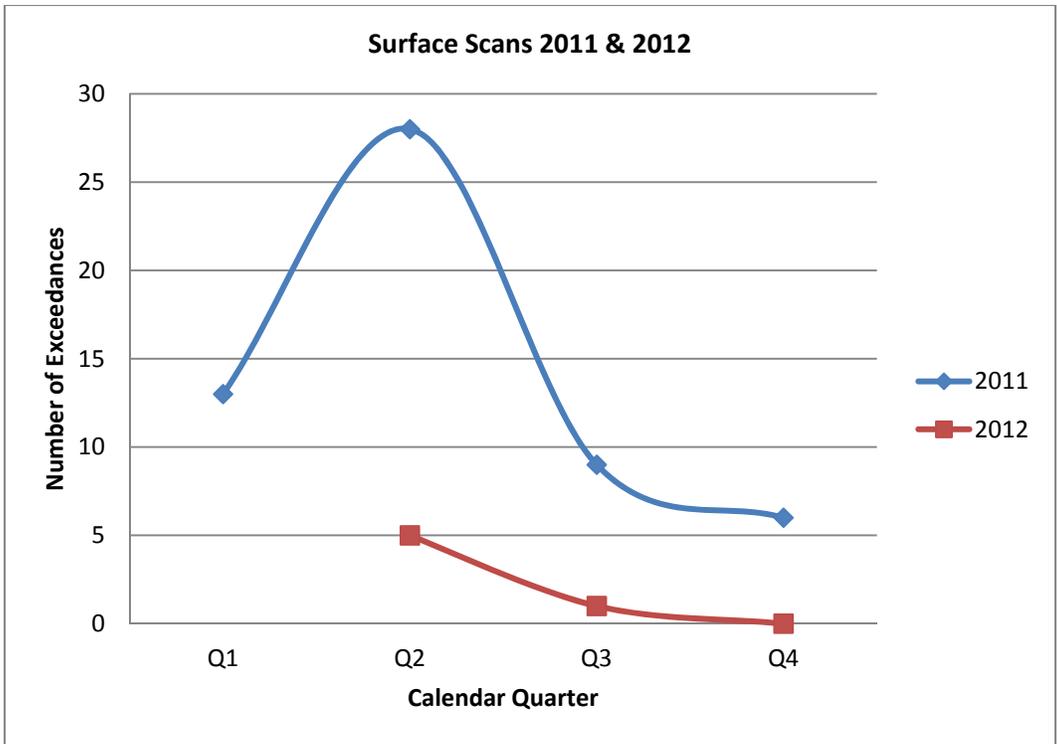


Figure 4-1 Readings above 500 ppm during quarterly CH<sub>4</sub> surface scans for 2011 & 2012

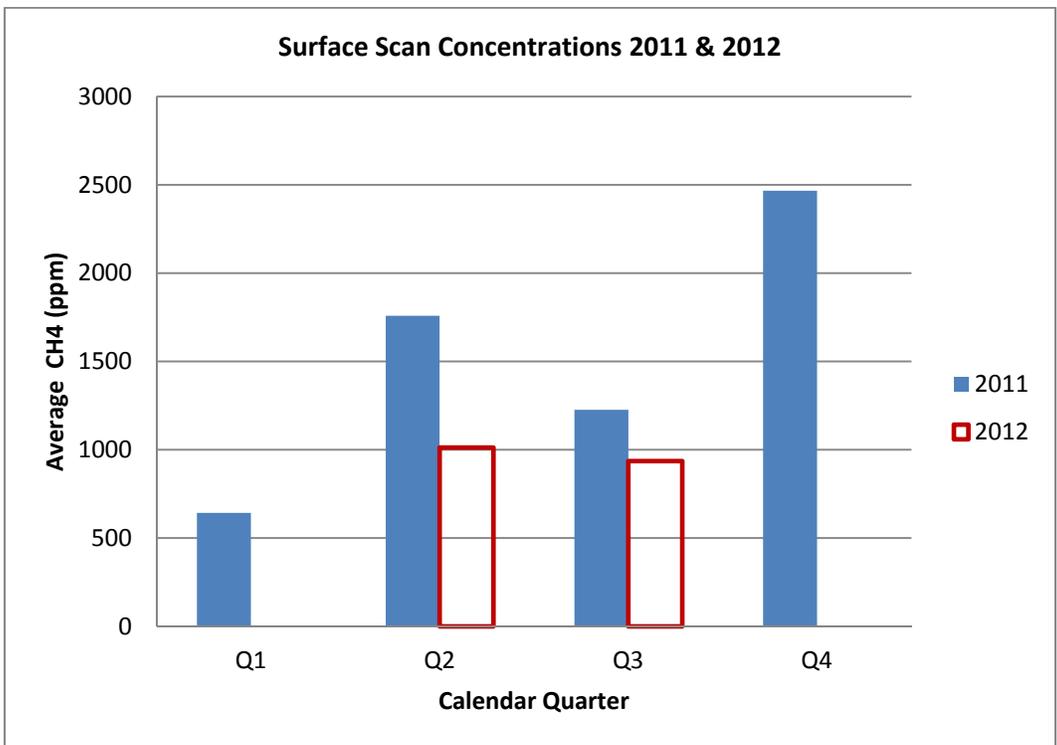


Figure 4-2 Average concentrations during quarterly CH<sub>4</sub> surface scans for 2011 & 2012

## 5. Summary

In accordance with the Juniper Ridge Landfill (JRL) operations manual, two types of air monitoring activities occurred on site during 2012; (1) hydrogen sulfide H<sub>2</sub>S monitoring with stationary continuous monitors and, (2) quarterly Methane (CH<sub>4</sub>) emission surface scans on the landfill intermediate cover. Additionally, odor complaints from the 24-hour JRL odor complaint hotline provide an opportunity to evaluate the effectiveness of odor control measures at the JRL.

Overall, average monthly and annual H<sub>2</sub>S concentrations remained low at the SPM's located around the landfill. When compared with 2011, the average H<sub>2</sub>S levels around the entirety of the site decreased during 2012 and were below the detection level of the monitors. Quantifiable readings decreased at all four locations during 2012. Detectable readings decreased at three of the four locations during 2012, with almost no change in detectable readings at the fourth, Stage Coach SPM, location. The largest decrease in these readings, -9.1% and -10.8% for quantitative and detectable respectively, is seen in the Access Road SPM, supporting the hypothesis that likely influence on the Access Road SPM during 2011 was from sources other than the JRL. The overall measurable readings around the entire site remained low during 2012.

Odor-related complaints decreased from 2011 to 2012, with a total of seven odor related complaints occurring during 2012 compared to twenty one in 2011. Of these complaints, only one during 2012 was confirmed as likely coming from the landfill as opposed to seven confirmed in 2011.

Surface scan CH<sub>4</sub> emission results decreased from 2011 to 2012 with a total of six readings above 500 ppm found during 2012 during three surface scans, compared with fifty-six above

that level detected in 2011 during four surface scans. The average concentration above the 500 ppm level decreased in 2012 from 1523 ppm to 999 ppm. Readings above 500 ppm, when they occur, continue to occur primarily around penetrations in the intermediate cover system and are fixed upon identification. Wear to cover boots due to landfill consolidation and settlement continue are the primary cause of this. These damages are repaired as soon as practical.

# Surface Scan

**Date:** 05-18-12      **Site Location:** Juniper Ridge Landfill

**Employee:** J. Pelletier      **Equipment Used:** Micro Fid

Time:	Location Description:	Northing:	Eastings:	Exceedence:	Corrective Action:
1030	G-W-12 (liner around well ripped/needs zip ties)	479060.08	926175.34	1200 PPM	(Cw) liner needs repair / Boats need zip ties / Boat needs sealed
1045	Pipes around 6-CT-383 (12" Boot needs sealed)	479063.47	925960.61	600 PPM	Boat sealed with Sikaflex - (Cw)
1050	12" on E/Side near valve toward G-W-B (liner around pipe ripped)	479006.10	926303.70	800 PPM	liner needs repair
1120	G-W-C (liner around well ripped)	478856.85	926332.50	1379 PPM	liner needs repair
1230	3E-02 (liner around well ripped)	478827.77	926275.69	1080 PPM	liner needs repair
<b>Authorized Signature:</b> 					<b>Date:</b> 05-18-12

Note: Cw = (means complied with)  
 • All other items require repair





*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

**ATTACHMENT H**

**Geotechnical Monitoring Report**



RICHARD E. WARDWELL, P.E., Ph.D.  
Geotechnical and Groundwater Engineer  
11710 Old Georgetown Rd., #1605, North Bethesda, MD 20852

(518) 668-2406 office  
arrew1@gmail.com

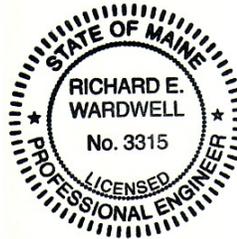
**2012 Annual Geotechnical Landfill Inspection Report  
Juniper Ridge Landfill  
West Old Town, Maine**

**April 2013**

Report to:

BGS/NEWSME Landfill Operations  
Hampden, Maine

Casella Waste Systems, Inc.  
Saco, Maine



Richard E. Wardwell, P.E., Ph.D.  
North Bethesda, MD 20852

## **EXECUTIVE SUMMARY**

The 2012 Annual Geotechnical Landfill Inspection Report for the Juniper Ridge Landfill describes the site visit made on June 27, 2012, and November 6, 2012 – one component of the ongoing landfill observations being performed in accordance with the Geotechnical Monitoring Plan (GMP, REW 2007b) as adjusted by changes described in the 2008 and 2010 Geotechnical Monitoring Reports (REW 2008a, 2011a). As stated therein, collection of electronic instrumentation data was curtailed due to logistics associated with the construction of Cell 4 and surveys of the slope displacement monuments (SDMs) and measurements of waste grade elevations at the instrument clusters were terminated to be consistent with the needs of a stable operational landfill and its resources.

During 2012, the geotechnical monitoring at JRL emphasized the routine observations of the landfill surface made during operations combined with an independent geotechnical inspection of the landfill slopes conducted on November 6, 2012. Observational methodology was used to assure that the geotechnical performance of the landfill facility was consistent with design and the Operations Manual (NEWSME 2010). This report summarizes the annual geotechnical inspection of the landfill and supplements previous Geotechnical Monitoring Reports through 2010 (REW 2005a, 2006, 2007a, 2008a, 2009, 2010a, 2011a), and last year's Landfill Inspection Report (REW 2012).

## Table of Contents

Executive Summary .....	i
1. Introduction.....	1
2. History of Landfill Development & Monitoring .....	1
2.1 Fort James Operation.....	1
2.2 State of Maine Purchase and Operations.....	3
2.3 Overview of Geotechnical Monitoring.....	3
3. Geotechnical Landfill Inspection.....	4
3.1 Landfill Observations .....	4
3.2 Annual Inspection.....	4
3.3 Surveys .....	5
3.4 Modifications to the Geotechnical Monitoring Plan .....	6
4. Summary.....	6
Appendix A – Geotechnical Landfill Inspection Forms	
Appendix B – Site Photographs (06/27/12)	
Appendix C – Site Photographs (11/06/12)	

## List of Figure

Figure 1: Site Plan.....	2
--------------------------	---

**2012 Annual Geotechnical Landfill Inspection Report  
Juniper Ridge Landfill Facility  
West Old Town, Maine**

## **1. INTRODUCTION**

The 2012 Annual Geotechnical Landfill Inspection Report (AGLIR) has been prepared for the State of Maine's Juniper Ridge Landfill (JRL) owned by the State of Maine Bureau of General Services (BGS) and operated by NEWSME Landfill Operations, LLC. (NEWSME), a subsidiary of Casella Waste Systems Inc. (CWSI). The landfill site plan, shown on Figure 1, is based on an aerial topographic survey performed on November 6, 2012. Geotechnical monitoring of this landfill was performed in accordance with the current Geotechnical Monitoring Plan (GMP, REW 2007b), as adjusted by mid-year 2008 modifications related to logistics associated with the construction of Cell 4 (REW 2008a) and modified by the termination of the survey measurements of slope displacement monuments justified in the 2010 GMR (REW, 2011).

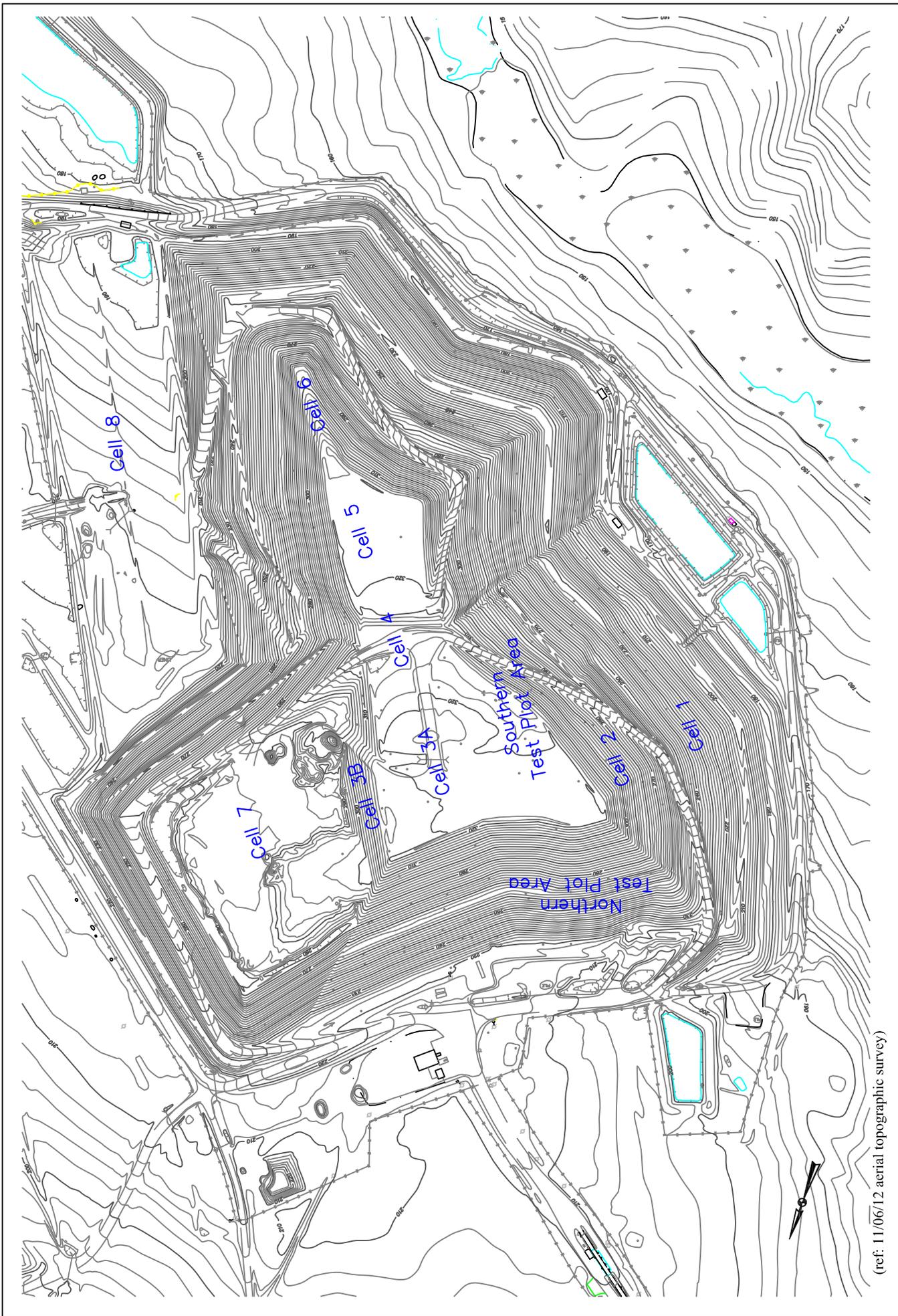
Specific activities in 2012 included photogrammetric topographic surveys of the landfill surface, periodic landfill observations, and an independent geotechnical landfill inspection. This report, presenting the results of a site visit made in June and the annual inspection made in November which supplement routine landfill observations performed by operational personnel to assure consistency with the Operations Manual (NEWSME 2010) as summarized in the yearly landfill report.

## **2. HISTORY OF LANDFILL DEVELOPMENT & MONITORING**

JRL was initially developed by Fort James Operating Company (FJC), a subsidiary of Georgia-Pacific Corporation, for its own use in the disposal of treatment plant sludges and other wastes from its mill in Old Town, Maine. In 2004, the State of Maine, through the State Planning Office (SPO), agreed to purchase the landfill for disposal of other approved in-state wastes including: construction and demolition debris (C&D), oversized bulky waste (OBW), front end processing residue (FEPR), ash from waste incinerators, other ashes from industrial incinerators, bypass municipal solid waste (MSW), and other miscellaneous wastes. This section discusses the history of landfill development at the site.

### **2.1 Fort James Operation**

Approximately 68 acres of a 780-acre property was licensed by FJC as a secure landfill, and operated by FJC from 1996 until 2004 when the State of Maine purchased the landfill. During this period, JRL, then called the West Old Town Landfill (WOTL), was used mainly for disposal of combined sludge from FJC's primary and secondary treatment plant in Old Town and fly ash from a biomass boiler at Eastern Paper's mill in Lincoln. Placement of the sludge began in December 1996 along the western portion of Cell 1. By 2001, operations had moved to the east into Cell 2. Details relating to the geotechnical behavior of FJC's sludge during the sequential landfill development is presented in previous reports (REW 2007a,b).



(ref: 11/06/12 aerial topographic survey)

Project No:  
1744

Figure No:  
1

Title:  
Site Plan  
Juniper Ridge Landfill

Project:  
2012 Annual Geotechnical Landfill Inspection Report

Client:  
State of Maine/NEWSME Landfill Operations LLC, West Old Town, Maine

By:  
REW

Checked:  
REW

Date:  
Feb. 2013

Scale:  
1" = 300'

Richard E. Wardwell, P.E., Ph.D.  
Geotechnical & Groundwater Engineering  
11710 Old Georgetown Rd., #1605  
North Bethesda, MD 20852

## **2.2 State of Maine Purchase and Operations**

In February 2004, the State of Maine, through the State Planning Office (SPO), purchased the landfill from FJC. It selected Casella Waste Systems, Inc. (CWSI) through its subsidiary NEWSME Landfill Operations LLC, to operate the disposal of in-state wastes.

Approximately 50,000 tons of sludge were initially brought to the landfill from FJC's Old Town mill before the mill closed in 2006. To improve deposit stability, SPO/NEWSME stabilized the existing sludge at the site by mixing it with approved in-state waste streams, i.e. C&D, OBW, FEPR, incinerator ash, bypass MSW, and other miscellaneous wastes. A detailed description of the test plots constructed to determine the geotechnical behavior of this waste and the sludge stabilization program were presented in previous annual monitoring reports (REW 2005a, 2006, 2007a, 2008a, 2009, 2010a, 2011) and annual geotechnical landfill inspection report (REW 2012).

Once the sludge stabilization program was completed by mid-2006, landfill operations moved into the western portion of Cell 3, depositing the mixtures of in-state waste. As shown on Figure 1, landfill operations then moved south into Cell 4 in 2009.

The remainder of the landfill capacity is being filled with the approved in-state waste streams, which, now and in the future, are estimated to include approximately 21% construction and demolition debris, 13% municipal solid waste (MSW), 8% MSW incinerator ash, 14% oversized bulky waste, 9% front-end process residue, 3% MSW bypass, and, the remainder, miscellaneous wastes including fines for cover and other operational materials (SME 2013). Based on performance to date, these mixture of wastes are stable at slopes up to 2.5H:1V, but are highly compressible and subject to gas generation. Based on the experience at each site, it is expected the in-state waste mixture will be more stable and less compressible than the waste-stabilized sludge. As a result, the most critical area for stability at JRL is the area underlain by the northern test plot (composed of 60/40 sludge-to-waste ratio), which is located at the north end of Cell 2 (see Figure 1).

## **2.3 Overview of Geotechnical Monitoring**

Historically, the critical stability issues with the landfill related to the papermill sludge previously placed by FJC. With stabilization of all the sludge (by mixing it with stable in-state waste) completed in 2006, the monitoring plan was modified in the 2007 GMP (REW 2007b) to reflect the routine needs associated with other landfills placed on firm soil foundations.

The 2007 GMP revised previous plans to reflect the fact that: 1) the previous sludge at the landfill has been stabilized and confined within the landfill by either the perimeter earthen berms or by the placement of the stable, in-state waste streams, and 2) slope stability and settlement monitoring since 2004 has accumulated a baseline of corroborative data and verified that the actual geotechnical behavior of waste-stabilized sludge in the landfill is consistent with design parameters.

Based on this, the intensity of previous program was modified to represent the monitoring needs associated with current waste mixtures placed in a landfill founded on a firm soil. Specifically, reliance on the extensive measurements of in-situ instruments was shifted to observation methodologies that are used to assure that the geotechnical performance of the landfill remained consistent with design analyses.

Field observations were supplemented since 2007 with slope measurements of the northern slope of Cell 2 that is underlain by the highest percentage of sludge remaining at JRL, i.e. up to 60% sludge mixed with 40% in-state waste. In 2010, this labor intensive survey program to monitor the slope displacement monuments was terminated based on the stable condition of the waste-stabilized sludge measured over the past three years and the consistency of the observed compression rates with the wealth of data collected from Casella's neighboring facility in Hampden, Maine (see 2010 GMR, REW 2011b).

During 2012, the performance of routine operational observations and the annual geotechnical inspection continued. Specifically, the remaining monitoring plan includes provisions for aerial surveys of the landfill configuration, visual observations to verify satisfactory landfill performance in terms of slope stability and settlement, and a mechanism to notify JRL and MEDEP of possible slope instabilities or detrimental strains in advance of their occurrence. The results from one component of this plan, the independent annual geotechnical landfill inspection, are summarized in the next section.

### **3. GEOTECHNICAL LANDFILL INSPECTION**

Geotechnical monitoring during 2012 included field observations during operations and an independent geotechnical inspection of the landfill relating to waste stability and settlement performance. A description of the landfill observations, the annual inspection, and topographic aerial surveys are discussed herein.

#### **3.1 Landfill Observations**

During 2012, corroboration of landfill performance with the design conditions used in the geotechnical analysis were confirmed in the field by monitoring the type, quantity, rate, and location of waste placement in accordance with the Operations Manual (NEWSME 2010), which, in part, is based on the results of geotechnical analyses completed for the landfill design and supported by the revised stability analysis (REW 2005b). Landfill performance was verified by visual site observations of the landfill as described in the Operations Manual and documented in the annual report. As part of this, the landfill surface was observed under the direction of a qualified geotechnical engineer for overall condition, evidence of cracking, localized depressions, erosion, leachate breakout on sideslopes, areas of ponded water, and toe heaving.

#### **3.2 Annual Inspection**

To supplement routine observations, a site visit was made on June 27, 2012 and an annual geotechnical inspection of the landfill area was performed on November 6, 2012. During both times, geotechnical observations were made to indicate that the waste placement, sideslope

construction, cover performance, and other construction/filling practices are consistent with the landfill's Operations Manual. Specifically, the appearance of the landfill slope and configuration was observed by an independent geotechnical engineer with special attention paid to the area of the waste-stabilized sludge along the northwestern slope of Cell 2. Observation reports, using the checklist presented in the 2007 GMP, were filled out and are included in the Appendix A of this report. A photographic record of the two site visits are included in Appendix B and C.

Inspection elements for assessment of geotechnical performance included:

#### Active Areas

- waste lift thickness
- active filling area slope angle
- final waste slope angle
- identification of areas with visible ponding, seepage, or indications of mass snow burial

#### Inactive Areas with Intermediate Cover In-Place

- overall surface and/or intermediate cover condition
- evidence of surface cracking
- localized surficial depressions in waste or cover surface
- erosion of cover material
- erosion of ditch linings
- leachate breakout on sideslopes
- areas of ponded water
- toe heaving
- grass kills
- gas venting

During both visits, geotechnical performance observations indicated that the landfill slopes were stable and that differential waste settlement was minor and can be managed to tolerable levels during final cover design. As indicated by the report from these site visits, the waste historically placed in Cells 1 through Cell 3 and the active waste placement in Cell 4 is performing as anticipated. At the time of the inspections, there were no indications of inconsistencies between site activities and the Operations Manual. In 2012, the critical area of the landfill underlain by the previous waste stabilized sludge appears to have behaved as anticipated with no indications of slope instabilities or excessive deformations.

### **3.3 Surveys**

Topographic surveys of the landfill surface were completed in 2012 using aerial photogrammetric methods. A spot check of surface elevations in November 2012 indicates that the waste slope angles are consistent with the project design and Operations Manual. Elevation contours for covered areas were visually examined for depressions, heaving, and ditch slope continuity, and, consistent with site observations, indicate that the landfill is performing as anticipated during design with no noticeable differential settlements or instabilities.

### **3.4 Modifications to the Geotechnical Monitoring Plan**

Based on observations of landfill activities and performance during 2012, there are no proposed changes to the Geotechnical Monitoring Plan beyond those made in 2008 and 2010.

## **4. SUMMARY**

Geotechnical monitoring of the JRL was performed to verify that the field behavior of the facility is consistent with design analyses. This program was modified in 2008 and 2010 to emphasize field observations of landfill activities in assuring consistency with the Operations Manual, and that there were no indications of potential slope instabilities or excessive settlements that might impact the performance of the facility. These modifications were made to address logistic conflicts with cell development and in recognition that the need for electronic waste settlement measurements and surveys of slope movements diminished as the waste elevation of the instrumented area approached its final grade without any discernible deformations.

Summaries of the routine operational inspections are presented in the annual landfill report. In accordance with the current GMP (REW 2007b), these routine observations were supplemented with an aerial topographic survey of the facility made on November 6, 2012, a site visit made on June 27, 2012, and the annual geotechnical inspection performed on November 12, 2012. The resulting checklists and photographic records from the site visits, included in the Appendices, documents observations that the landfill is performing as anticipated with no excessive deformations, slope movements, unexplained ponded water, or leachate breakouts. Specific site observations made of the northern slope of Cells 1 & 2 (an area of the landfill underlain with waste-stabilized sludge) indicate that this critical portion of the landfill is performing as anticipated during design.

## References

MEDEP (2008), *JRL Instrumentation*, email to REW authorizing abandonment of remaining electronic instrument, June 19.

NEWSME (2010), *2010 Operations Manual, West Old Town Landfill*, report prepared NEWSME Landfill Operations, Old Town, Maine and Casella Waste Systems, Inc., Saco, Maine.

REW (2005a), *Test Plot Construction and Monitoring Results, 2005 Geotechnical Monitoring Report, West Old Town Landfill*, report prepared by R.E. Wardwell, North Bethesda, MD for SPO/NEWSME Landfill Operations, Old Town, Maine and Casella Waste Systems, Inc., Saco, Maine, August.

REW (2005b), *Updated Geotechnical Stability Analyses, Condition 9, 2004 MDEP Solid Waste Order*, report prepared by R.E. Wardwell, North Bethesda, MD for SPO/NEWSME Landfill Operations, Old Town, Maine and Casella Waste Systems, Inc., Saco, Maine, October.

REW (2006), *Updated 2005 Geotechnical Monitoring Report, West Old Town Landfill*, report prepared by R.E. Wardwell, North Bethesda, MD for SPO/NEWSME Landfill Operations, Old Town, Maine and Casella Waste Systems, Inc., Saco, Maine, March.

REW (2007a), *2006 Geotechnical Monitoring Report, Juniper Ridge Landfill*, report prepared by R.E. Wardwell, North Bethesda, MD for SPO/NEWSME Landfill Operations, Old Town, Maine and Casella Waste Systems, Inc., Saco, Maine, March.

REW (2007b), *2007 Geotechnical Monitoring Plan, West Old Town Landfill*, report prepared by R.E. Wardwell, North Bethesda, MD for SPO/NEWSME Landfill Operations, Old Town, Maine and Casella Waste Systems, Inc., Saco, Maine, May.

REW (2008a), *2007 Geotechnical Monitoring Report, Juniper Ridge Landfill*, report prepared by R.E. Wardwell, North Bethesda, MD for SPO/NEWSME Landfill Operations, Old Town, Maine and Casella Waste Systems, Inc., Saco, Maine, April.

REW (2008b), *JRL Instrumentation*, email send to MDEP, May 20.

REW (2009), *2008 Geotechnical Monitoring Report, Juniper Ridge Landfill*, report prepared by R.E. Wardwell, North Bethesda, MD for SPO/NEWSME Landfill Operations, Old Town, Maine and Casella Waste Systems, Inc., Saco, Maine, April.

REW (2010a), *2009 Geotechnical Monitoring Report, Juniper Ridge Landfill*, report prepared by R.E. Wardwell, North Bethesda, MD for SPO/NEWSME Landfill Operations, Old Town, Maine and Casella Waste Systems, Inc., Saco, Maine, April.

REW (2010b), *2009 Geotechnical Monitoring Report, Pine Tree Landfill*, report prepared by R.E. Wardwell, North Bethesda, MD for SPO/NEWSME Landfill Operations, Old Town, Maine and Casella Waste Systems, Inc., Saco, Maine, April.

REW (2011a), *2010 Geotechnical Monitoring Report, Juniper Ridge Landfill*, report prepared by R.E. Wardwell, North Bethesda, MD for SPO/NEWSME Landfill Operations, Old Town, Maine and Casella Waste Systems, Inc., Saco, Maine, April.

REW (2011b), *2010 Geotechnical Monitoring Report*, prepared for Pine Tree Landfill by Richard E. Wardwell, North Bethesda, MD, April.

REW (2012), *2011 Geotechnical Landfill Inspection Report, Juniper Ridge Landfill*, report prepared by R.E. Wardwell, North Bethesda, MD for SPO/NEWSME Landfill Operations, Old Town, Maine and Casella Waste Systems, Inc., Saco, Maine, April.

SME (2013), email from Sevee & Maher Engineers, Inc., Cumberland, ME to R.E. Wardwell, North Bethesda, MD entitled "JRL Inspection Report", Sevee & Maher Engineers, Inc., Cumberland, ME, April 4.

# **APPENDIX A**

## **Geotechnical Landfill Inspection Forms**

**Table A-1**  
**Checklist: Annual Geotechnical Inspection**  
**2012 Site Visit Observations Juniper Ridge Landfill, West Old Town, Maine**

Observation Date: 6/27/12

Monitor Name: R.E. WARDWELL

Weather: MOSTLY CLOUDY, MID-60'S

Observation			Description (location, direction, appearance, etc.)	Proposed Action
Area	Sat.	Unsat		
<b>Active Area</b>				
location description	-	-	WESTERN CELL 3	n/a
slope stability	✓	-		
waste lift thickness	✓	-		
active slope angle	✓	-	2 3:1 VARIING TO 2:1	
erosion	✓	-		
leachate breakout	✓	-	NONE OBSERVED (N/O)	
ponded water	✓	-	N/O	
toe heaving	✓	-	N/O	
overall condition	✓	-	STABLE OPERATIONAL SLOPE	
<b>Inactive Area (Synthetic)</b>				
location description	-	-	SINK OVER NORTH & EAST PORTIONS OF SOUTH & MAJORITY OF WEST SLOPE	n/a
slope stability	✓	-		
cracking	N/A	-	HEMISPHERIC COVER	
erosion	N/A	-	" "	
leachate breakout	N/A	-	" "	
ponded water	OK	-	WASTEWATER SPILLAGE PERCHED ON TOP OF SINK - CELL 4	
toe heaving	✓	-	N/O	
overall condition	✓	-	STABLE SLOPE APPEARANCE	
<b>Interim Soil Cover</b>				
location description	-	-	PORTIONS OF WEST SLOPE CLIP: BOTTOM 1/3 OF GRASS	n/a
overall surface condition	✓	-	GOOD GRASS GROWTH ON SLOPE	
cracking	✓	-	N/O	
erosion of cover material	✓	-	N/O	
erosion of ditch linings	✓	-	N/O	
leachate breakout	✓	-	N/O	
ponded water	✓	-	N/O, UNIFORM SLOPES	
toe heaving	✓	-	N/O	
grass kills	✓	-	N/O	
gas venting	✓	-	N/O BROWN VENTS	
overall condition	✓	-	GOOD CONDITION	

Table A-2

## Checklist: Annual Geotechnical Inspection

## 2012 Annual Geotechnical Landfill Inspection Report, Juniper Ridge Landfill, West Old Town, Maine

Observation Date: 11/6/12

Monitor Name: RICHARD WARDWELL

Weather: PRT CLDY, 30's

Observation			Description (location, direction, appearance, etc.)	Proposed Action
Area	Sat.	Unsat		
<b>Active Area</b>				
location description	-	-	WESTERN CELL 3	n/a
slope stability	✓	-		
waste lift thickness	✓	-		
active slope angle	✓	-	4:3:1 VARYING TO 2:1	
erosion	✓	-		
leachate breakout	✓	-	NONE OBSERVED (NO)	
ponded water	✓	-	NO	
toe heaving	✓	-	NO	
overall condition	✓	-	STABLE SLOPE APPEAR.	
<b>Inactive Area (Synthetic)</b>				
location description	-	-	SIGN OVER NORTH & SOUTH EAST PORTION OF SOUTH & MAJORITY OF WEST SLOPE	n/a
slope stability	✓	-		
cracking	N/A	-	MEMBRANE COVER	
erosion	N/A	-	" "	
leachate breakout	N/A	-	" "	
ponded water	✓	-	NO	
toe heaving	✓	-	NO	
overall condition	✓	-	STABLE SLOPE APPEAR.	
<b>Interim Soil Cover</b>				
location description	-	-	PORTIONS OF WEST SLOPE (I.E. BOTTOM OF SLOPE - GRASS)	n/a
overall surface condition	✓	-	GRASS GROWTH EVID. ON WEST	
cracking	✓	-	NO	
erosion of cover material	✓	-	NO	
erosion of ditch linings	✓	-	NO	
leachate breakout	✓	-	NO	
ponded water	✓	-	NO, UNIFORM SLOPES	
toe heaving	✓	-	NO	
grass kills	✓	-	NO	
gas venting	✓	-	NO BTOW VENTS	
overall condition	✓	-	GOOD CONDITION	

# **APPENDIX B**

## **Site Photographs (6/27/12)**

6/27/12 Site Visit



north side, looking south at northern slopes of Cell 3 (left) and Cell 1&2 (right)



northern slope looking west along transition slope between Cell 3 and Cell 1 & 2

6/27/12 Site Visit



NE corner looking east at northern slope of Cell 3B



Cell 3 - eastern interim slope looking north

6/27/12 Site Visit



eastern interim slope, Cell 3, looking northeast towards active cell



top of Cell 4 looking north

6/27/12 Site Visit



SE corner looking north along eastern slope of Cell 4



SE corner of Cell 4 looking west along southern slope of Cell 4



SW corner of Cell 4, looking northwest along lower southwestern slope of Cell 4



western side, looking southeast along western slope of Cell 4



SW corner looking north along western slope of Cells 1&2 (Cell 4 in foreground)



western side, looking northeast at western slope of Cell 1&2

# **APPENDIX C**

## **Site Photographs (11/6/12)**

11/06/12 Site Visit



NW corner looking east along northern slope of Cell 1 & 2 (foreground) Cell 3 (background)



northern slope looking west along transition slope between Cell 3 and Cell 1 & 2



NE corner on top looking east at active cell



Cell 3 - eastern interim slope (with active cell to left) looking south

11/06/12 Site Visit



eastern interim slope, Cell 3, looking northeast towards active cell



northeast corner: top of Cell 3 looking southwest



eastern slope of Cell 4 looking south



SE corner of Cell 4 looking west along southern slope of Cell 4



SW corner of Cell 4, looking northwest along lower southwestern slope of Cell 4



western side, looking southeast along western slope of Cell 4



SW corner looking north along western slope of Cells 1&2 (Cell 4 in foreground)



western side, looking southeast at western slope of Cell 1 & 2 (left)/Cell 4 (right)

*Juniper Ridge Landfill  
2012 Annual Report  
April 2013*

**ATTACHMENT I**

**Updated Closure and Post-Closure Cost  
Estimates**

March 8, 2013

12172

20130308 JL.doc

Mr. Jeremy Labbe  
Environmental Compliance Manager  
Pine Tree Landfill  
358 Emerson Mill Rd  
Hampden, ME 04444

Subject: Update of Opinion of Capital Closure and Post-Closure Costs  
For Calendar Year 2013  
Juniper Ridge Landfill  
Old Town, Maine

Dear Jeremy:

As requested by NEWSME Landfill Operations, LLC (NEWSME), Sevee & Maher Engineers, Inc. (SME) has updated our opinions of capital closure and post-closure costs for the Juniper Ridge Landfill (JRL) in Old Town, Maine for calendar year 2013. The capital closure cost is for those cells that, as of the end of the calendar year 2013, have been or will be constructed and operational, but have not received final cover. These include Cells 1, 2, 3A, 3B, 4, 5, 6, 7, and 8. In total, these landfill cells have approximately 57.3 acres of closure area. Our opinion of the capital closure cost to close the 57.3 acres is \$11,094,943. This cost is based on a per-acre closure cost presented in Table 1, for a final cover consistent with the requirements of Maine Department of Environmental Protection (MEDEP) Solid Waste Management Regulations (SWMRs). The unit costs used to develop the closure cost are from material unit costs obtained for the 2012 Cell 8 construction project at JRL, and similar projects in central Maine adjusted for cover versus cell construction.

The post-closure monitoring and maintenance cost for the site (developed as of December 2013) is \$6,749,400 presented in Table 2. The post-closure costs assume a 30-year post-closure period and are presented on a yearly basis in 2013 dollars.

Our opinion of closure and post-closure costs is based on the following assumptions.

1. The closure of the individual cells will consist of placing final cover over the areas of the developed landfill which have not received final cover. Note that operational costs such as placement and removal of intermediate cover are not included in the final cover costs presented herein. The cost for active gas

system modifications assumes the existing gas collection system installed as part of landfill operations will be modified to operate during the post-closure period.

2. The final cover of these cells will consist of the components outlined in the current SWMRs. Our opinion of closure costs are based on unit material prices developed from the construction bids for NEWSME's Cell 8 project and other similar projects in the central Maine area adjusted for closure versus cell construction. These costs are also based on our current understanding of site conditions. Actual closure costs may vary and are dependent upon the actual nature and extent of waste placement, timing of closure, and other factors not evident at this time.
3. The post-closure costs include costs for post-closure activities including landfill inspection, water quality monitoring, leachate management, general site maintenance, gas maintenance, and engineering for the entire facility. These post-closure costs are based on our current understanding of site conditions. Actual post-closure costs will vary and are dependent upon the actual nature of site conditions at the time of closure, long-term management decisions of NEWSME and the Regulators, and other factors not evident at this time.

If there are any questions concerning the cost issues presented in this letter, please feel free to contact us.

Sincerely,

SEVEE & MAHER ENGINEERS, INC.



Michael S. Booth, P.E.  
Project Engineer

Attachments

- Table 1 - Opinion of Final Cover Costs for the JRL as of December 2013
- Table 2 -Opinion of Post-Closure Monitoring and  
Maintenance Costs for Juniper Ridge Landfill as developed in  
Calendar Year 2013

cc: Toni King, NEWSME  
Wayne Boyd, NEWSME

**TABLE 1**  
**SME's Opinion of Final Cover Costs For Juniper Ridge Landfill For Landfill Area Developed as of**  
**December 2013**

JUNIPER RIDGE LANDFILL PER-ACRE FINAL COVER COSTS w/ Gas (Update 2/2013)				
ITEM	UNIT	QUANT.	UNIT COST <sup>(1)</sup>	TOTAL
Mobilization	L.S.	1	\$15,000	\$ 15,000
Erosion Control	L.S.	1	\$3,000	\$ 3,000
Active Gas System Modifications	L.S.	1	\$21,700	\$ 21,700
Site Grading	L.S.	1	\$2,750	\$ 2,750
Drainage Terraces	L.S.	1	\$12,000	\$ 12,000
24" compacted clay	C.Y.	3,230	\$16.00	\$ 51,680
Texture Membrane	SQ.FT.	43,600	\$0.60	\$ 26,160
12" Sand Common Borrow	C.Y.	1,620	\$16	\$ 25,920
12" Vegetative Cover	C.Y.	1,620	\$20	\$ 32,400
Seed & Mulch	L.S.	1	\$2,500	\$ 2,500
Engineer/Const. Monitoring	L.S.	1	\$19,000	\$ 19,000
			<b>Total</b>	<b>\$ 212,110</b>

(1) Unit Cost based upon Third Party Construction cost  
(Cell 8 bids May 2012)adjusted to reflect the size and scope  
of closure project.

JUNIPER RIDGE LANDFILL PER-ACRE FINAL COVER COSTS w/out gas(Update 2/2013)				
ITEM	UNIT	QUANT.	UNIT COST <sup>(1)</sup>	TOTAL
Mobilization	L.S.	1	\$15,000	\$ 15,000
Erosion Control	L.S.	1	\$3,000	\$ 3,000
Site Grading	L.S.	1	\$2,750	\$ 2,750
Drainage Terraces	L.S.	1	\$12,000	\$ 12,000
24" compacted clay	C.Y.	3,230	\$16.00	\$ 51,680
Texture Membrane	SQ.FT.	43,600	\$0.60	\$ 26,160
12" Sand Common Borrow	C.Y.	1,620	\$16	\$ 25,920
12" Vegetative Cover	C.Y.	1,620	\$20	\$ 32,400
Seed & Mulch	L.S.	1	\$2,500	\$ 2,500
Engineer/Const. Monitoring	L.S.	1	\$19,000	\$ 19,000
			<b>Total</b>	<b>\$ 190,410</b>

	Acres	Closure Cost
Area with Existing Gas Collection	48.8	\$9,292,008
Area without Gas Collection (Cell 8)	8.5	\$1,802,935
<b>Total</b>		<b>\$11,094,943</b>

