AECOM Environment

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Beaver Smelting Site
Fallsburg, NY
Periodic Review Report
December 31, 2014 to December 31, 2017
NYSDEC Site Number: 3-53-005

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Engineering Certification

I certify that I am currently a NYS registered professional engineer and that this Periodic Review Report covering the period of December 31, 2014 to December 31, 2017 for the Beaver Smelting site was prepared in accordance with all applicable statutes and regulations and in substantial conformance with the DER Technical Guidance for Site Investigation and Remediation (DER-10) and that all activities were performed in full accordance with the DER-approved scope of work and any DER-approved modifications.

Respectfully submitted,
AECOM

Michael L Spera

January 29, 2018

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Date

Executive Summary

Site History and Remedial Program

The Beaver Smelting site (site) is located in the Town of Fallsburg, Sullivan County, New York (Figure 1). The site (Site Number 3-53-005) is approximately 13 acres in size and is a former aluminum recycling facility that operated for 25 years, resulting in several large and small piles of ash at the facility. In response to a complaint filed in 1984 and the results of an extraction procedure (EP) toxicity test for lead on ash from these piles, a field investigation and feasibility studies were completed between 1986 and 1989 by the responsible party that showed lead, cadmium, and selenium at values above New York State Department of Environmental Conservation (NYSDEC) groundwater standards. In response, a 1989 Consent Order (CO) agreement with the Attorney General was issued that mandated remediation of the site that included consolidation and containment of the exposed ash piles. This remediation was completed in 1991.

Site management began in January 1992 as part of the CO, with the last round of sampling to be performed by the responsible party in October 1994. The NYSDEC then assumed responsibility to perform site management activities. In 2005, the NYSDEC retained AECOM to complete groundwater monitoring for select Superfund Sites under their standby contract, one of which was the Beaver Smelting site. The monitoring wells were sampled twice during 2005 and once each during 2007, 2008, 2010, 2011, 2013, 2015, 2016, and 2018. The data from 2015 and 2016 are presented in this Periodic Review Report (PRR). The monitoring wells were also sampled in January 2018; these results will be presented in the next PRR.

A Site Management Plan (SMP) was finalized in 2014 by AECOM defining the site monitoring requirements of site inspections semi-annually and groundwater sampling of 11 wells (i.e., MW-2; MW-3; MW-4; MW-5; MW-6; MW-7; MW-9; MW-10; MW-11; MW-12; MW-13) every five quarters.

Remedy Evaluation

The periodic review process is used for determining if a remedy continues to be properly managed as required by the approved guidance documents (the SMP, the operation, maintenance, and monitoring (OM&M] plans, and CO) and is protective of human health and the environment. This Periodic Review Report (PRR) covers the certification period between December 31, 2014 and December 31, 2017.

Overall, the remedy is performing properly and is effective; however, metals remain distributed across the site in groundwater at concentrations exceeding the applicable standards. Monitoring of the site should continue to verify that the decreasing contaminant trends continue until site cleanup goals are met.

Total costs for performing the required monitoring, inspections, and reporting is approximately $19,000 per year.

1.0 Site Overview

The Beaver Smelting site (site), NYSDEC Site No. 3-53-005, is located on Beaver Lane in the Town of Fallsburg, Sullivan County, New York (Figure 1). The Class 4 site, which means it has been properly closed but requires continued site management consisting of operation, maintenance, and monitoring, was a former aluminum recycling facility that was in operation for twenty five years until closing in 1981. There were three large and numerous small piles of ash which failed the EP Toxicity test for lead. A remedial investigation/feasibility study (RI/FS) was conducted by the responsible party (RP) under a CO with the Attorney General. The RI/FS, approved in March 1989, revealed that the overburden consisted of 10 to 20 feet of dense glacial till with large amounts of silt, clays, and fragipan, which severely limits the ability of water to penetrate into the underlying sandstone and shale bedrock. The RI/FS identified two aquifers; a perched aquifer exists in the overburden, and a bedrock aquifer, where the local water supply wells are located, is approximately 300 feet below the ground surface.

In October 1991, approximately 9,000 cubic yards of smelter ash waste was consolidated, stabilized, and capped to prevent direct contact with the waste material and reduce leaching of the contaminants to groundwater. A lime stabilization process was utilized to minimize the potential for contaminant leaching. A groundwater interceptor trench was constructed upgradient of the landfill waste to minimize infiltration. Due to the high clay content of the soil, migration of contaminants into the groundwater was deemed unlikely. Site management began in January 1992 as part of the CO. In accordance with the CO, the last round of sampling to be performed by the RP was conducted in October 1994, when the NYSDEC then assumed responsibility for groundwater monitoring.

There is currently a small two acre capped landfill located on the west side of Beaver Lane with two large buildings remaining on the site from the former aluminum smelting activity. The surrounding area is both wooded and has open grassy fields. Current zoning includes mixed residential, commercial, and agricultural use. The site and buildings are currently used as an equipment storage yard for a local contractor. A number of residences are located on Beaver Lane, and farming is seen in adjacent fields.

The private drinking water supply wells serving homes near this site, which draw water from the deep bedrock aquifer, were sampled in 1988, 1993, 1995 and 2009. Site-related contaminants were not detected in any of the wells sampled. An on-site drinking water supply well, also in the bedrock, was sampled in the spring of 2001 for metals and volatile organic compounds. No site-related contaminants were detected.

1.1 Objectives of the Periodic Review

The periodic review process is used for determining if a remedy continues to be properly managed, as set forth in the SMP, and continues to protect human health and the environment. The objectives of the periodic review for sites in the State Superfund Program are as follows:

- Evaluate compliance with the decision document(s) and, if available, the SMP.
- Evaluate all treatment units where applicable, and recommend repairs or changes, if necessary.
- Evaluate the condition of the remedy.

- Evaluate whether mandated Institutional Controls (ICs) are in place and that required Engineering Controls (ECs) are working and effective.
- Evaluate costs.

1.2 Remedial History

Beaver Smelting and Refining was an aluminum recycling facility that operated for twenty five years. There were three large and numerous small piles of ash located on the site. In response to a complaint filed in 1984 and the results of an EP toxicity test for lead on ash from these piles (13.63 mg/L and 200.45 mg/L), field investigations and feasibility studies were completed between 1986 and 1989 by Lawler, Matusky & Skelly Engineers (LMS) for the Beaver Smelting Company. These investigations reported metals including lead, cadmium, and selenium at values above NYSDEC groundwater standards and led to a 1989 CO agreement with the Attorney General mandating remediation of the site. Per the CO, the goal of the remediation was to alleviate the threat from the hazardous substances on site as well as to prevent the migration of hazardous substances off-site by the consolidation of the ash piles, the stabilization of the hazardous substances contained therein, and the placement of clean fill material layered with lime.

The field investigation involved the following activities from the fall of 1986 through the fall of 1987:

- Construction of 11 shallow (12 to 20 feet deep) groundwater monitoring wells in the sediment adjacent to the three ash fills;
- Drilling of five additional borings in the ash to depths 2 to17 feet below grade;
- Collection of 11 water samples from the groundwater monitoring wells, eight from the seeps at the bases of the fills, and five from the stream;
- Collection of three sediment samples from an on-site pond;
- Laboratory analyses of all water and pond sediment samples for heavy metals and some groundwater samples for volatile organic compounds (VOCs);
- Laboratory analyses of soil samples for cation exchange capacity (CEC);
- Resampling of ground and surface waters for heavy metals;
- Aerial photography and photogrametric mapping of the site and surveying of wells;
- Drilling of 10 borings in each of the three fills and the collection of ash samples; and
- Bench scale chemical treatability study.

The field investigations and feasibility studies were approved in March 1989. Results of these investigations showed groundwater standards being exceeded for lead, cadmium, selenium, and pH and revealed that the overburden consisted of 10 to 20 feet of dense glacial till with large amounts of silt, clay, and fragipan. Due to the very high turbidity of the groundwater in those wells caused by suspended silts and clays, both filtered and unfiltered samples were collected with greater emphasis placed on the results of the filtered (dissolved) results, which are more representative of the

groundwater chemistry. The July 1989 results indicated that concentrations ranged from 15 to 48 micrograms per liter (µg/L) for lead and 18 to 120 µg/L for selenium; however, selenium exceeded the standards in the upgradient wells and was therefore not related to the site. No VOCs were detected in the groundwater samples.

A CO for remediation of the site was signed by the Attorney General in March 1990 and includes the following remedial components:

- Consolidation of nearly 9,000 cubic yards of smelter ash;
- Grading and capping of the consolidated ash;
- Institutional controls and restrictions on the use of the property and future use of groundwater; and
- Monitoring of on-site groundwater contamination to monitor the short term and long term effectiveness of the remedy. Per the CO, groundwater monitoring was to consist of analysis of the following parameters:
    - Aluminum,
    - Beryllium,
    - Cadmium,
    - Iron,
    - Lead,
    - Manganese,
    - Selenium, and
    - Hexavalent chromium

In October 1991, approximately 9,000 cubic yards of smelter ash waste was consolidated, stabilized, and capped to prevent direct contact with the waste material and reduce leaching of the contaminants to groundwater. A lime stabilization process was utilized to minimize the potential for contaminant leaching. A groundwater collection trench was constructed upgradient of the landfilled waste to minimize infiltration. Due to the high clay content of the soil, migration of contaminants into the groundwater was deemed unlikely. Site management began in January 1992 as part of the CO. In accordance with the CO, the last round of sampling performed by the RP was conducted in October 1994. The NYSDEC then assumed responsibility to perform site operation, maintenance and monitoring (OM&M). In 2005, the NYSDEC retained AECOM to do groundwater monitoring for select Superfund Sites under their Standby Contract, one of which was the Beaver Smelting site. A SMP was finalized by AECOM in 2014 that defined the objectives for site monitoring requirements and outlined site maintenance requirements, which included site inspections semi-annually and groundwater sampling of 11 wells (i.e., MW-2; MW-3; MW-4; MW-5; MW-6; MW-7; MW-9; MW-10; MW-11; MW-12; MW-13) every five quarters. During the reporting period of this PRR, groundwater sampling was completed in 2015 and 2016.

The private drinking water supply wells serving homes near this site, which draw water from the deep bedrock aquifer, were sampled in 1988, 1993, 1995, and 2009. Site-related contaminants were not detected in any of the wells sampled. An on-site drinking water supply well was sampled in the spring of 2001. No site-related contaminants were detected.

2.0 Evaluate Remedy Performance, Effectiveness, and Protectiveness

Since remaining waste, contaminated soil, and contaminated groundwater exist beneath the site, EC/ICs are required to protect human health and the environment. EC/ICs at the site currently consist of:

- A soil cover placed over consolidated landfilled material to prevent exposure to and migration of contaminants;
- A monitoring well network to be maintained and utilized to monitor the effectiveness of the remedial program on the groundwater at the site;
- A perimeter ditch installed to minimize infiltration of groundwater into the soil cover and to collect surface runoff;
- Land use restrictions; and
- Development and implementation of a SMP that defines the scope of required activities to properly maintain the site and ensure remedy effectiveness. This SMP outlines requirements for:
    - Long-term monitoring of negatively impacted environmental media to provide the necessary data to determine the effectiveness of the remedy, and
    - Semi-annual site inspections to verify condition of the ECs on the site.

The site has been maintained, and monitoring events have been performed (1992 through 2018) following completion of the remedial activities. The site inspections and groundwater monitoring performed at the site during the reporting period covered by this PRR, December 31, 2014 to December 31, 2017, were completed in general accordance with the site SMP (AECOM 2014). This PRR presents the data collected through 2016. Groundwater sampling and site inspections were not conducted in 2017 as the SMP is undergoing revision to address groundwater turbidity issues and to include a project Health and Safety Plan (HASP). The most recent groundwater sampling event and site inspections were completed in January 2018, just following the end of the reporting period covered by this PRR. A groundwater sampling report will be provided to NYSDEC when the January 2018 data are available from the laboratory, and these data and the results of the January 2018 inspections will be incorporated into a subsequent PRR.

2.1 Operation, Maintenance, and Monitoring Plan Compliance Report

2.1.1 Confirm Compliance with the OM&M Plan

Site inspections are to be conducted semi-annually with a landfill inspection form completed detailing the observations. Specific areas of the inspection include the following at a minimum:

- Cap integrity (e.g., standing water, deep rooting vegetation, stressed vegetation, settling, erosion, leachate outbreaks, burrowing animals);
- Perimeter ditch condition; and
- Monitoring well network condition (e.g., identification, accessibility, physical damage, missing components, security, and infestation).

Site inspections completed in April 2015, December 2015, May 2016, November 2016, and January 2018 verified that the ECs were maintained as designed. The most recent site inspection was completed in January 2018, just following the end of the reporting period covered by this PRR. No issues were identified during this recent site inspection. Because it was completed during the 2018 to 2020 reporting period, the field forms and details for this site inspection will be provided in a subsequent PRR.

No issues were found with the monitoring well network. All wells were found to be in good condition. A previously identified seep was observed to still be active on the west side of the landfill, although the cover is remaining stable in the area of the seep, and it has not changed since prior site inspections.

Site and monitoring well inspection logs are included as Appendix A as well as photo logs from the site inspections completed in 2015 and 2016.

Pursuant to the site SMP (AECOM 2014), groundwater quality at each of the site monitoring wells is to be monitored until concentrations of contaminants are less than the established remedial goals. During this reporting period, groundwater sampling of the site's monitoring well network for total and dissolved metals was completed in January 2015 and March 2016. A Groundwater Monitoring Report evaluating the results of the site monitoring and assessing whether this remedy is performing effectively was submitted in November 2016 for these 2015 and 2016 sampling events. Results of this monitoring performed to date are discussed in Section 3.1.2, and data are presented in Tables 1 through 3 and Figures 3 through 13.

Activity	Required Frequency		Compliance Dates
	Semi-Annual	15 Months	
Groundwater Sampling*		X	January 2015; March 2016; January 2018
Soil Cover Inspection*	X		April 2015; December 2015; May 2016; November 2016; and January 2018
Perimeter Ditch Inspection*	X		April 2015; December 2015; May 2016; November 2016; and January 2018
Monitoring Well Network Inspection*	X		April 2015; December 2015; May 2016; November 2016; and January 2018

*Note: Groundwater sampling and site inspections were not conducted in 2017 as the SMP is undergoing revision. The most recent groundwater sampling event and site inspections were completed in January 2018, just following the end of the reporting period covered by this PRR. Consequently, details for these events will be provided with the PRR covering the 2018 to 2020 reporting period.

2.1.2 Confirm that Performance Standards are Being Met

Tables 1 through 3 and Figures 3 through 13 include data from the monitoring events performed between 1992 and 2016. The figures show the temporal trends for the contaminants that exceeded the New York State Ambient Water Quality Standards (AWQS) or Guidance Values (TOGS 1.1.1) for groundwater in at least one of the samples collected during the monitoring period.

As noted during the early field investigations completed during the late 1980s and observed during subsequent sampling events, the turbidity in the site groundwater is very high ranging from about 3.9 NTUs to levels from several wells exceeding the instrument limit (>1,000 NTUs) during the 2015 and 2016 sampling events. In order to provide a more comprehensive view of the groundwater quality in the vicinity of the site with respect to metals, both filtered and unfiltered groundwater samples are collected during sampling and analyzed for each well consistent with Section 2.1 of NYSDEC DER-10 (May 3, 2010). These results from the 2015 and 2016 sampling are discussed below.

Unfiltered Groundwater Samples

Concentrations of metals are generally consistent with previous sample results (see Figures 3 through 13 and Table 1); however, for several analytes in some of the monitoring wells, a peak is observed from the 2015 sampling event. These peaks are likely attributed to higher turbidity of the samples collected in 2015. Iron, lead, and manganese are found widely distributed in the monitoring wells at concentrations exceeding the respective New York State AWQS (TOGS 1.1.1). Detections of iron ranged from 20 to 559,000 µg/L in 2015 and 100 to 32,600 µg/L in 2016. The AWQS of 300 µg/L was exceeded at all sampled wells with the exception of MW-13 in 2015 and MW-2, MW-5, and MW-13 in 2016. Detections of lead ranged from 2.4 to 1,280 µg/L in 2015 and from 1.9 to 224 µg/L in 2016. In 2015, the AWQS for lead, 25 µg/L, was exceeded in all wells with the exception of MW-3, MW-5, MW-

6, and MW-13. During the 2016 sampling, detections of lead exceeded the AWQS at only two monitoring wells, MW-4 and MW-10. This is likely due at least in part to the lower turbidity levels of the 2016 samples. Detections of manganese ranged from 76.9 to 13,600 µg/L in 2015 and 66.4 to 1,840 µg/L in 2016, exceeding the AWQS of 300 µg/L at all wells except MW-6 in 2015 and MW-2, MW-6, MW-7, and MW-9 in 2016.

Several other analytes were detected at concentrations exceeding the respective AWQS in many of the wells from the 2015 samples, likely due to the excessive turbidity levels in these samples (Figures 3 through 13 and Table 1). In the 2016 samples, where notably lower turbidity levels were achieved, exceedances were observed for the following analytes:

- Antimony was detected in site groundwater at an estimated concentration of 9.6 µg/L, exceeding the AWQS Guidance Value of 3 µg/L at one monitoring well (MW-10). Antimony was below the method detection limit for all other Site wells; however, it should be noted that the laboratory limits exceeded the Guidance Value.

- Arsenic was detected in site groundwater at a concentration of 66.3 µg/L, exceeding the AWQS of 25 µg/L, at one monitoring well (MW-4). There were no other detections exceeding this limit in the other site wells.

- Selenium was detected in site groundwater at concentrations exceeding the AWQS of 10 µg/L at four of the monitoring wells: 191 µg/L at MW-2; 21.6 µg/L at MW-3; 22.2 µg/L at MW-10; and 52.8 µg/L at MW-11.

- Sodium was detected in site groundwater at concentrations exceeding the AWQS of 20,000 µg/L at three monitoring wells: 21,100 µg/L at MW-3; 25,500 µg/L at MW-4; and 35,900 µg/L at MW-13.

Filtered Groundwater Samples

Due to the elevated turbidity in the groundwater on this site, filtered samples were also collected and analyzed for metals. While the dissolved samples did indicate fewer exceedances of the respective AWQS and Guidance Values, exceedances were observed. Analytical results for the dissolved samples are provided in Tables 2 and 3 for the January 2015 and March 2016 events, respectively. These filtered results are not reported in trend figures similar to Figures 3 through 13 because only a few years of filtered data are available at this time; however it is suggested that trend graphs be presented in the next PRR with the addition of the groundwater samples collected in January 2018.

Several analytes were detected at levels exceeding the respective AWQS in many of the wells from the 2015 samples (Table 2), likely due to the excessive turbidity levels in these samples. While these samples were field filtered, a more turbid sample could be expected to act as a source for dissolved material within the sample. In the 2016 samples, where notably lower turbidity levels were achieved, exceedances were observed for the analytes discussed below (Table 3).

Based on the results for the 2016 filtered (dissolved) data, exceedances of the AWQS for iron and manganese were most widespread across the site. The AWQS for iron (300 µg/L) was exceeded at MW-4, MW-9, MW-10, and MW-12 with concentrations ranging from 351 to 7,380 µg/L. The AWQS for manganese (300 µg/L) was exceeded at MW-3, MW-4, MW-5, MW-12, and MW-13 with concentrations ranging from 444 to 1,270 µg/L.

In addition to the more widespread exceedances, the following exceedances were observed in the filtered (dissolved) samples from 2016:

- The AWQS for selenium (10 µg/L) was exceeded at MW-3, MW-10, and MW-11 at concentrations of 25.4, 22.2, and 54.5 µg/L, respectively.

- The Guidance Value for antimony (3 µg/L) was exceeded at MW-10 at an estimated concentration of 6.3 µg/L.

- The AWQS for arsenic and lead (both 25 µg/L) were exceeded at MW-4 at concentrations of 48.4 and 45 µg/L, respectively.

- The AWQS for sodium (20,000 µg/L) was exceeded at MW-3, MW-4, and MW-13 at concentrations of 20,600, 22,900, and 37,000 µg/L, respectively.

2.2 Engineering and Institutional Control Plan Compliance Report

2.2.1 IC/EC Requirements and Compliance

Institutional and engineering controls at the site currently consist of:

- Long-term monitoring of negatively impacted environmental media to provide the necessary data to determine the effectiveness of the remedy;

- An engineered cap and cover system to prevent contaminant migration from the landfill;

- A system of drainage ditches to control storm water and promote runoff; and

- Land use restrictions.

Determination of compliance with the IC\ECs at the site is made based on the following criteria:

- The IC/ECs applied at the site are in place and as prescribed in the CO and subsequent work plans and SMP. Site conditions are as designed for the certification period from December 31, 2014 through December 31, 2017.

- The deed restriction for the site referenced in the CO was filed by the site owner in May 2016 that restricts the use of the site and prevents disturbance of the ECs. The site SMP will be updated during the winter/spring 2018 to incorporate the recently filed deed restriction.

- Nothing has occurred that would impair the ability of such controls to protect the public health and the environment, or constitute a violation or failure to comply with any element of the SMP for such controls.

2.2.2 IC/EC Certification Forms

See Appendix B for the Standby Consultant/Contractor Certification Form and the Property Owner Survey.

3.0 Evaluate Costs

Total annual costs for completion of all the required monitoring and reporting is approximately $19,000. Major cost components are allocated as follows:

Long-term monitoring and reporting	$13,000 (with analytical costs)
Semi-annual inspections and associated reporting	$6,000

4.0 Conclusions and Recommendations

4.1 Conclusions

The PRR process is used for determining if a remedy continues to be properly managed, as set forth in the SMP and continues to be protective of human health and the environment. On the Beaver Smelting site, metals remain widely distributed across the site in groundwater exceeding the applicable standards.

The following remedial elements were included in the 1989 CO:

4.1.1 Waste Consolidation

The consolidation of approximately 9,000 cubic yards of smelter ash was completed in 1991.

4.1.2 Construction of a Landfill Cover and Perimeter Ditch

Installation of a soil cover and perimeter ditch was completed in 1991. Based on site inspections completed during this reporting period, the cap and ditch appear to be intact and maintained. At least one active seep has been identified on the west slope of the landfill. The seep has been monitored for several years and does not appear to be compromising the stability of the soil cover.

4.1.3 Groundwater Monitoring

The SMP calls for groundwater sampling from the site monitoring well network every 15 months. Section 3.1 of this PRR discusses the monitoring that has been completed to address this during the current certification period. On-site groundwater has levels of metals which continue to exceed regulatory limits. See Table 4 for a list of these exceedances for the 2015 and 2016 sampling.

4.1.4 Deed Restrictions

A deed restriction, as required by the CO, was filed with the Sullivan County Clerk in May 2016 by the site owner that restricts the use of the site. The site SMP will be updated in early 2018 to incorporate the deed restriction.

4.2 Recommendations

Based on the PRR, recommendations for the Beaver Smelting site include the following:

- Continuing semi-annual site inspections including the perimeter ditch, monitoring wells, and cap integrity;
- Continuing groundwater monitoring on a five-quarter basis from the current monitoring well network;

- Monitoring sediment and surface water in ponded areas, drainage ditch, and seep on a five-quarter basis, through sampling and estimating water flow. Note that no sediment or surface water samples were collected during the reporting period of this PRR due to the lack of sufficient standing water at the times personnel were on the site. Per the site PRR for the previous reporting period, the dissolved fraction will be analyzed for all surface water samples. It is recommended that this sampling be completed during the next site inspection planned for spring 2018.

Tables

Table 1
Analytical Results for Unfiltered Groundwater Samples
Beaver Smelting
Fallsburg, New York
April 1992 to March 2016

Analyte		Antimony		Arsenic		Barium		Beryllium		Cadmium		Chromium		Copper		Iron		Lead		Magnesium		Manganese		Mercury		Nickel		Selenium		Silver		Sodium		Thallium		Zinc	
AWQS + GV		*3 (GV)*		*25*		*1000*		*3 (GV)*		*5*		*50*		*200*		*300*		*25*		*35,000 (GV)*		*300*		*0.7*		*100*		*10*		*50*		*20,000*		*0.5*		*2,000 (GV)*	
MW-2	Apr-92	-		-		-		5.0	U	5		-		-		**4,500**		**500**		-		**1,000**		-		-		**15**		-		-		-		-	
	Jul-92	-		-		-		1.0	U	**6**		-		-		**4,200**		**470**		-		**950**		-		-		**190**		-		-		-		-	
	Oct-92	-		-		-		2.0		**10**		-		-		**17,000**		**770**		-		**2,000**		-		-		**240**		-		-		-		-	
	Jan-93	-		-		-		3.0		**10**		-		-		**11,800**		**1,400**		-		**2,000**		-		-		**211**		-		-		-		-	
	Apr-93	-		-		-		2.0		**8**		-		-		**7,200**		**1,020**		-		**1,400**		-		-		**184**		-		-		-		-	
	Jul-93	-		-		-		1.0		**8**		-		-		**6,500**		**516**		-		**1,000**		-		-		-		-		-		-		-	
	Oct-93	-		-		-		1.0	U	**6**		-		-		**3,100**		**570**		-		**800**		-		-		**135**		-		-		-		-	
	Apr-94	-		-		-		1.0	U	5.0	U	-		-		**25,100**		**313**		-		**1,100**		-		-		**83.5**		-		-		-		-	
	Oct-94	-		-		-		1.0	U	10.0	U	-		-		**23,500**		**383**		-		**1,100**		-		-		**191**		-		-		-		-	
	Nov-98	-		-		-		1.3	U	3.8	B	-		-		**11,400**		**100**		-		**506**		-		-		**341**		-		-		-		-	
	Nov-99	-		-		-		1.0		**7**		-		-		**550**		**64**		-		170		-		-		**260**		-		-		-		-	
	Oct-00	5.5	U	**40.7**		382		2.7	B	3.1	U	**68.4**		**286**		**54,800**		**334**		**43,400**		**2,220**		0.20	U	82.8		**120**		6.1	B	2,810	B	2.0	U	321	
	Apr-02	37	U	8.0	U	200	U	5.0	U	5.0	U	10	U	100		**4,800**		**140**		**45,000**		**530**		0.20	U	40	U	**230**		4.0	U	3,800	B	10	U	60	
	Nov-02	37	U	8.0	U	200	U	5.0	U	5.0	U	10	U	57		**5,000**		**82**		**37,000**		**540**		0.20	U	40	U	**280**		10	U	3,500	B	10	U	27	
	May-05	-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-	
	Oct-05	**39.5**	**J**	**42.9**		555		**4.5**	**J**	0.33	U	**92.0**		**417**		**96,700**		**542**		**47,900**		**3,980**		0.27		**126**		**57.9**		5.3	J	5,610		3.1	U	468	
	Sep-08	-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-	
	Feb-10	-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-	
	Oct-13	2	U	2.2	B	116	B	0.22	U	0.6	B	4.4	B	65.2		**1,700**	*	**154**	*	26,000	E	**563**		0.10	U	4.9	B	**132**		0.43	U	1980	U	1.9	U	79.2	E
	Jan-15	**6.0**	**B**	**72.8**		552	E	**5.6**		**10.8**		**167**	**E**	**607**		**148,000**		**1,280**		**51,800**	**E**	**7,160**		0.42	N	**169**		**154**	**N**	9.6	B	1,870	B	3.8	U	687	
	Mar-16	60	U	2.4	J	59.6	J	0.60	J	0.90	J	10	U	10.7	J	118		12.6		31,300		129		0.20	UN	1.2	J	**191**		10	U	261	J	10	U	5.5	J
MW-3	Apr-92	-		-		-		5	U	5	U	-		-		180		5	U	-		**2,900**		-		-		**32**		-		-		-		-	
	Jul-92	-		-		-		1	U	**10**		-		-		**8,900**		**39.4**		-		**7,400**		-		-		**53**		-		-		-		-	
	Oct-92	-		-		-		1	U	**8**		-		-		**440**		5.3		-		**5,700**		-		-		**70**		-		-		-		-	
	Oct-00	5.5	U	1.8	U	39.6	B	0.26	B	3.1	U	1.6	B	14.8	B	**2,070**		2.1	B	12,400		**1,070**		0.20	U	14.3	B	**38.0**		3.0	U	**26,700**		2.0	U	68.9	
	Apr-02	37	U	8	U	200	U	5	U	5	U	10	U	30		**2,000**		3	U	15,000		**1,100**		0.2	U	40	U	**38**		4	U	**29,000**		10	U	77	
	Nov-02	37	U	8	U	200	U	5	U	5	U	10	U	22	U	**480**		3	U	11,000		**810**		0.2	U	40	U	**40**		10	U	**27,000**		10	U	26	
	May-05	3	U	16.2		680		**3.96**	**J**	0.327	U	**62.2**		**535**		**68,300**		**87.8**		30,800		**2,710**		0.56		**115**		**29.9**		1.64	U	**22,800**		3	U	674	
	Oct-05	3.2	U	12.9		252		1.3	J	0.33	U	12.2		162		**30,400**		**69.2**		17,600		**1,640**		0.15	J	42.9		**20.2**		2.8	J	**20,600**		**6**	**J**	200	
	Sep-08	10	U	10	U	61.5		2	U	2	U	2.97	J	17.7		**4,070**		4.55	J	9,320		**793**		0.2	U	11	J	**35.8**		10	U	**20,800**		4	U	52.9	
	Feb-10	25	U	10	U	54.1		3	U	3	U	3.28	J	11.9		**4,640**		5.92	J	9,730		**804**		0.07	J	12.3	J	**32.2**		5	U	18,000		20	U	53	
	Nov-11	**6.95**	**J**	4.55	J	41.5	J	3	U	3	U	5	U	13.6		**1,980**		2.39	J	10,300		**894**		0.2	U	12.4	J	**29.3**		2.01	J	**21,000**		**6.33**	**J**	46.3	
	Oct-13	2	U	1	U	55.2	B	0.3	B	0.3	B	2.6	B	16	B	**1,130**	*	11.4	*	12,000	E	**1,060**		0.10	U	8.9	B	**10.3**		0.43	U	17,500		2	U	76.9	E
	Jan-15	3.0	U	3.3	U	46.4	BE	0.20	B	0.50	B	3.9	BE	10.9	B	**2,440**		2.4	B	11,300	E	**1,150**		0.10	UN	9.6	B	**26.5**	**N**	2.2	U	19,400		3.8	U	33.4	
	Mar-16	60	U	10	U	43.5	J	0.20	J	0.60	J	0.30	J	10.5	J	**1,410**		3.9	J	11,600		**1,260**		0.20	UN	10.0	J	**21.6**		10	U	**21,100**		10	U	24.4	
MW-4	Apr-92	-		-		-		5	U	5	U	-		-		**460**		5	U	-		**2,600**		-		-		**37**		-		-		-		-	
	Jul-92	-		-		-		1	U	5	U	-		-		270		6.2		-		**4,000**		-		-		**150**		-		-		-		-	
	Oct-92	-		-		-		1		**10**		-		-		**6,900**		5	U	-		**5,900**		-		-		**254**		-		-		-		-	
	Jan-93	-		-		-		**4**		**20**		-		-		**8,900**		**61**		-		**12,400**		-		-		**231**		-		-		-		-	
	Apr-93	-		-		-		3		**30**		-		-		**3,100**		**39**		-		**16,900**		-		-		**106**		-		-		-		-	
	Jul-93	-		-		-		2		**20**		-		-		**830**		18		-		**11,100**		-		-			U	-		-		-		-	
	Oct-93	-		-		-		1	U	**20**		-		-		**450**		3.7		-		**13,100**		-		-		**12.2**		-		-		-		-	
	Apr-94	-		-		-		1	U	**7**		-		-		**6,400**		9.7		-		**9,900**		-		-		2	U	-		-		-		-	
	Oct-94	-		-		-		1	U	10	U	-		-		**3,600**		19.7		-		**9,500**		-		-		2.2		-		-		-		-	
	Nov-98	-		-		-		1.8	B	**6.3**		-		-		**11,800**		**162**		-		**934**		-		-		3.3	B	-		-		-		-	
	Nov-99	-		-		-		1.1		**7**		-		-		**2,400**		**310**		-		**680**		-		-		5		-		-		-		-	
	Oct-00	5.5	U	**312**		140	B	2.1	B	4.1	B	20.9		174		**16,500**		**268**		4,580	B	**963**		0.2	U	31.1	B	14	U	3	U	**102,000**		2	U	114	
	Apr-02	37	U	**120**		200	U	5	U	5	U	10	U	110		**4,900**		**250**		2,600	B	**720**		0.2	U	40	U	5	U	4	U	**100,000**		10	U	83	
	May-05	3	U	**146**		420		**4.52**	**J**	**7.4**		**108**		**465**		**57,600**		**584**		16,200		**2,810**		0.45		90.1		3	U	1.64	U	**68,100**		3	U	397	
	Oct-05	**35.4**	**J**	**270**		442		**5.7**		3.1	J	**65.8**		**500**		**67,900**		**696**		16,200		**3,130**		0.41		91.9		5.7	J	5	J	**62,900**		3.1	U	468	
	Sep-08	10	U	**122**		343		**4.16**		**8.44**		**64.1**		**390**		**53,100**		**484**		12,300		**2,390**		0.27		69.9		**14.2**		10	U	**38,000**		4	U	291	
	Feb-10	25	U	**92.3**		297		**3.65**		**5.39**		**55**		**288**		**49,500**		**387**		11,600		**2,190**		0.1	J	68		**15.2**		5	U	**27,000**		20	U	265	
	Nov-11	25	U	**113.0**		443		**5.81**		**7.65**		**54.5**		**421**		**41,200**		**585**		9,080		**3,080**		0.3	J	64		5.87	J	5	U	**25,400**		**5.65**	**J**	281	
	Oct-13	**5.1**	**B**	**63.5**		**1,020**		**20.1**		**12.7**		**117**		195		**92,200**	*	**1,010**	*	15,900	E	**9,040**		0.10	U	**121**		1.8	U	0.43	U	**23,300**		**10**		733	E
	Jan-15	**13.4**	**B**	**229**		**2,380**	**E**	**22.4**		**57.0**		**692**	**E**	**1,280**		**559,000**		**1,260**		**107,000**	**E**	**13,600**		**0.93**	**N**	**525**		38.0	UN	24.7		18,000		3.8	U	1,950	
	Mar-16	60	U	**66.3**		201		2.2	J	1.9	J	31.6		180		**25,000**		**224**		5,790		**1,170**		0.086	JN	27.2	J	4.9	J	2.6	J	**25,500**		10	U	133	
MW-5	Apr-92	-		-		-		5	U	5	U	-		-		180		5	U	-		**1,100**		-		-		**44**		-		-		-		-	
	Jul-92	-		-		-		1	U	5	U	-		-		280		5	U	-		**1,700**		-		-		**140**		-		-		-		-	
	Oct-92	-		-		-		1		5	U	-		-		**8,800**		17.6		-		**2,100**		-		-		**119**		-		-		-		-	
	Jan-93	-		-		-		1	U	5	U	-		-		**3,600**		16.2		-		**2,100**		-		-		**46.5**		-		-		-		-	
	Apr-93	-		-		-		1	U	5	U	-		-		**3,100**		11.4		-		**2,000**		-		-		**42.9**		-		-		-		-	
	Jul-93	-		-		-		1	U	5	U	-		-		**1,600**		13.1		-		**2,400**		-		-			U	-		-		-		-	
	Oct-93	-		-		-		1	U	5	U	-		-		**1,500**		7.9		-		**1,400**		-		-		**26.6**		-		-		-		-	
	Apr-94	-		-		-		1	U	5	U	-		-		**4,800**		4.6		-		**1,600**		-		-		**14.9**		-		-		-		-	
	Oct-94	-		-		-		1	U	10	U	-		-		**2,300**		4		-		**2,100**		-		-		**39.6**		-		-		-		-	
	Nov-98	-		-		-		1.3	U	3.8	B	-		-		**15,000**		6.5		-		**2,440**		-		-		**13.7**		-		-		-		-	
	Nov-99	-		-		-		1	U	**7**		-		-		**1,600**		3		-		**1,000**		-		-		**14**		-		-		-		-	
	Oct-00	5.5	U	1.8	B	115	B	0.3	B	3.1	U	3.2	B	11.5	B	**3,380**		3.8		13,900		**2,090**		0.2	U	13.8	B	**12.2**		3	U	18,500		2	U	37.9	
	Apr-02	37	U	8	U	200	U	5	U	5	U	10	U	22	U	270		3	U	11,000		**1,400**		0.2	U	40	U	**13**		4	U	16,000		10	U	28	
	May-05	3	U	**25.5**		577		2.92	J	0.327	U	**70.6**		93.1		**55,500**		**55.6**		26,600		**3,410**		0.13	J	88.5		8.5	J	1.64	U	11,400		3	U	283	
	Oct-05	**28.6**	**J**	**25.5**		631		**3.4**	**J**	0.33	U	**69.2**		104		**68,900**		**78.3**		29,400		**3,600**		0.03	U	88.5		8.4	J	3.7	J	14,800		**5.5**	**J**	260	
	Sep-08	10	U	10	U	159		0.48	J	2	U	9.58	J	19.8		**9,520**		10.5		10,200		**1,410**		0.2	U	15.8	J	**11.4**		10	U	8,190		4	U	54	
	Feb-10	25	U	10	U	111		3	U	3	U	3.37	J	10		**3,630**		4.32	J	9,420		**999**		0.12	J	7.25	J	6.59	J	5	U	6,740		20	U	31.2	
	Nov-11	25	U	7.19	J	279		1.47	J	3	U	13.2		35.5		**11,300**		**27.8**		9,380		**1,720**		0.20	U	21.9		7.63	J	1.49	J	7,110		**6.46**	**J**	92.8	
	Oct-13	2	U	1.50	B	287		1.10	B	0.15	U	8.70	B	18	B	**4,520**	*	**32.2**	*	9,900	E	**1,800**		0.10	U	10.6	B	1.8	U	0.43	U	5,700		1.9	U	75.7	E
	Jan-15	3.0	U	5.7	B	220	E	1.5	B	0.90	B	41.9	E	38.3		**25,000**		20.5		9,950	E	**2,930**		0.10	UN	35.5	B	3.8	UN	2.2	U	5,040		3.8	U	110	
	Mar-16	60	U	10	U	136	J	0.40	J	0.30	J	10	U	7.5	J	169		1.9	J	8,940		**439**		0.20	UN	4.2	J	10	U	10	U	6,560		10	U	16.3	J

Table 1
Analytical Results for Unfiltered Groundwater Samples
Beaver Smelting
Fallsburg, New York
April 1992 to March 2016

Analyte		Antimony		Arsenic		Barium		Beryllium		Cadmium		Chromium		Copper		Iron		Lead		Magnesium		Manganese		Mercury		Nickel		Selenium		Silver		Sodium		Thallium		Zinc	
AWQS + GV		*3 (GV)*		*25*		*1000*		*3 (GV)*		*5*		*50*		*200*		*300*		*25*		*35,000 (GV)*		*300*		*0.7*		*100*		*10*		*50*		*20,000*		*0.5*		*2,000 (GV)*	
MW-6	Apr-92	-		-		-		5	U	**7**		-		-		230		5	U	-		**670**		-		-		5	U	-		-		-		-	
	Jul-92	-		-		-		0.2		**8**		-		-		**1,100**		**36**		-		**650**		-		-		5	U	-		-		-		-	
	Oct-92	-		-		-		**4**		**10**		-		-		**17,000**		**180**		-		**800**		-		-		6.7		-		-		-		-	
	Jan-93	-		-		-		2		**7**		-		-		**8,900**		**170**		-		**640**		-		-		4		-		-		-		-	
	Apr-93	-		-		-		2		**6**		-		-		**5,700**		**89.7**		-		**580**		-		-		5.5		-		-		-		-	
	Jul-93	-		-		-		1		**8**		-		-		**3,000**		**60.4**		-		**590**		-		-			U	-		-		-		-	
	Oct-93	-		-		-		1		5	U	-		-		**2,100**		**36.6**		-		**490**		-		-		5.5		-		-		-		-	
	Apr-94	-		-		-		1	U	5	U	-		-		**5,000**		22.3		-		**410**		-		-		2		-		-		-		-	
	Oct-94	-		-		-		1	U	10	U	-		-		**5,000**		**38.5**		-		**410**		-		-		7.4		-		-		-		-	
	Nov-98	-		-		-		1.7	B	4.3	B	-		-		**13,800**		**67**		-		**469**		-		-		1.5	U	-		-		-		-	
	Nov-99	-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-	
	Oct-00	-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-	
	Apr-02	37	U		U	200	U	5	U	5	U	10	U	23	B	**3,800**		**45**		3,600	B	**410**		0.2	U	40	U	5	U	4	U	4,900	B	10	U	360	
	May-05	3	U	**134**		**2,520**		**12.7**		1.76	J	**160**		**270**		**183,000**		**1,320**		**37,800**		**3,510**		0.29		**175**		3	U	1.64	U	4,710	J	3	U	1,190	
	Oct-05	**33.5**	**J**	**74.6**		**1,350**		**8.6**		0.33	U	**117**		195		**136,000**		**827**		26,100		**2,510**		0.16	J	**121**		**11.6**		8.1	J	3,770	J	**6.9**	**J**	753	
	Sep-08	10	U	13.5		470		**3.56**		1.58	J	44.8		93.4		**53,100**		**331**		11,000		**1,040**		0.2	U	55.6		8.1	J	10	U	3,330		4	U	375	
	Feb-10	25	U	16.9		301		2.44	J	3	U	30		44.5		**35,100**		**163**		7,510		**665**		0.09	J	37		6.57	J	5	U	2,920		20	U	291	
	Nov-11	25	U	12.2		188		1.33	J	0.47	J	10.6		31.6		**10,000**		**89.2**		2,070		235		0.20	U	22.5		10	U	2.07	J	3,550		**6.09**	**J**	207	
	Oct-13	2.8	B	3.7	B	364		2	B	0.8	B	9	B	33.5		**5,920**	*	**156**	*	1,280	BE	235		0.10	U	9.7	B	1.8	U	0.43	U	1,980	U	1.9	U	262	E
	Jan-15	3.0	U	3.4	B	109	BE	0.40	B	0.70	B	3.4	BE	6.6	B	**1,470**	**E**	8.4		1,210	BE	76.9		0.10	UN	5.4	B	3.8	UN	2.2	U	2,230	B	3.8	U	148	
	Mar-16	60	U	10	U	114	J	0.50	J	0.70	J	1.3	J	9.6	J	**1,500**		10.5		1,140		66.4		0.20	UN	6.0	J	10	U	10	U	1,970	J	10	U	157	
MW-7	Apr-92	-		-		-		5	U	**30**		-		-		190		5.8		-		**980**		-		-		5	U	-		-		-		-	
	Jul-92	-		-		-		1	U	**20**		-		-		**1,500**		14		-		**970**		-		-		8.3		-		-		-		-	
	Oct-92	-		-		-		**5**		**30**		-		-		**6,700**		**72**		-		**1,600**		-		-		**14**		-		-		-		-	
		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-		-	
	May-05	3	U	3.32	U	249		1.27	J	0.327	U	12.8		56.7		**18,600**		**35.2**		4,820	J	**771**		0.09	J	31.1	J	3	U	1.64	U	991	J	3	U	770	
	Oct-05	3.2	U	11.3		351		1.6	J	2	J	1.2	J	82.8		**19,900**		**84.2**		4,690	J	**770**		0.03	U	38.2	J	3	U	1.6	U	682	J	3.1	U	1,020	
	Sep-08	10	U	10	U	190		0.95	J	3.27		7.03	J	60.8		**5,980**		19.1		2,330		**374**		0.2	U	29.5		10	U	10	U	1,330		4	U	887	
	Feb-10	25	U	4.34	J	215		1.24	J	1.93	J	16.4		51.7		**16,900**		**29.9**		4,400		**582**		0.12	J	30		10	U	5	U	1,350		20	U	645	
	Nov-11	25	U	6.63	J	193		0.88	J	2.26	J	4.2	J	43.0		**4,360**		13.8		1,520		**326**		0.2	U	21.3		10	U	2.57	J	2,480		**5.75**	**J**	624	
	Oct-13	2.0	U	1.0	U	499		2.4	B	3.0	B	10.2		88.0		**4,450**	*	**87.6**	*	1,630	BE	**726**		0.10	U	24.9	B	1.8	U	0.43	U	1,980	U	1.9	U	816	E
	Jan-15	3.0	U	**35.6**		752	E	**5.6**		**6.3**		**127**	**E**	**215**		**124,000**	**E**	**123**		25,100	E	**3,230**		0.18	BN	**124**		3.8	UN	7.8	B	1,720	B	3.8	U	849	
	Mar-16	60	U	2.9	J	134	J	0.60	J	2.3	J	10	U	23.3	J	**320**		3.5	J	969	J	145		0.20	UN	14.5	J	10	U	10	U	5,000	U	10	U	557	
MW-9	Apr-92	-		-		-		5	U	5	U	-		-		**290**		5	U	-		120		-		-		5	U	-		-		-		-	
	Jul-92	-		-		-		1	U	5	U	-		-		**740**		6.6		-		150		-		-		5	U	-		-		-		-	
	Oct-92	-		-		-		2		5	U	-		-		**5,400**		**40.4**		-		**800**		-		-		5	U	-		-		-		-	
	Jan-93	-		-		-		1	U	5	U	-		-		**2,300**		18.7		-		**310**		-		-		2	U	-		-		-		-	
	Apr-93	-		-		-		1	U	5	U	-		-		**2,200**		23.4		-		200		-		-		2	U	-		-		-		-	
	Jul-93	-		-		-		-		-		-		-		-		-		-		-		-		-				-		-		-		-	
	Oct-93	-		-		-		1	U	5	U	-		-		**1,500**		5.1		-		150		-		-		3.2		-		-		-		-	
	Apr-94	-		-		-		1	U	5	U	-		-		**4,100**		4.5		-		130		-		-		2	U	-		-		-		-	
	Oct-94	-		-		-		1	U	10	U	-		-		**5,500**		7.7		-		**570**		-		-		2.7		-		-		-		-	
	Nov-98	-		-		-		1.7	B	3.8	B	-		-		**16,400**		13.6		-		**786**		-		-		1.5	U	-		-		-		-	
	Nov-99	-		-		-		1		**7**		-		-		**2,100**		3		-		**460**		-		-		5		-		-		-		-	
	Oct-00	5.5	U	8.8	B	78.1	B	0.2	U	3.1	U	0.9	U	7.2	B	**2,180**		2.8	B	1,290	B	**1,060**		0.2	U	3.3	B	2.8	U	3	U	1,910	B	2	U	17.3	B
	Apr-02	37	U	8	U	200	U	5	U	5	U	10	U	22	U	**540**		3	U	1,300	B	**300**		0.2	U	40	U	5	U	4	U	2,800	B	10	U	19	B
	May-05	3	U	3.32	U	197	J	0.43	J	0.327	U	4.74	J	65.8		**10,200**		17		3,830	J	**700**		0.12	J	11.9	J	3	U	1.64	U	2,090	J	3	U	51.7	
	Oct-05	**9.3**	**J**	**43**		353		1.6	J	0.77	J	19.5		167		**31,000**		**140**		6,760		**755**		0.05	J	22.3	J	3	U	3	J	2,210	J	3.1	U	69.9	
	Sep-08	10	U	10	U	155		2	U	2	U	4.79	J	26.6		**7,240**		16		2,180		**586**		0.2	U	7.46	J	10	U	10	U	2,240		4	U	37.1	
	Feb-10	25	U	10	U	81.2		3	U	3	U	5	U	6.41	J	**4,590**		3.23	J	1,450		**410**		0.13	J	20	U	10	U	5	U	2,310		20	U	18	J
	Nov-11	25	U	11.6		112		3	U	3	U	5	U	16.6		**3,680**		5.19	J	1,730		**516**		0.2	U	6.61	J	10	U	2.35	J	3,610		**7.18**	**J**	24.6	
	Oct-13	2.0	U	2.4	B	120	B	0.30	B	0.15	U	3.9	B	5.6	B	**2,180**	*	20.5	*	1,470	BE	**320**		0.10	U	4.1	B	1.8	U	0.43	U	2,060	B	1.9	U	29.8	E
	Jan-15	3.0	U	14.3		256	E	1.0	B	1.0	B	21.3	E	66.2		**17,400**		**35.2**		4,680	BE	**604**		0.10	UN	17.0	B	3.8	UN	2.2	U	2,670	B	3.8	U	60.0	
	Mar-16	60	U	3.4	J	57.1	J	0.30	J	0.20	J	10	U	1.9	J	**846**		2.1	J	944	J	123		0.20	UN	0.80	J	10	U	10	U	2,240	J	10	U	1.1	J
MW-10 (MW-9A)	Apr-92	-		-		-		5	U	5	U	-		-		180		5	U	-		30		-		-		**640**		-		-		-		-	
	Jul-92	-		-		-		1	U	5	U	-		-		**480**		6.6		-		70		-		-		**1,300**		-		-		-		-	
	Oct-92	-		-		-		2		**6**		-		-		**4,800**		**37**		-		**420**		-		-		**976**		-		-		-		-	
	May-05	3	U	**49.2**		862		**6.62**		**6.18**		**89.8**		**265**		**122,000**		**192**		**49,400**		**8,720**		0.45		**158**		**30.6**		8.42	J	2,760	J	3	U	514	
	Oct-05	**9.4**	**J**	**100**		**1,610**		**13.4**		0.33	U	**166**		**582**		**284,000**		**502**		**77,600**		**20,100**		0.58		**335**		**157**		14.4		3,210	J	**10.1**		1,060	
	Sep-08	10	U	**27.4**		458		**3.48**		4.31		40.5		144		**82,600**		**110**		26,100		**3,980**		0.2	U	88.2		**31**		10	U	2,970		4	U	282	
	Feb-10	25	U	8.44	J	151		0.81	J	3	U	10.9		27.1		**17,700**		**28.8**		14,600		**607**		0.12	J	16.6	J	**27.9**		5	U	2,630		20	U	69.9	
	Nov-11	25	U	9.4	J	75.2		0.37	J	3	U	2.77	J	14.5		**4,410**		13.5		7,690		**651**		0.02	U	8.39	J	**17.6**		2.18	J	3,490		**5.62**	**J**	33.4	
	Oct-13	2.2	B	6.3	B	478		2.6	B	2.4	B	3.5	B	37.9		**3,120**	*	**55.4**	*	8,030	E	**795**		0.10	U	7.0	B	**11.1**		0.43	U	2,100	B	1.9	U	72.6	E
	Jan-15	3.0	U	**75.4**		744	E	**6.8**		**14.3**		**173**	**E**	**245**		**181,000**		**170**		**40,600**	**E**	**10,200**		0.20	UN	**197**		8.6	N	8.0	B	2,680	B	3.8	U	551	
	Mar-16	**9.6**	**J**	18.2		215		2.0	J	2.4	J	24.2		74.7		**32,600**		**58.7**		11,900		**1,840**		0.20	UN	34.4	J	**22.2**		3.3	J	3,560	J	10	U	124	
MW-11	Apr-92	-		-		-		5	U	5	U	-		-		**1,600**		5.0	U	-		170		-		-		**360**		-		-		-		-	
	Jul-92	-		-		-		1	U	5	U	-		-		**1,400**		5.6		-		200		-		-		**390**		-		-		-		-	
	Oct-92	-		-		-		3		**6**		-		-		**1,100**		**33.7**		-		**1,500**		-		-		**340**		-		-		-		-	
	May-05	3	U	**34.5**		**2,550**		**15.8**		0.57	J	**391**		**270**		**285,000**		**207**		**83,700**		**10,000**		0.68		**320**		**44.6**		1.64	U	1,830	J	**3**	U	1,180	
	Oct-05	**6.6**	**J**	**52.4**		**3,580**		**22.9**		0.33	U	**569**		**436**		**497,000**		**442**		**118,000**		**19,800**		**0.83**		**510**		**69**		24.2		3,500	J	**3**	U	1,710	
	Sep-08	xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx	
	Feb-10	xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx	
	Nov-11	xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx	
	Oct-13	xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx		xx	
	Jan-15	3.0	U	16.7		423	E	2.6	B	3	B	**107**	**E**	50.1		**71,500**		**27.8**		24,800	E	**1,780**		0.1	UN	64		**58.9**	**N**	4.6	B	1,580	B	3.8	U	227	
	Mar-16	60	U	3.2	J	179	J	0.7	J	0.6	J	19.1		18.7	J	**13,000**		13.9		12,200		**365**		0.2	UN	13	J	**52.8**		1.2	J	898	J	10	U	51.8	

Table 1
Analytical Results for Unfiltered Groundwater Samples
Beaver Smelting
Fallsburg, New York
April 1992 to March 2016

Analyte		Antimony		Arsenic		Barium		Beryllium		Cadmium		Chromium		Copper		Iron		Lead		Magnesium		Manganese		Mercury		Nickel		Selenium		Silver		Sodium		Thallium		Zinc	
AWQS + GV		*3 (GV)*		*25*		*1000*		*3 (GV)*		*5*		*50*		*200*		*300*		*25*		*35,000 (GV)*		*300*		*0.7*		*100*		*10*		*50*		*20,000*		*0.5*		*2,000 (GV)*	
MW-12	Apr-92	-		-		-		5	U	5	U	-		-		80		5.0	U	-		**1,900**		-		-		9.8		-		-		-		-	
	Jul-92	-		-		-		1	U	5	U	-		-		170		5.0	U	-		**2,500**		-		-		**17**		-		-		-		-	
	Oct-92	-		-		-		1		5	U	-		-		**1,100**		13.5		-		**2,600**		-		-		**16.1**		-		-		-		-	
	Oct-00	5.5	U	2.6	B	106	B	0.33	B	3	U	1.8	B	8.6	B	**1,370**		5.6		24,000		**2,300**		0.20	U	24	B	6.6		3	U	**42,500**		2	U	51.4	
	Apr-02	37	U	8	U	200	U	5	U	5	U	10.0	U	22.0	U	**110**		3.0	U	14,000		**2,700**		0.20	U	40	U	5.6		4	U	**27,000**		10	U	130.0	
	May-05	3	U	3.32	U	71.6	J	0.145	J	0.327	U	2.78	J	9.26	J	**1,350**		3.66	J	13,700		**2,210**		0.12	J	13.5	J	3	U	1.64	U	**30,700**		3	U	35.2	
	Oct-05	3.2	U	5.6	J	83	J	0.09	U	0.78	J	0.34	U	3.6	U	**522**		12.4		10,400		**1,490**		0.03	U		U	3	U	1.6	U	**22,900**		3.1	U	26.5	
	Sep-08	10	U	10	U	204		0.71	J	0.74	J	15.6		41.9		**16,900**		**33.2**		21,300		**1,910**		0.20		31.4		10	U	10	U	**37,300**		4	U	129.0	
	Feb-10	25	U	10	U	68.7		0.31	J	0.43	J	5	U	2.64	J	**965**		2.72	J	2,780		**793**		0.14	J	5.82	J	10	U	5	U	6,200		20	U	46	
	Nov-11	25	U	15.2		111		3	U	1.01	J	5	U	6.31	J	**432**		3.36	J	2,490		**1,030**		0.2	U	12.4	J	10	U	2.32	J	6,640		**4.78**	**J**	53.2	
	Oct-13	2.0	U	1.3	B	147	B	0.22	U	0.40	B	1.1	B	5.0	B	177	*	7.4	*	12,300	E	**1,960**		0.10	U	9.0	B	1.9	B	0.43	U	**25,700**		1.9	U	38.9	E
	Jan-15	3.0	U	**44.2**		440	E	**4.2**	**B**	3.8	B	**113**	**E**	142		**87,200**		**116**		23,200	E	**3,090**		0.53	N	**111**		3.8	UN	6.1	B	11,700		3.8	U	437	
	Mar-16	60	U	5.2	J	121	J	0.80	J	0.80	J	10	U	5.7	J	**955**		8.7		2,900		**801**		0.20	UN	8.3	J	10	U	10	U	3,220	J	10	U	39.2	
MW-13	Apr-92	-		-		-		5	U	5	U	-		-			U	5	U	-		**1,400**		-		-		**60**		-		-		-		-	
	Jul-92	-		-		-		1	U	5	U	-		-		50		5	U	-		**1,500**		-		-		**88**		-		-		-		-	
	Oct-92	-		-		-		1	U	5	U	-		-		**600**		5.5		-		**1,400**		-		-		**88.3**		-		-		-		-	
	Oct-00	5.5	U	1.8	B	65.7	B	0.2	B	3	U	2.2	B	9	B	**2,240**		3.8		9,780		**1,700**		0.2	U	13.9	B	-		3	U	**45,400**		2	U	31.3	
	Apr-02	37	U	8	U	200	U	5	U	5	U	10	U	22	U	**62**	**B**	3	U	11,000		**1,500**		0.2	U	40	U	19		4	U	**52,000**		10	U	19	B
	May-05	3	U	3.32	U	90.5	J	0.09	U	0.327	U	5.87	J	12.9	J	**5,670**		7.75		10,700		**1,440**		0.08	J	15.2	J	5		1.64	U	**43,400**		3	U	40.3	
	Oct-05	3.2	U	3.3	U	63.0	J	0.22	J	0.33	U	0.34	U	8.0	J	**2,660**		3.7	J	9,020		**1,120**		0.08	J	3.5	J	3	U	1.6	U	**41,400**		3.1	U	0.61	U
	Sep-08	10	U	10	U	48.2		2	U	2	U	10	U	4.87	J	**451**		6	U	6,930		**984**		0.2	U	6.14	J	10	U	10	U	**39,500**		4	U	25	
	Feb-10	25	U	10	U	40.0	J	3	U	3	U	5	U	3.45	J	**489**		6	U	6,610		**923**		0.19	J	6.55	J	10	U	5	U	**32,100**		20	U	17.6	J
	Nov-11	**5.61**	**J**	10	U	40.4	J	3	U	3	U	5	U	4.23	J	**326**		6	U	6,350		**956**		0.2	U	9.77	J	10	U	2.89	J	**33,700**		**5.99**	**J**	20.3	
	Oct-13	2.0	U	1.0	U	54.3	B	0.22	U	0.15	U	1.1	B	4.5	B	139	*	8.1	*	7,580	E	**1,040**		0.10	U	7.0	B	3.0	B	0.43	U	**32,000**		1.9	U	46.8	E
	Jan-15	3.0	U	3.3	U	58.6	BE	0.10	U	0.30	B	1.1	UE	3.2	B	20.4	B	2.2	U	8,660	E	**1,200**		0.10	UN	6.3	B	3.8	UN	2.2	U	**34,800**		3.8	U	12.0	B
	Mar-16	60	U	10	U	54.9	J	0.20	J	0.30	J	10	U	3.4	J	100	U	5.0	U	8,520		**1,080**		0.072	JN	6.4	J	10	U	10	U	**35,900**		10	U	5.3	J

1. All data are presented in micrograms per liter (µg/L).
2. Metals analysis by US EPA Method 6010/7470.
3. B - Analyte found in associated method blank.
4. U - Compound not detected at or above the method detection limit (MDL).
5. J - Estimated concentration above the MDL but less than the reporting limit.
6. * - Duplicate analysis not in control limits
7. E - Serial dilution is not within acceptance criteria, or the reported value is estimated because of the presence of interference.
8. AWQS - New York State Ambient Water Quality Standards (TOGs 1.1.1); GV - guidance value.
9. NA indicates 1) no standard or guidance value exists for the compound, or 2) sample was not analyzed for indicated compound.
10. xx - Well could not be located.
11. **BOLD** font in shaded cell indicates exceedances of AWQS+GV.
12. - Sample was not analyzed for indicated compound.

Table 2
Analytical Results for Filtered Groundwater Samples
Beaver Smelting
Fallsburg, New York
January 2015

Analyte			Antimony	Arsenic	Barium	Beryllium	Cadmium	Chromium	Copper	Iron	Lead	Magnesium	Manganese	Mercury	Nickel	Selenium	Silver	Sodium	Thallium	Zinc
AWQS + GV		***Dissolved or Total***	*3 (GV)*	*25*	*1000*	*3 (GV)*	*5*	*50*	*200*	*300*	*25*	*35,000 (GV)*	*300*	*0.7*	*100*	*10*	*50*	*20,000*	*0.5*	*2,000 (GV)*
MW-2	Jan-15	D	**4.9B**	20.2	240	2.4B	3.6B	**54.9**	198	**48,900E**	**365**	33,500E	**2,330E**	0.13B	53.7	**179N**	6.7B	1,720B	3.8U	217
		T	**6.0B**	**72.8**	552E	**5.6**	**10.8**	**167**	**607**	**148,000**	**1,280**	**51,800E**	**7,160**	0.42N	**169**	**154N**	9.6B	1,870B	3.8U	687
MW-3	Jan-15	D	3.0U	5.5B	246	1.8B	1.5B	35.2	102	**34,900E**	**28.7**	19,000E	**1,990E**	0.16B	47.6	**21.2N**	3.8B	18,500	3.8U	174
		T	3.0U	3.3U	46.4BE	0.2B	0.5B	3.9B	10.9B	**2,440**	2.4B	11,300E	**1,150**	0.10U	9.6B	**26.5N**	2.2U	19,400	3.8U	33.4
MW-4	Jan-15	D	**41.5B**	**261**	**4,240**	**39.5**	**214**	**1,310**	**2,150**	**1,140,000D**	**1,990**	**188,000E**	**30,200**	0.10U	**861**	38UN	2.2U	18,900	**91.8B**	3,260
		T	**13.4B**	**229**	**2380E**	**22.4**	**57**	**692**	**1,280**	**559,000D**	**1,260**	**107,000E**	**13,600**	0.93N	**525**	38U	24.7	18,000	3.8U	1,950
MW-5	Jan-15	D	3.0U	3.3U	111B	0.40B	0.40B	7.3B	8.8B	**2780E**	3.5	6,230E	**871E**	0.10U	6.4B	3.8UN	2.2U	4,960B	3.8U	23.3
		T	3.0U	5.7B	220E	1.5B	0.9B	41.9	38.3	**25,000**	20.5	9,950E	**2,930**	0.93N	35.5B	3.8U	2.2U	5,040	3.8U	110.0
MW-6	Jan-15	D	**4.4B**	13.0	417	**3.5B**	2.5B	**61.3**	68.9	**55,000E**	**191**	10,900E	**956E**	0.10U	50.0	3.8U	5.1B	2,340B	3.8U	363
		T	3.0U	3.4B	109BE	0.40B	0.70B	3.4B	6.6B	**1,470E**	8.4	1,210BE	76.9	0.10U	5.4B	3.8U	2.2U	2,230B	3.8U	148
MW-7	Jan-15	D	3.0U	3.3U	143B	0.60B	1.2B	5.5B	18.1B	**3,130E**	4.9	1,490BE	158E	0.10U	11.4B	3.8U	2.2U	1,360B	3.8U	309
		T	3.0U	**35.6**	752E	**5.6**	**6.3**	**127**	**215**	**124,000E**	**123**	25,100E	**3,230**	0.18BN	**124**	3.8U	7.8B	1,720B	3.8U	849
MW-9	Jan-15	D	3.0U	3.3U	124B	0.30B	0.20U	4.6B	11.9B	**2,040E**	4.8	1,480BE	140E	0.10U	3.9B	3.8U	2.2U	2,480B	3.8U	11.5B
		T	3.0U	14.3	256E	1.0B	1.0B	21.3	66.2	**17,400**	**35.2**	4,680BE	**604**	0.10U	17B	3.8U	2.2U	2,670B	3.8U	60
MW-10 (MW-9A)	Jan-15	D	3.0U	5.9B	132B	0.80B	1.5B	25.0	33.4	**22,300E**	23.9	9,250E	**1,210E**	0.10U	24.0B	**22.3N**	2.2U	2,570B	3.8U	70.0
		T	3..0U	75.4	744	**6.8**	**14.3**	**173**	**245**	**181,000**	**170**	**40,600**	**10,200**	0.20U	**197**	8.6	8.0B	2,680B	3.8U	551.0
MW-11	Jan-15	D	**12.1B**	**28.1**	1,600	**12.5**	**13.3**	**507**	**230**	**358,000D**	**128**	**80,500E**	**7,820E**	0.29	**299**	**51.6N**	31.3	1,790B	3.8U	999
		T	3.0U	16.7	423E	2.6B	3.0B	**107**	50.1	**71,500**	**27.8**	24,800E	**1,780**	0.10U	64	**58.9N**	4.6B	1,580B	3.8U	227
MW-12	Jan-15	D	**4.8B**	**42.9**	575	**5.5**	3.9B	**145**	192	**41,300E**	**45.7**	29,900E	**3,580E**	0.54	**141**	3.8U	11.1	11,400	3.8U	578
		T	3.0U	**44.2**	440E	**4.2B**	3.8B	**113**	142	**87,200**	**116**	23,200E	**3,090**	0.53N	**111**	3.8U	6.1B	11,700	3.8U	437
MW-13	Jan-15	D	3.0U	6.7B	297	1.4B	1.6B	**52.2**	53.1	**41,300E**	**45.7**	17,000E	**2,010E**	0.19B	47.5	3.8U	6.7B	1,720B	3.8U	140
		T	3.8U	3.3U	58.6BE	0.10U	0.30B	1.1U	3.2B	20.4B	2.2U	8660E	**1,200**	0.10U	6.3B	3.8U	2.2U	**34,800**	3.8U	12B

1. All data are presented in micrograms per liter (µg/L).
2. Metals analysis by US EPA Method 6010/7470.
3. B - Analyte found in associated method blank.
4. U - Compound not detected at or above the method detection limit (MDL).
5. J - Estimated concentration above the MDL but less than the reporting limit.
6. * - Duplicate analysis not in control limits
7. E - Serial dilution is not within acceptance criteria, or the reported value is estimated because of the presence of interference.
8. AWQS - New York State Ambient Water Quality Standards (TOGs 1.1.1); GV - guidance value.
9. NA indicates 1) no standard or guidance value exists for the compound, or 2) sample was not analyzed for indicated compound.
10. **BOLD** font in shaded cell indicates exceedances of AWQS+GV.

Table 3
Analytical Results for Filtered Groundwater Samples
Beaver Smelting
Fallsburg, New York
March 2016

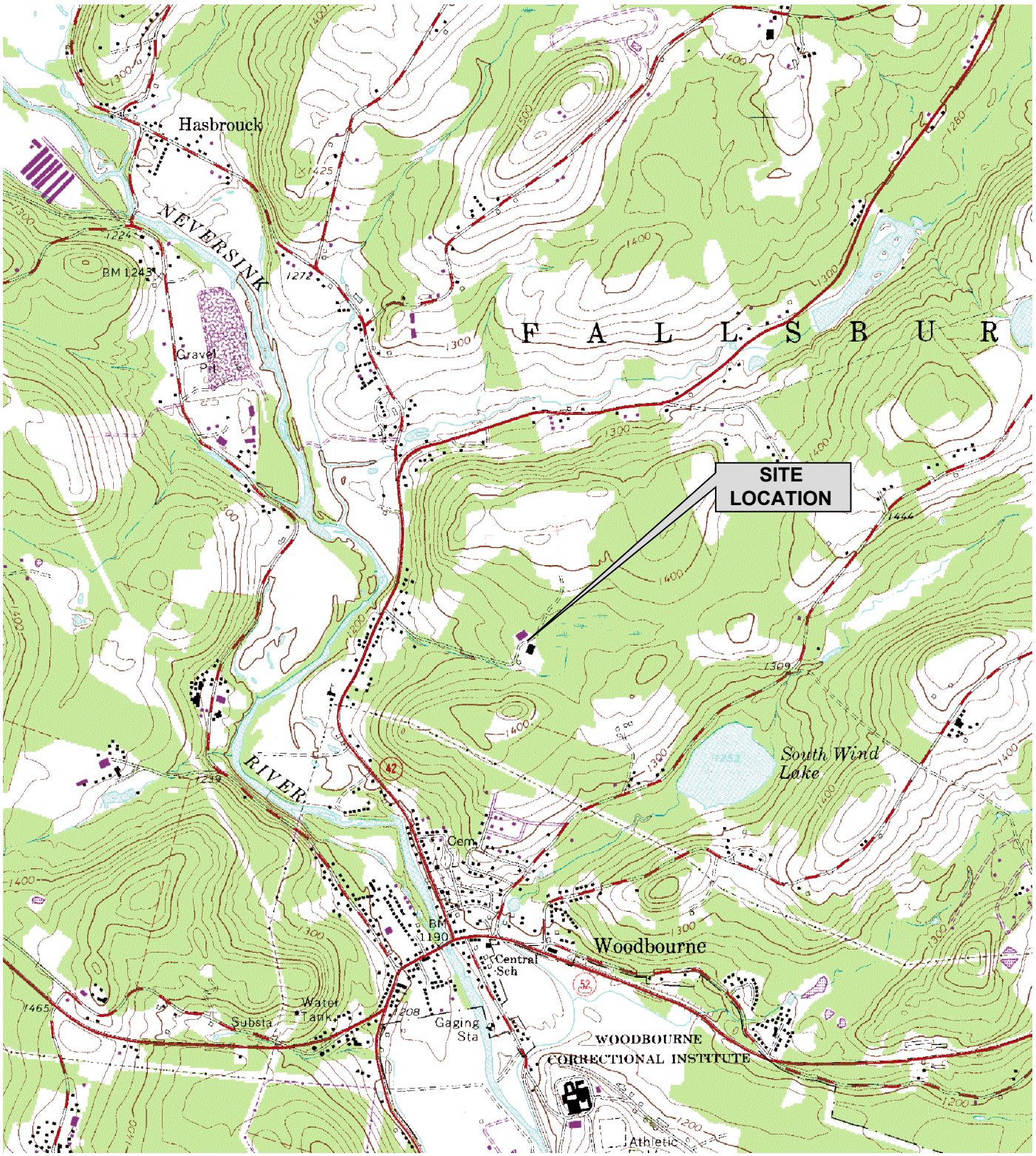
Analyte			Antimony	Arsenic	Barium	Beryllium	Cadmium	Chromium	Copper	Iron	Lead	Magnesium	Manganese	Mercury	Nickel	Selenium	Silver	Sodium	Thallium	Zinc
AWQS + GV		***Dissolved or Total***	*3 (GV)*	*25*	*1000*	*3 (GV)*	*5*	*50*	*200*	*300*	*25*	*35,000 (GV)*	*300*	*0.7*	*100*	*10*	*50*	*20,000*	*0.5*	*2,000 (GV)*
MW-2	Mar-16	D	60U	10U	58.4J	0.50J	0.70J	10U	8.5J	100U	2.5J	29,900	65.1	0.20U	40U	**183**	10U	743J	10U	4.0J
		T	60U	2.4J	59.6J	0.60 J	0.90J	10U	10.7J	118	12.6	31,300	129	U	1.2J	**191**	10U	261J	10U	5.5J
MW-3	Mar-16	D	60U	10U	39.4J	0.20J	0.50J	10U	8.1J	100U	2.0J	11,300	**1,270**	0.20U	9.7J	**25.4**	10U	**20,600**	10U	19.9J
		T	60U	10U	43.5J	0.20J	0.60J	0.30J	10.5J	**1,410**	3.9J	11,600	**1260**	0.20U	10J	**21.6**	10U	**21,100**	10U	24.4
MW-4	Mar-16	D	60U	**48.4**	87.9J	0.70J	0.40J	10.5	36.5	**7,380**	**45.0**	1,700	**559**	0.20U	9.1J	10U	10U	**22,900**	10U	26.7
		T	60U	**66.3**	201	2.2J	1.9J	31.6	180	**25,000**	**224**	5,790	**1,170**	0.086JN	27.2J	4.9J	2.6J	**25,500**	10U	133
MW-5	Mar-16	D	60U	10U	145J	0.20J	0.40J	10U	7.5J	100U	1.8J	8,500	**444**	0.20U	3.8J	10U	10U	5,260	10U	16.8J
		T	60U	10U	136J	0.4J	0.3J	10U	7.5J	169	1.9J	8,940	**439**	0.20U	4.2J	10U	10U	6,560	10U	16.3J
MW-6	Mar-16	D	60U	10U	108J	0.30J	0.70J	10U	7.4J	115	3.8J	845J	40.1	0.20U	5.4J	10U	10U	1860J	10U	152
		T	60U	10U	114J	0.50J	0.70J	1.3J	9.6J	**1,500**	10.5	1,140	66.4	0.20U	6.0J	10U	10U	1,970J	10U	157
MW-7	Mar-16	D	60U	10U	138J	0.50J	2.5J	10U	24.4J	100U	2.4J	898J	143	0.20U	14.9J	10U	10U	851J	10U	575
		T	60U	2.9J	134J	0.60J	2.3J	10U	23.3J	**320**	3.5J	969J	145	0.20U	14.5J	10U	10U	5,000U	10U	557
MW-9	Mar-16	D	60U	10U	55.5J	0.20J	5.0U	10U	0.90J	**631**	1.9J	906J	119	0.20U	40U	10U	10U	1290J	10U	20U
		T	60U	3.4J	57.1J	0.30J	0.20J	10U	1.9J	**846**	2.1J	944J	123	0.20U	0.80J	10U	10U	2,240J	10U	1.1J
MW-10 (MW-9A)	Mar-16	D	**6.3J**	10U	27.4J	5.0U	0.20J	10U	2.7J	**351**	1.9J	4,600	32.9	0.20U	40U	**22.2**	10U	2,330J	10U	5.4J
		T	**9.6J**	18.2	215	2.0J	2.4J	24.2	74.7	**32,600**	**58.7**	11,900	**1,840**	0.20U	34.4J	**22.2**	3.3J	3,560J	10U	124.0
MW-11	Mar-16	D	60U	10U	87.2J	0.20J	0.20J	10U	3.2J	157	5.0U	9,520	13.9J	0.20U	4.7J	**54.5**	10U	674J	10U	5.8J
		T	60U	3.2J	179J	0.70J	0.60J	19.1	18.7J	**13,000**	13.9	12,200	**365**	0.20U	13.0J	**52.8U**	1.2J	898J	10U	51.8
MW-12	Mar-16	D	60U	10U	122J	0.80J	0.80J	10U	6.3J	**916**	7.0	2,970	**813**	0.20U	8.9J	10U	10U	4,700J	10U	42.7
		T	60U	5.2J	121J	0.80J	0.80J	10U	5.7J	**955**	8.7	2,900	**801**	0.20U	8.3J	10U	10U	3,220J	10U	39.2
MW-13	Mar-16	D	60U	10U	56.5J	0.20J	0.30J	10U	3.9J	100U	2.4J	8,700	**1,110**	0.20U	7.2J	10U	10U	**37,000**	10U	6.3J
		T	60U	10U	54.9J	0.20J	0.30J	10U	3.4J	100U	5.0U	8,520	**1,080**	0.072JN	6.4J	10U	10U	**35,900**	10U	5.3J

1. All data are presented in micrograms per liter (µg/L).
2. Metals analysis by US EPA Method 6010/7470.
3. B - Analyte found in associated method blank.
4. U - Compound not detected at or above the method detection limit (MDL).
5. J - Estimated concentration above the MDL but less than the reporting limit.
6. * - Duplicate analysis not in control limits
7. E - Serial dilution is not within acceptance criteria, or the reported value is estimated because of the presence of interference.
8. AWQS - New York State Ambient Water Quality Standards (TOGs 1.1.1); GV - guidance value.
9. NA indicates 1) no standard or guidance value exists for the compound, or 2) sample was not analyzed for indicated compound.
10. **BOLD** font in shaded cell indicates exceedances of AWQS+GV.

Table 4
Summary of Exceedances in 2015 and 2016 Groundwater Samples
Beaver Smelting
Fallsburg, New York

Monitoring Well Sampled	January 2015		March 2016	
	Exceedances in Unfiltered Samples	Exceedances in Filtered Samples	Exceedances in Unfiltered Samples	Exceedances in Filtered Samples
MW-2	Antimony, Arsenic, Beryllium, Cadmium, Chromium, Copper, Iron, Lead, Magnesium, Manganese, Nickel, Selenium	Antimony, Chromium, Iron, Lead, Manganese, Selenium	Selenium	No exceedances
MW-3	Iron, Manganese, Selenium	Iron, Lead, Manganese, Selenium	Iron, Manganese, Selenium, Sodium	Manganese, Selenium, Sodium
MW-4	Antimony, Arsenic, Barium, Beryllium, Cadmium, Chromium, Copper, Iron, Lead, Manganese, Mercury, Nickel	Antimony, Arsenic, Barium, Beryllium, Cadmium, Chromium, Copper, Iron, Lead, Manganese, Magnesium, Nickel, Thallium	Arsenic, Iron, Lead, Manganese, Sodium	Arsenic, Iron, Lead, Manganese, Sodium
MW-5	Iron, Manganese	Iron, Manganese	Manganese	Manganese
MW-6	Iron	Antimony, Beryllium, Chromium, Iron, Lead, Manganese	Iron	No exceedances
MW-7	Arsenic, Beryllium, Cadmium, Chromium, Copper, Iron, Lead, Manganese, Nickel	Iron	Iron	No exceedances
MW-9	Iron, Lead, Manganese	Iron	Iron	Iron
MW-10	Beryllium, Cadmium, Chromium, Copper, Iron, Lead, Magnesium, Manganese, Nickel	Iron, Manganese, Selenium	Antimony, Iron, Lead, Manganese, Selenium	Antimony, Iron, Selenium
MW-11	Chromium, Iron, Lead, Manganese, Selenium	Antimony, Arsenic, Beryllium, Cadmium, Chromium, Copper, Iron, Lead, Magnesium, Manganese, Nickel, Selenium	Iron, Manganese, Selenium	Selenium
MW-12	Arsenic, Beryllium, Chromium, Iron, Lead, Manganese, Nickel	Antimony, Arsenic, Beryllium, Chromium, Iron, Lead, Manganese, Nickel	Iron, Manganese	Iron, Manganese
MW-13	Manganese, Sodium	Chromium, Iron, Lead, Manganese	Manganese, Sodium	Manganese, Sodium

Figures



MAPPING REFERENCE:
BACKGROUND IMAGERY FROM NEW YORK STATE GIS CLEARING HOUSE.

0' 1000' 2000' 400'

AECOM

FIGURE 1
SITE LOCATION MAP
BEAVER SMELTING SITE
NYSDEC SITE # 353005
TOWN OF FALLSBURG, NEW YORK

FILE NAME:	DRN	PROJECT NO.	DATE	FIGURE NO.
	---	60302031.2	12/2013	1

Plotted By: meisterk
Layout-Sheet Name: FIGURE 1
Plot File Date Created: Dec/09/2013 11:20 AM

Filename: P:\105989\CADD\BEAVER_SMELTING_IMAGE.DWG

MAPPING REFERENCE:
BACKGROUND IMAGERY FROM NEW YORK STATE GIS CLEARING HOUSE.

LEGEND:

APPROXIMATE LOCATION OF LANDFILL

0' 50' 100' 200'

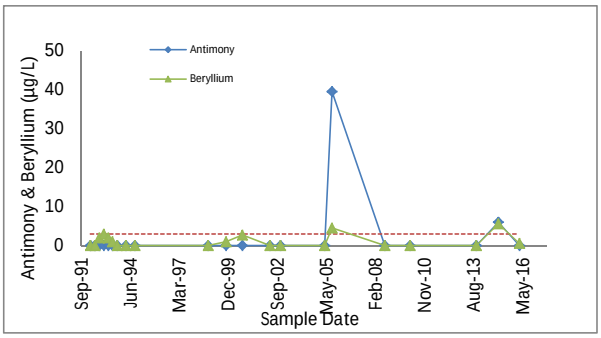
APPROXIMATE

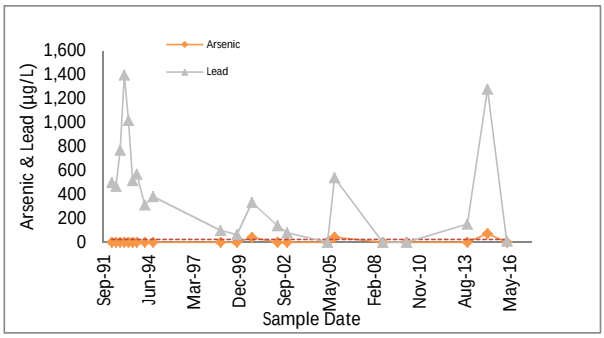
AECOM

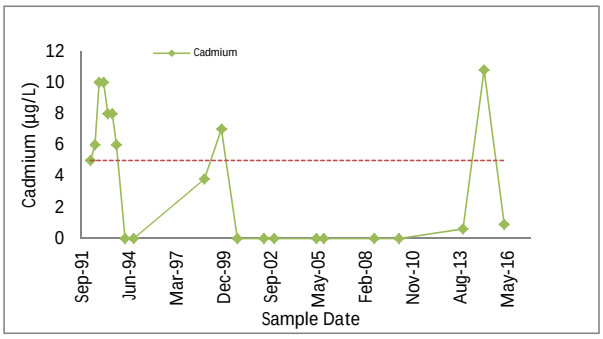
FIGURE 2
LOCATION OF MONITORING WELLS
BEAVER SMELTING SITE
NYSDEC SITE # 353005
TOWN OF FALLSBURG, NEW YORK

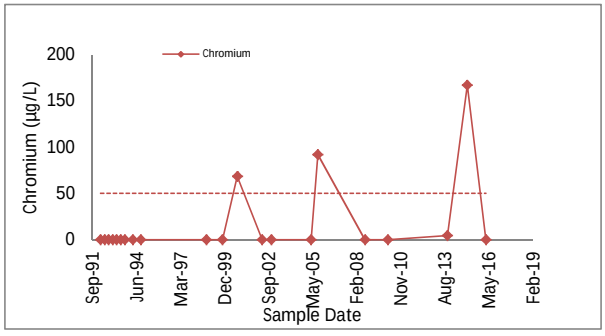
FILE NAME:	DRN	PROJECT NO.	DATE	FIGURE NO.
2016 Beaver.dwg	RNB	60302031.2	11/2016	2

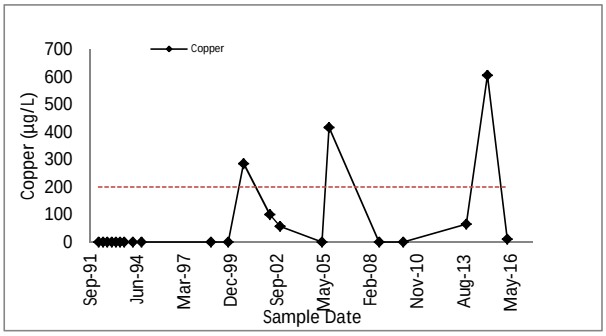
Figure 3
Analytical Results for Total (Unfiltered) Metals Exceeding NYS AWQS or Guidance Values in Monitoring Well MW-2
Beaver Smelting Site
Fallsburg, New York

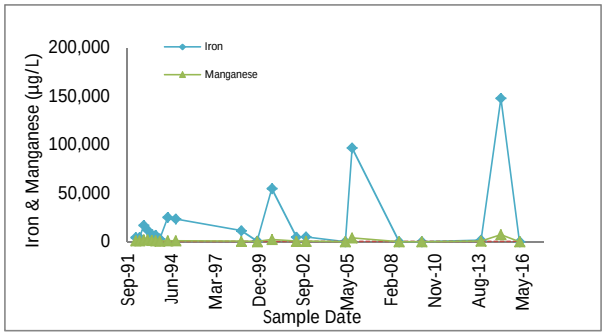


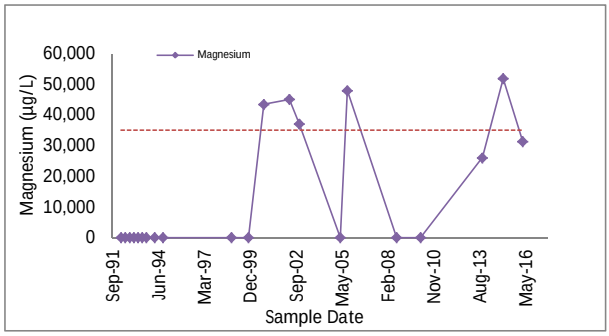


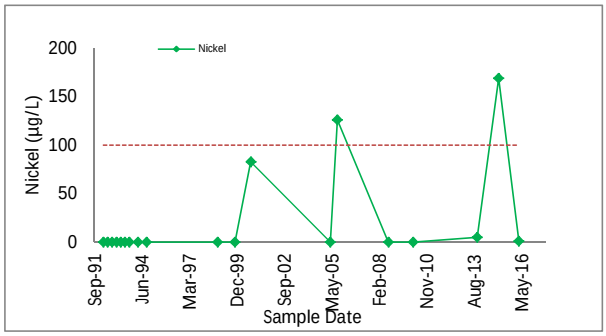












Notes:
1. The New York State Ambient Water Quality Standards (NYS AWQS) and the New York State Guidance Values (NYS GVs) are represented by a red dashed line.
2. NYS AWQSs and NYS GVs are from 6. NYCRR Part 703.5.
3. Only metals that exceeded in at least one of the sampling events in this well are plotted.
4. Analytes not detected above the laboratory method detections limits are included in the plots as 0.

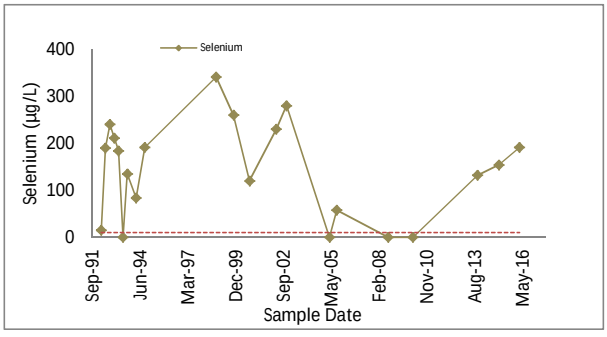


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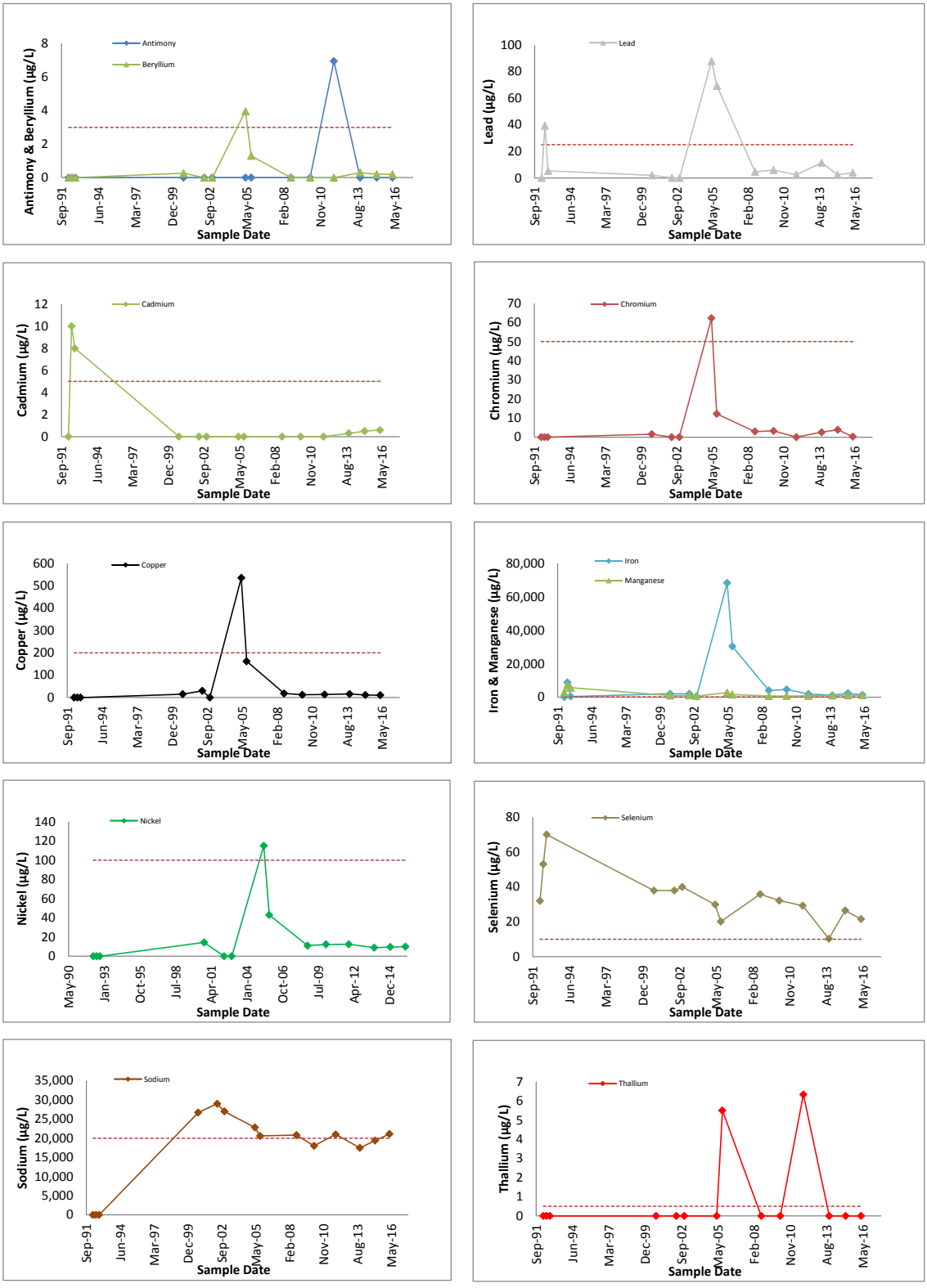
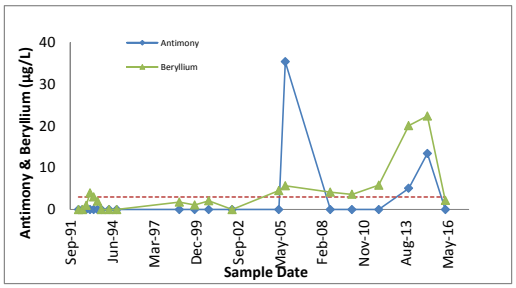
Figure 4
Analytical Results for Total (Unfiltered) Metals Exceeding NYS AWQS or Guidance Values in Monitoring Well MW-3
Beaver Smelting Site
Fallsburg, New York

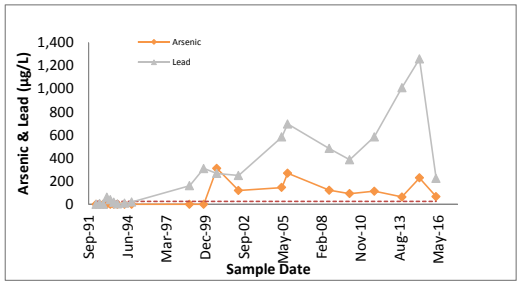


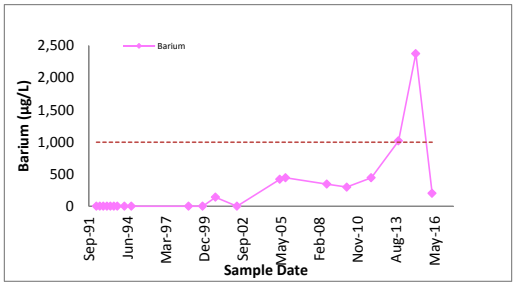
Notes:
1. The New York State Ambient Water Quality Standards (NYS AWQS) and the New York State Guidance Values (NYS GVs) are represented by a red dashed line.
2. NYS AWQSs and NYS GVs are from 6. NYCRR Part 703.5.
3. Only metals that exceeded in at least one of the sampling events in this well are plotted.
4. Analytes not detected above the laboratory method detections limits are included in the plots as 0.

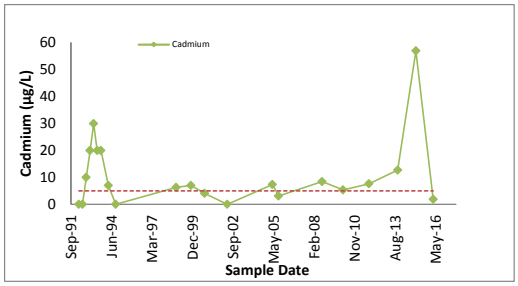
AECOM

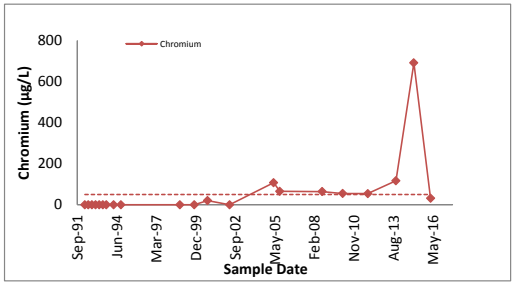
Figure 5
Analytical Results for Total (Unfiltered) Metals Exceeding NYS AWQS or Guidance Values in Monitoring Well MW-4
Beaver Smelting Site
Fallsburg, New York

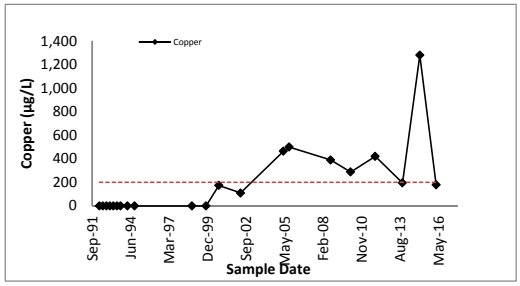


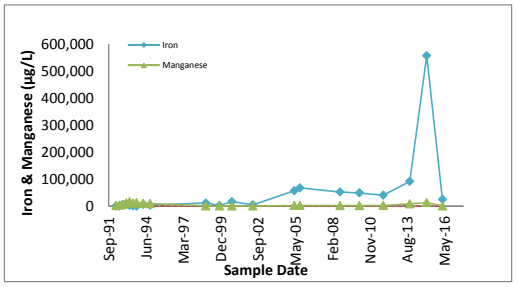


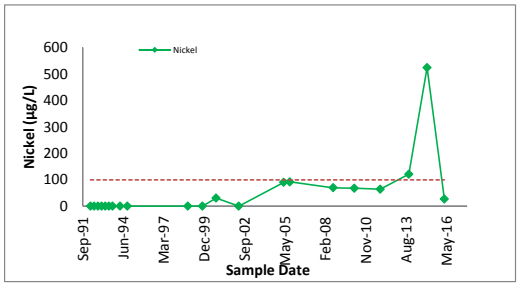


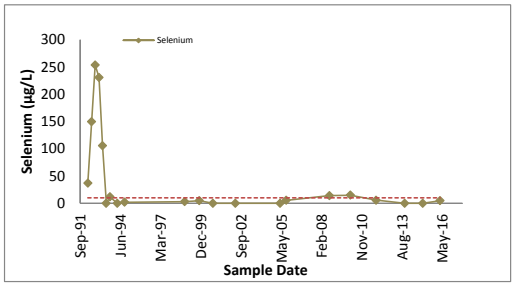


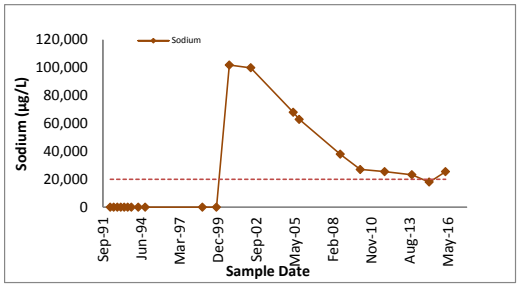




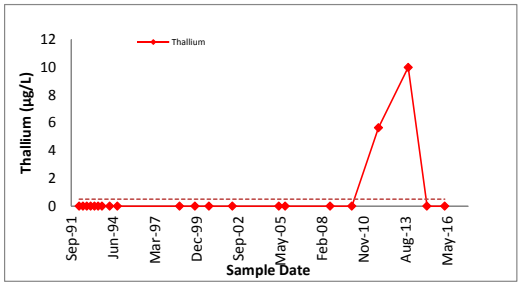






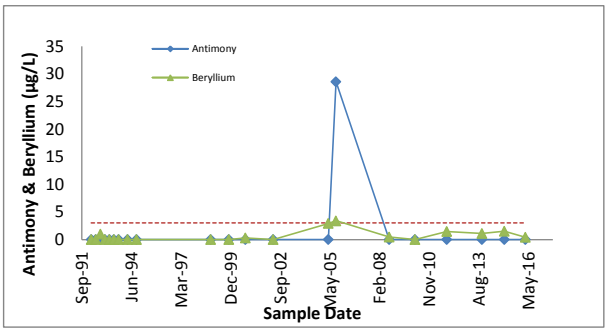


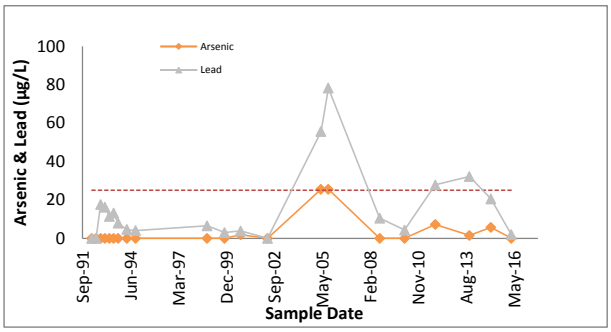
Notes:
1. The New York State Ambient Water Quality Standards (NYS AWQS) and the New York State Guidance Values (NYS GVs) are represented by a red dashed line.
2. NYS AWQSs and NYS GVs are from 6. NYCRR Part 703.5.
3. Only metals that exceeded in at least one of the sampling events in this well are plotted.
4. Analytes not detected above the laboratory method detections limits are included in the plots as 0.

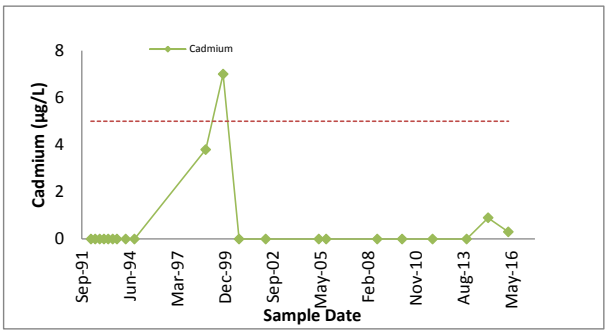


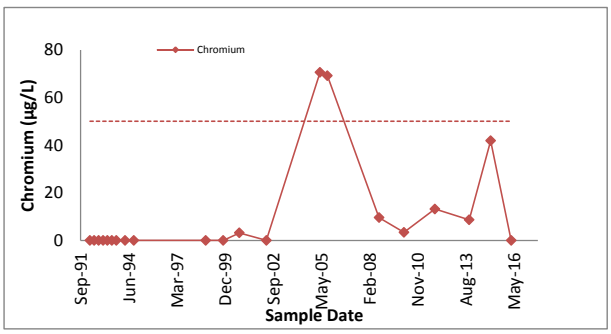
AECOM

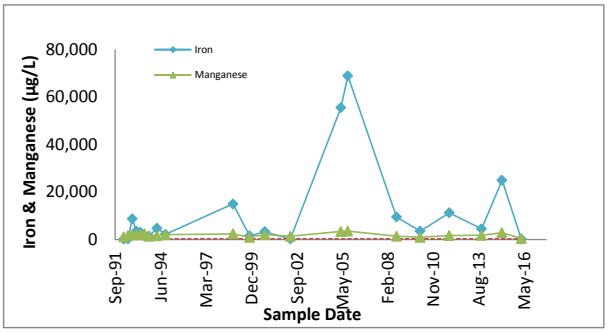
Figure 6
Analytical Results for Total (Unfiltered) Metals Exceeding NYS AWQS or Guidance Values in Monitoring Well MW-5
Beaver Smelting Site
Fallsburg, New York

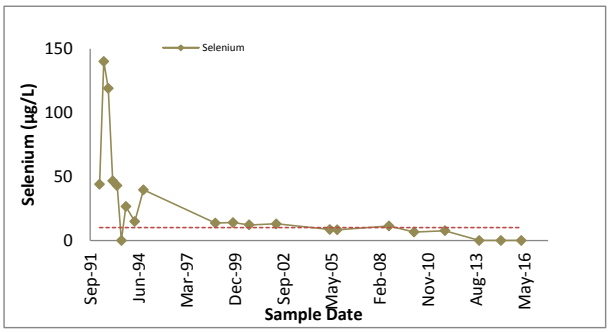












Notes:
1. The New York State Ambient Water Quality Standards (NYS AWQS) and the New York State Guidance Values (NYS GVs) are represented by a red dashed line.
2. NYS AWQSs and NYS GVs are from 6. NYCRR Part 703.5.
3. Only metals that exceeded in at least one of the sampling events in this well are plotted.
4. Analytes not detected above the laboratory method detections limits are included in the plots as 0.

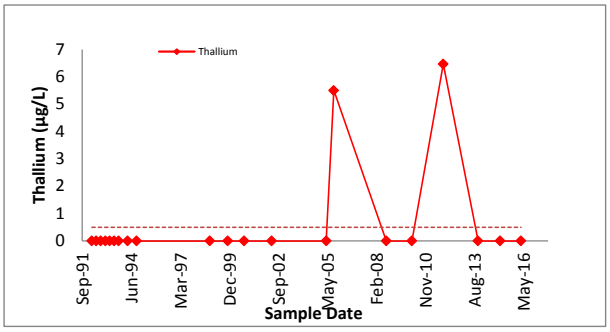


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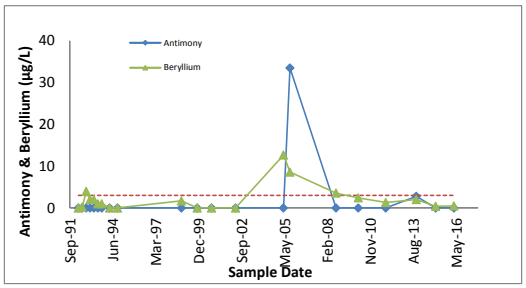
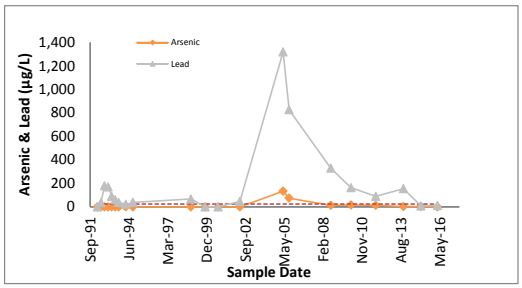
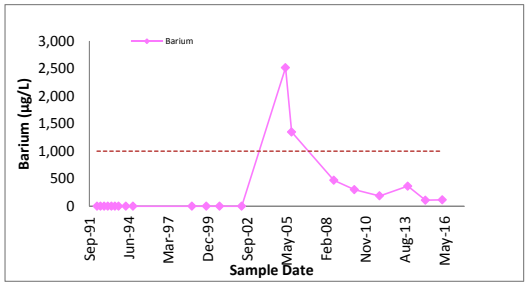
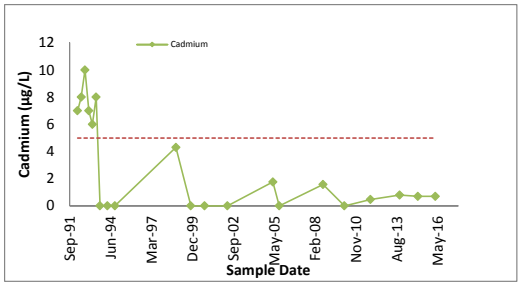
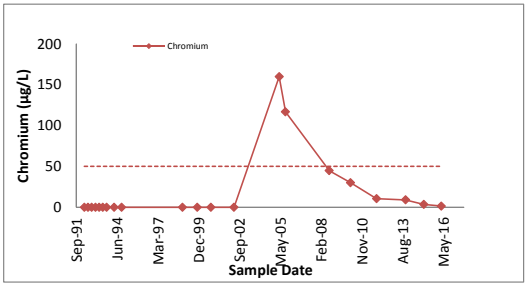
Figure 7
Analytical Results for Total (Unfiltered) Metals Exceeding NYS AWQS or Guidance Values in Monitoring Well MW-6
Beaver Smelting Site
Fallsburg, New York

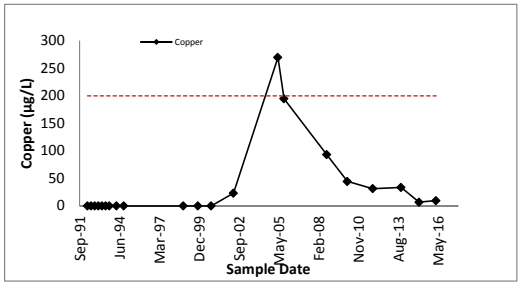


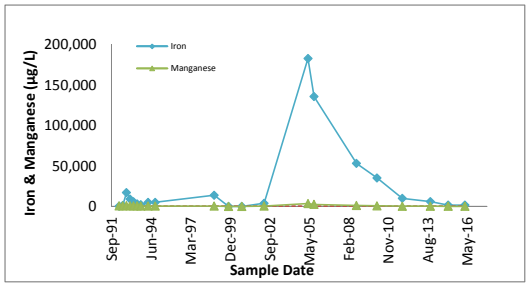


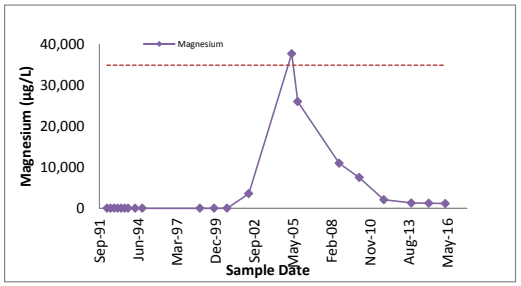


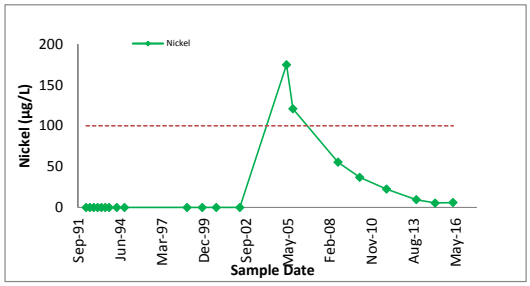


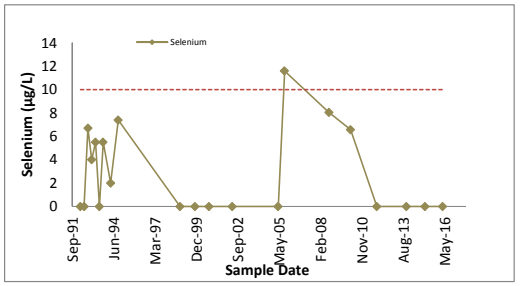




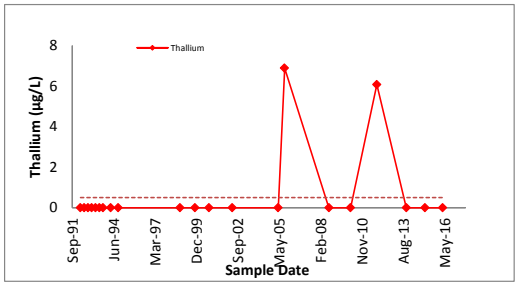






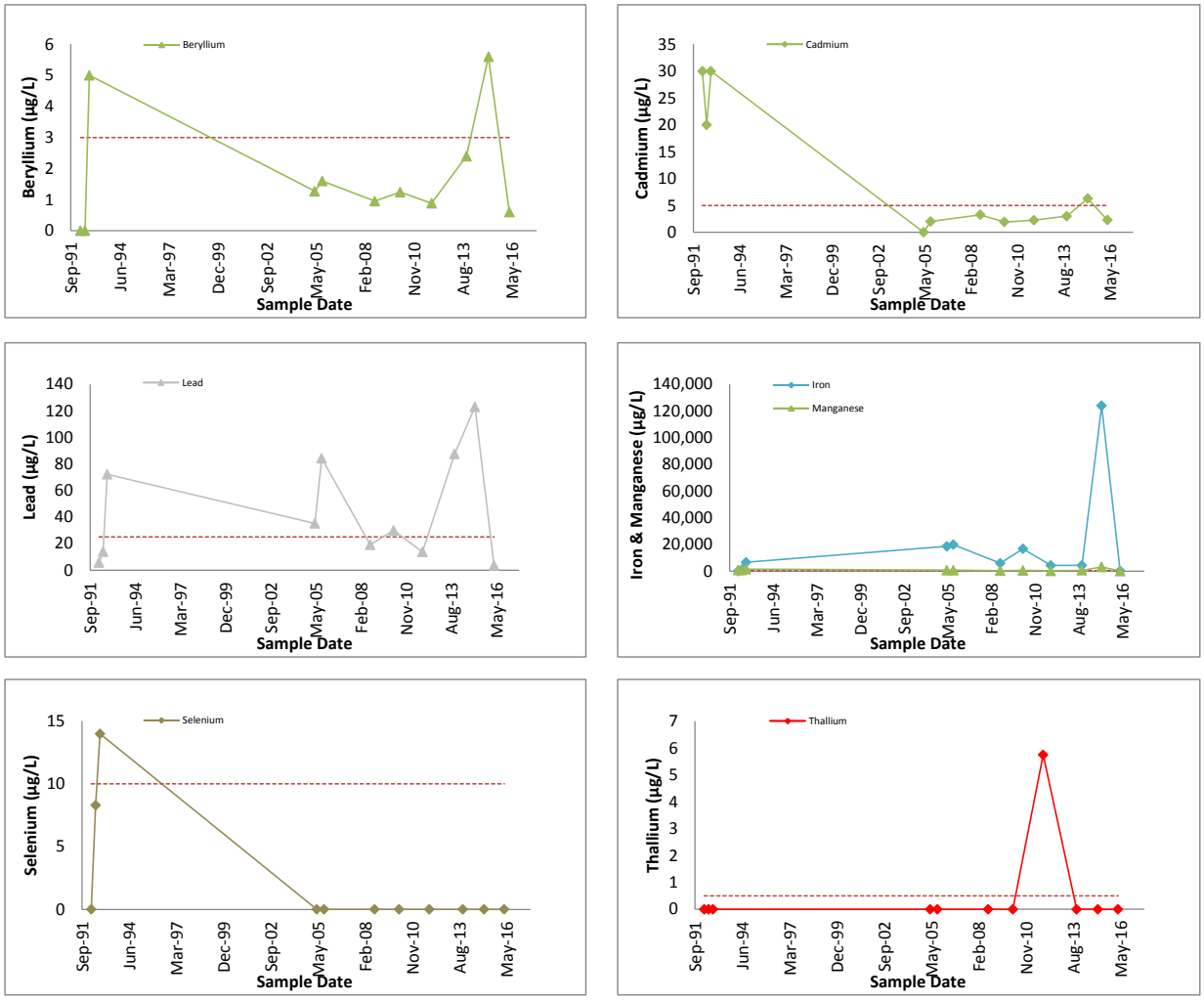


Notes:
1. The New York State Ambient Water Quality Standards (NYS AWQS) and the New York State Guidance Values (NYS GVs) are represented by a red dashed line.
2. NYS AWQSs and NYS GVs are from 6. NYCRR Part 703.5.
3. Only metals that exceeded in at least one of the sampling events in this well are plotted.
4. Analytes not detected above the laboratory method detections limits are included in the plots as 0.



AECOM

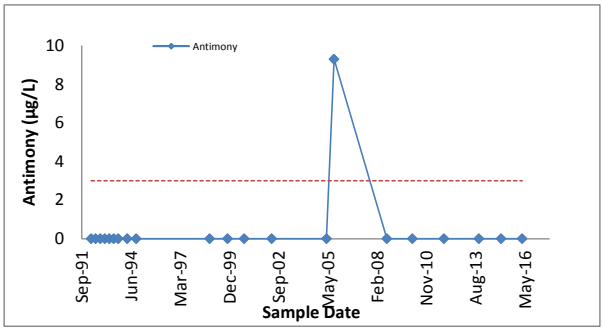
Figure 8
Analytical Results for Total (Unfiltered) Metals Exceeding NYS AWQS or Guidance Values in Monitoring Well MW-7
Beaver Smelting Site
Fallsburg, New York

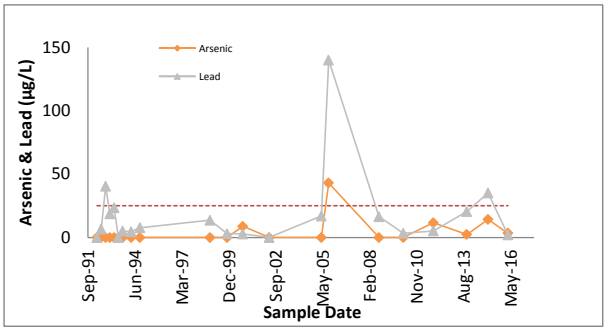


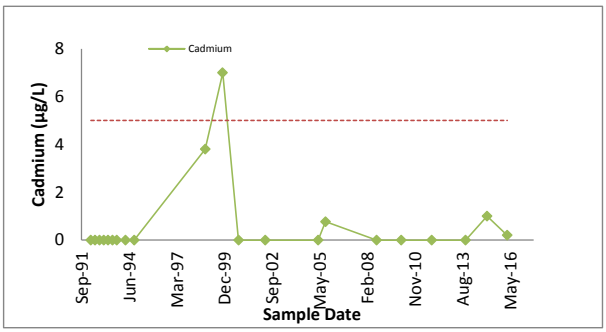
Notes:
1. The New York State Ambient Water Quality Standards (NYS AWQS) and the New York State Guidance Values (NYS GVs) are represented by a red dashed line.
2. NYS AWQSs and NYS GVs are from 6. NYCRR Part 703.5.
3. Only metals that exceeded in at least one of the sampling events in this well are plotted.
4. Analytes not detected above the laboratory method detections limits are included in the plots as 0.

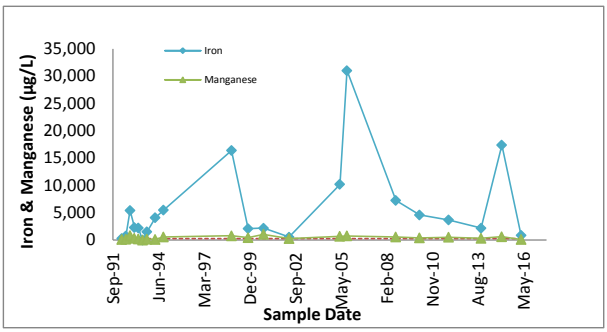
AECOM

Figure 9
Analytical Results for Total (Unfiltered) Metals Exceeding NYS AWQS or Guidance Values in Monitoring Well MW-9
Beaver Smelting Site
Fallsburg, New York









Notes:
1. The New York State Ambient Water Quality Standards (NYS AWQS) and the New York State Guidance Values (NYS GVs) are represented by a red dashed line.
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3. Only metals that exceeded in at least one of the sampling events in this well are plotted.
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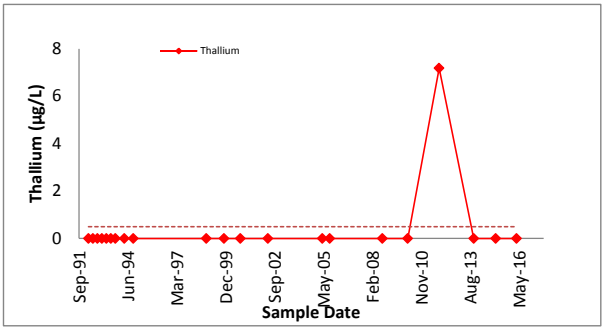

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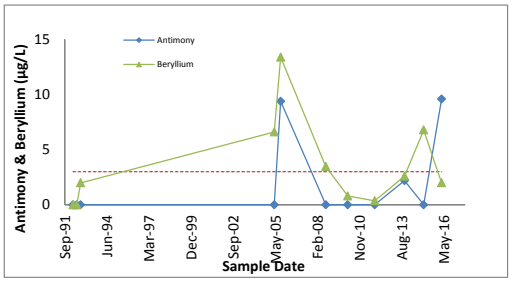
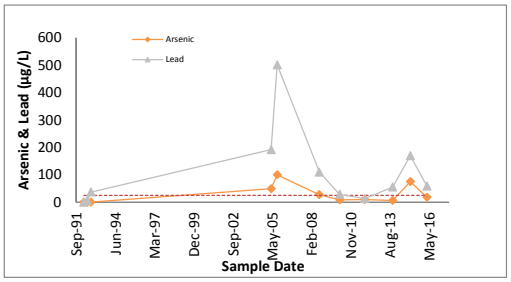
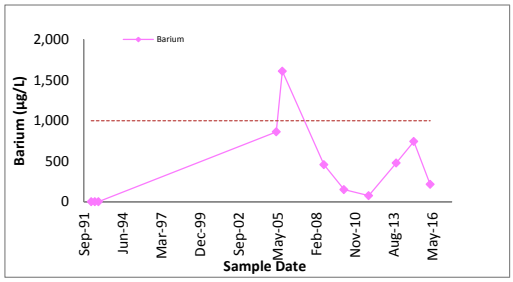
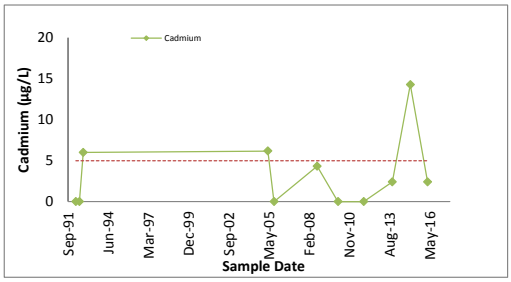
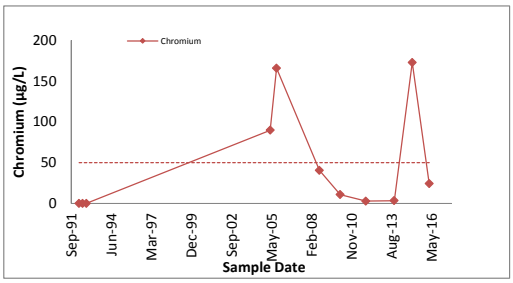
Figure 10
Analytical Results for Total (Unfiltered) Metals Exceeding NYS AWQS or Guidance Values in Monitoring Well MW-10
Beaver Smelting Site
Fallsburg, New York

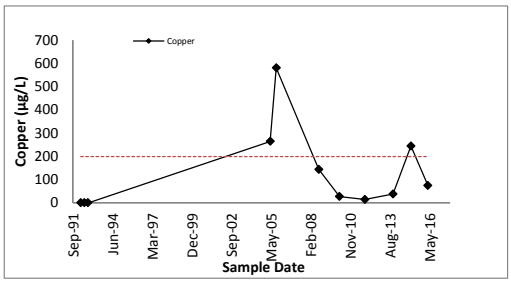


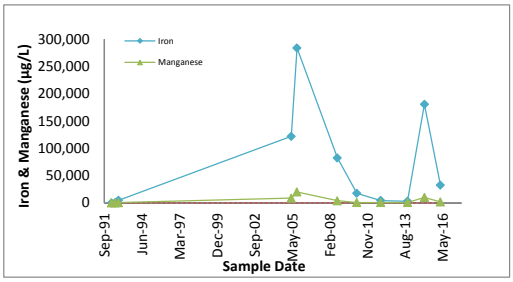


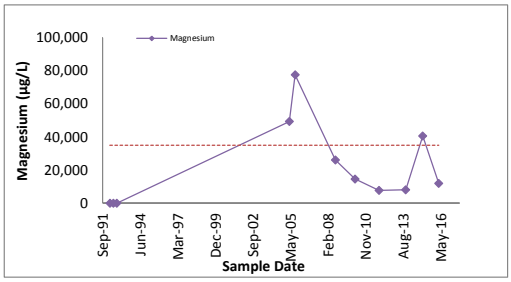


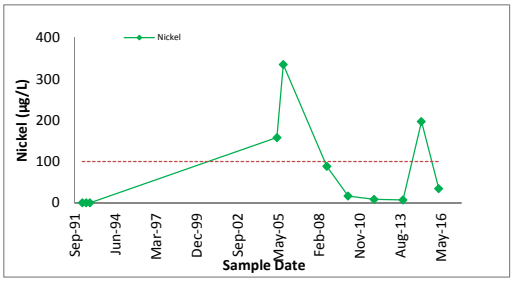


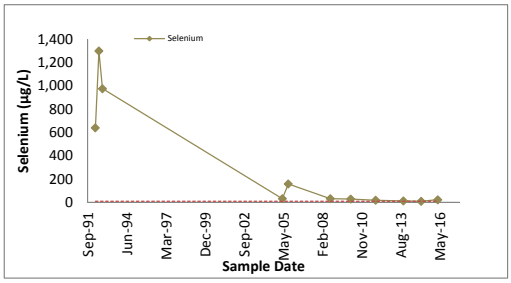












Notes:
1. The New York State Ambient Water Quality Standards (NYS AWQS) and the New York State Guidance Values (NYS GVs) are represented by a red dashed line.
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4. Analytes not detected above the laboratory method detections limits are included in the plots as 0.

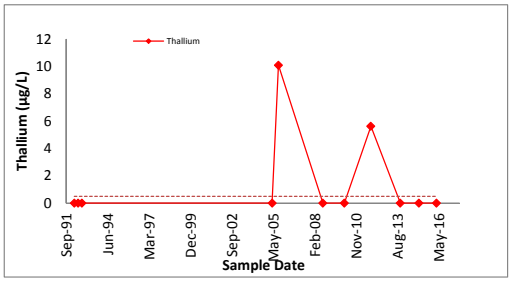

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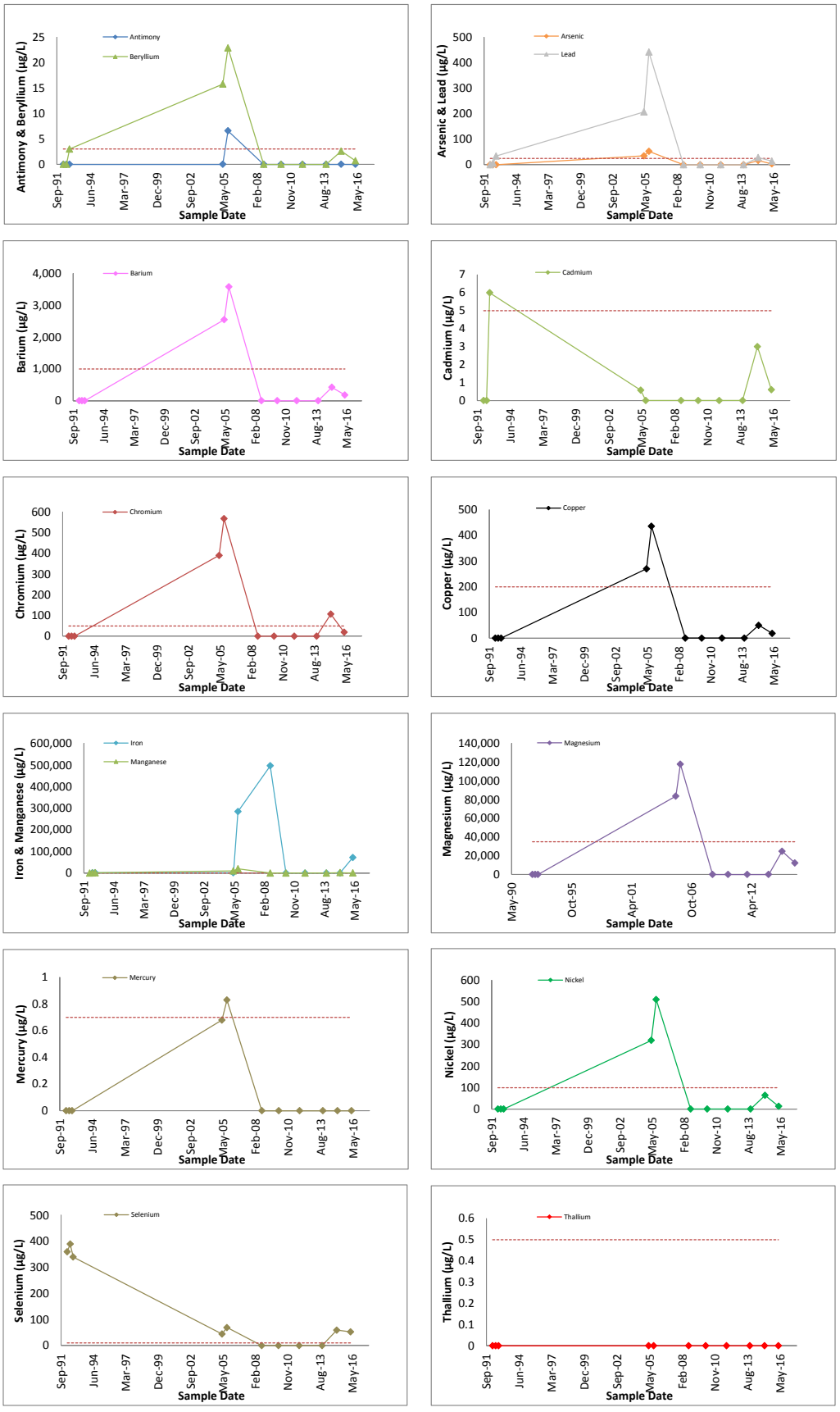
Figure 11
Analytical Results for Total (Unfiltered) Metals Exceeding NYS AWQS or Guidance Values in Monitoring Well MW-11
Beaver Smelting Site
Fallsburg, New York



Notes:
1. The New York State Ambient Water Quality Standards (NYS AWQS) and the New York State Guidance Values (NYS GVs) are represented by a red dashed line.
2. NYS AWQSs and NYS GVs are from 6. NYCRR Part 703.5.
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4. Analytes not detected above the laboratory method detections limits are included in the plots as 0.

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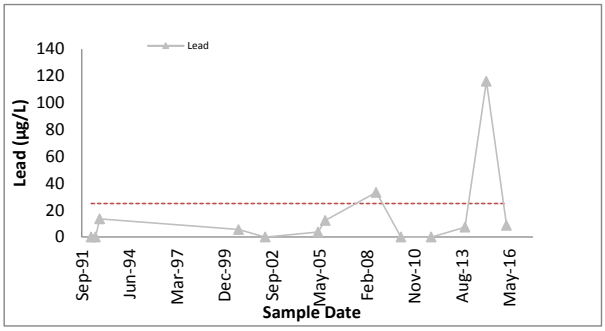
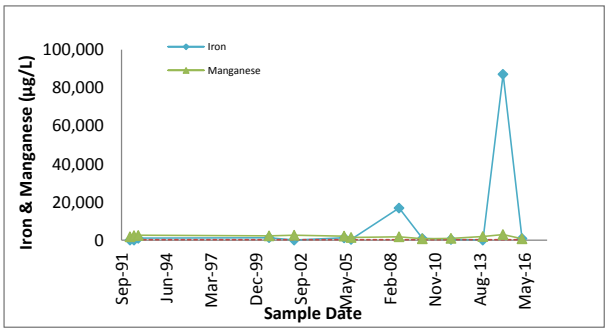
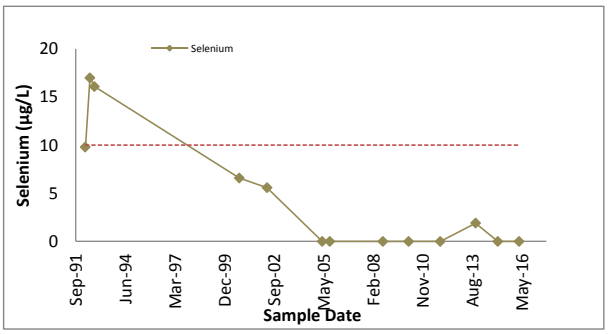
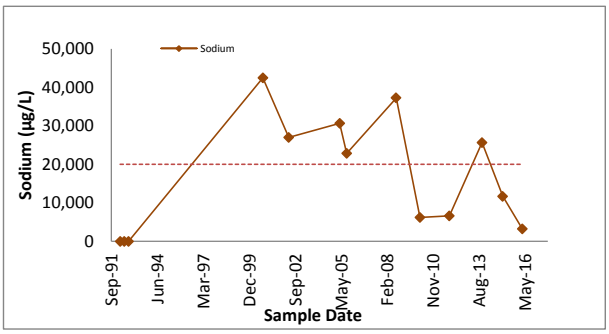
Figure 12
Analytical Results for Total (Unfiltered) Metals Exceeding NYS AWQS or Guidance Values in Monitoring Well MW-12
Beaver Smelting Site
Fallsburg, New York









Notes:
1. The New York State Ambient Water Quality Standards (NYS AWQS) and the New York State Guidance Values (NYS GVs) are represented by a red dashed line.
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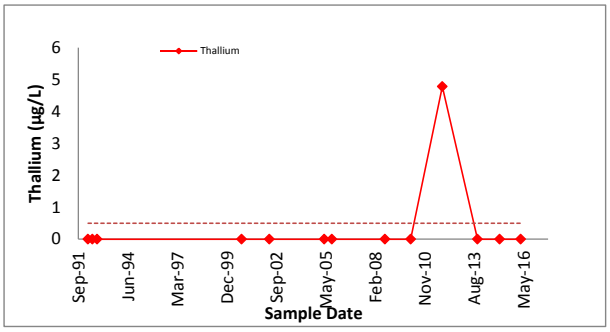

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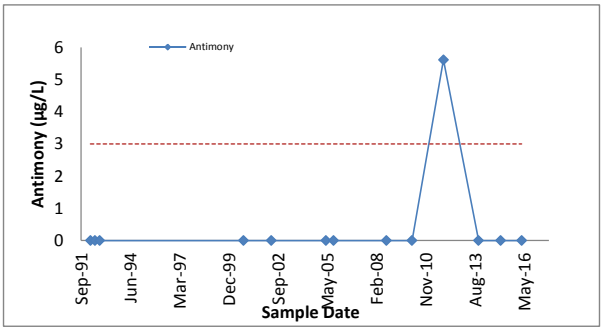
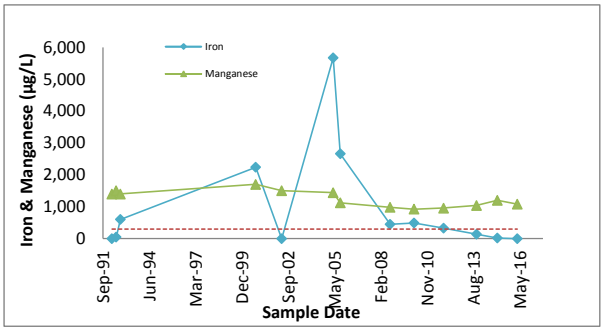
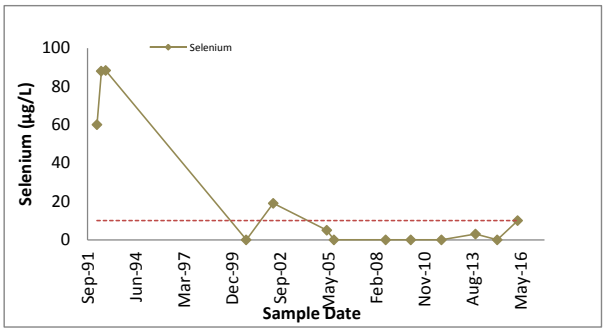
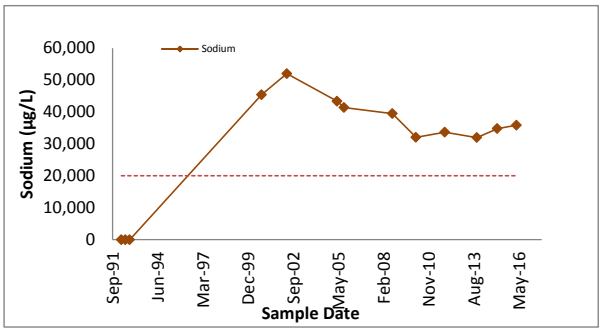
Figure 13
Analytical Results for Total (Unfiltered) Metals Exceeding NYS AWQS or Guidance Values in Monitoring Well MW-13
Beaver Smelting Site
Fallsburg, New York









Notes:
1. The New York State Ambient Water Quality Standards (NYS AWQS) and the New York State Guidance Values (NYS GVs) are represented by a red dashed line.
2. NYS AWQSs and NYS GVs are from 6. NYCRR Part 703.5.
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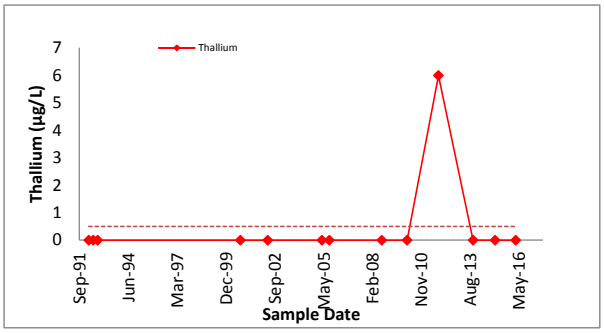

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Appendix A

Site-Wide Semi-Annual Inspection Form

Beaver Smelting
Beaver Lane
Fallsburg, New York

Engineering Control (s): Monitoring wells, soil cover, GW int. trench Inspection Date: 4/30/2015

Item	Yes	No	N/A	Comments
Does the Engineering Control continue to perform as designed?	X			No change in previously identified Seep.
Does the Engineering Control continue to protect human health and the environment?	X			
Does the Engineering Control comply with requirements established in the SMP?	X			
Has remedial performance criteria been achieved or maintained?	X			Maintained
Has sampling and analysis of appropriate media been performed during the monitoring event?	X			Yes, during scheduled 5-quarter Sampling events — Not during this inspection
Have there been any modifications made to the remedial or monitoring system?		X		
Does the remedial or monitoring system need to be changed or altered at this time?		X		
Has there been any intrusive activity, excavation, or construction occurred at the site?		X		
Were the activities mentioned above, performed in accordance with the SMP?	X			
Was there a change in the use of the site or were there new structures constructed on the site?		X		
In case a new occupied structure is constructed or the use of the current building changed, was a vapor intrusion evaluation done?		X		
Were new mitigation systems installed based on monitoring results?		X		
Were the groundwater wells in the monitoring network inspected during this site inspection? If so, were the Monitoring Well Field Inspection Logs Completed?	X			See attached Monitoring well field inspection logs.

Note: Upon completion of the form any non-conforming items warranting corrective action should be identified here within.

Name of Inspector: Kelly Lurie
Inspector's Company: AECOM

Signature of Inspector: Kelly Lurie
Date: 4/30/15

IMMEDIATELY REPORT ANY FAILURE OR DEFECT TO THE PROJECT MANAGER SO A COUNTERMEASURE PLAN CAN BE IMPLEMENTED.

SITE NAME: Beaver Smelting

SITE ID.: 353005
INSPECTOR: KAK
DATE/TIME: 4/30/15
WELL ID.: MW-2

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	
WELL COORDINATES? NYTM X_____ NYTM Y_____		
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____		
GPS Method (circle) Trimble And/Or Magellan		
WELL I.D. VISIBLE?		X
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	Y	
WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL:		
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	

HEADSPACE READING (ppm) AND INSTRUMENT USED	—
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable)	1 ft. Stick-up
PROTECTIVE CASING MATERIAL TYPE:	Steel
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches):	6"

	YES	NO
LOCK PRESENT?		X
LOCK FUNCTIONAL?	NA	
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?		X

MEASURE WELL DEPTH FROM MEASURING POINT (Feet):	
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet):	
MEASURE WELL DIAMETER (Inches):	4"
WELL CASING MATERIAL:	PVC
PHYSICAL CONDITION OF VISIBLE WELL CASING:	Good
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE	
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES	NO

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.

easy access by foot or vehicle - in small cluster of overgrown shrubs.

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.

field / overgrown shrubs.

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):

Site Contaminants.

REMARKS:

Sketch

SITE NAME: Beaver Smelting

SITE ID.: 353005
INSPECTOR: KAL
DATE/TIME: 4/30/2015
WELL ID.: MW-3

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	

WELL COORDINATES? NYTM X_____ NYTM Y_____
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____
GPS Method (circle) Trimble And/Or Magellan

	YES	NO
WELL I.D. VISIBLE?	X	
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	MW-3 ↙	
WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL:		

	YES	NO
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	

HEADSPACE READING (ppm) AND INSTRUMENT USED	
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable)	2' Stick-up
PROTECTIVE CASING MATERIAL TYPE:	Steel
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches):	4"

	YES	NO
LOCK PRESENT?		X
LOCK FUNCTIONAL?	NA	
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?		X

MEASURE WELL DEPTH FROM MEASURING POINT (Feet):	—
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet):	—
MEASURE WELL DIAMETER (Inches):	2"
WELL CASING MATERIAL:	PVC
PHYSICAL CONDITION OF VISIBLE WELL CASING:	Good
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE	—
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES	NO

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.
accessible - by foot or truck

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.
along toe of landfill - below riprap.

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):
Site Contaminants

REMARKS:

Sketch

SITE NAME: Beaver Smelting

SITE ID.: 35003
INSPECTOR: KAL
DATE/TIME: 4/30/15
WELL ID.: MW-4

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	

WELL COORDINATES? NYTM X_____ NYTM Y_____
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____
GPS Method (circle) Trimble And/Or Magellan

	YES	NO
WELL I.D. VISIBLE?	X	
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	X	

WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL: MW-4

	YES	NO
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	

HEADSPACE READING (ppm) AND INSTRUMENT USED: —
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable): 2' Stickup
PROTECTIVE CASING MATERIAL TYPE: Steel
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches): 4"

	YES	NO
LOCK PRESENT?		X
LOCK FUNCTIONAL?	NA	
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?		X

MEASURE WELL DEPTH FROM MEASURING POINT (Feet): —
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet): —
MEASURE WELL DIAMETER (Inches): 2"
WELL CASING MATERIAL: PVC
PHYSICAL CONDITION OF VISIBLE WELL CASING: Good
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES: NO

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.
Accessible - foot or Vehicle

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.
toe of landfill - west - below rip-rap.

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):
Site Contaminants

REMARKS:

Sketch

SITE NAME: Beaver Smelting

SITE ID.: 35003
INSPECTOR: KAL
DATE/TIME: 4/30/15
WELL ID.: MW-5

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	
WELL COORDINATES? NYTM X_____ NYTM Y_____		
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____		
GPS Method (circle) Trimble And/Or Magellan		
WELL I.D. VISIBLE?	X	
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	X	
WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL: MW-5		
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	
HEADSPACE READING (ppm) AND INSTRUMENT USED	—	
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable)	2' Stickup	
PROTECTIVE CASING MATERIAL TYPE:	Steel	
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches): 4"		
LOCK PRESENT?		X
LOCK FUNCTIONAL?	NA	
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?	X	
MEASURE WELL DEPTH FROM MEASURING POINT (Feet):	—	
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet):	—	
MEASURE WELL DIAMETER (Inches):	2"	
WELL CASING MATERIAL:	PVC	
PHYSICAL CONDITION OF VISIBLE WELL CASING:	good	
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE	—	
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES	NO	

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.

accessible by foot; limited by vehicle

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.

Southwest of landfill; within a patch of trees/brush.

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):

Site Contaminants, Roadway

REMARKS:

Sketch

SITE NAME: Beaver Smelting

SITE ID.: 353005
INSPECTOR: KAL
DATE/TIME: 4/30/2015
WELL ID.: MW-16

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	

WELL COORDINATES? NYTM X_____ NYTM Y_____
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____
GPS Method (circle) Trimble And/Or Magellan

	YES	NO
WELL I.D. VISIBLE?		X
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	X	

WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL: —

	YES	NO
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	

HEADSPACE READING (ppm) AND INSTRUMENT USED: —
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable): 2' Stick up
PROTECTIVE CASING MATERIAL TYPE: Steel
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches):

	YES	NO
LOCK PRESENT?		X
LOCK FUNCTIONAL?	NA	
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?	X	

MEASURE WELL DEPTH FROM MEASURING POINT (Feet):
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet):
MEASURE WELL DIAMETER (Inches):
WELL CASING MATERIAL: PVC
PHYSICAL CONDITION OF VISIBLE WELL CASING: Good
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES: NO

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.
poor - only accessible by foot

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.
within trees along open field.

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):
Site Contaminants

REMARKS:

Sketch

SITE NAME: Beaver Smelting

SITE ID.: 353005
INSPECTOR: KAL
DATE/TIME: 4/30/15
WELL ID.: MW-7

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	

WELL COORDINATES? NYTM X_____ NYTM Y_____
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____
GPS Method (circle) Trimble And/Or Magellan

	YES	NO
WELL I.D. VISIBLE?		X
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	X	

WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL:

	YES	NO
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	

HEADSPACE READING (ppm) AND INSTRUMENT USED: —
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable): 2' Stick-up
PROTECTIVE CASING MATERIAL TYPE: Steel
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches):

	YES	NO
LOCK PRESENT?	X	
LOCK FUNCTIONAL?		X
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?		X

MEASURE WELL DEPTH FROM MEASURING POINT (Feet):
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet):
MEASURE WELL DIAMETER (Inches):
WELL CASING MATERIAL: PVC
PHYSICAL CONDITION OF VISIBLE WELL CASING: Good
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE —
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES: NO

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.

Not easily accessible -

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.

heavily wooded area.

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):

Site Contaminants

REMARKS:

Sketch

SITE NAME: Baker Smelting

SITE ID.: 353005
INSPECTOR: KAL
DATE/TIME: 4/30/15
WELL ID.: MW-9

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	

WELL COORDINATES? NYTM X_____ NYTM Y_____
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____
GPS Method (circle) Trimble And/Or Magellan

	YES	NO
WELL I.D. VISIBLE?		X
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	X	

WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL:

	YES	NO
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	

HEADSPACE READING (ppm) AND INSTRUMENT USED: —
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable): 3' riser
PROTECTIVE CASING MATERIAL TYPE: Steel
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches):

	YES	NO
LOCK PRESENT?		X
LOCK FUNCTIONAL?		X
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?		X

MEASURE WELL DEPTH FROM MEASURING POINT (Feet):
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet):
MEASURE WELL DIAMETER (Inches):
WELL CASING MATERIAL: PVC
PHYSICAL CONDITION OF VISIBLE WELL CASING: Good
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES: NO

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.
Poor access - only by foot

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.
heavily wooded area

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):
Silt Contaminants

REMARKS:

Sketch

353005

SITE NAME: Beaver Smelting

SITE ID.: ~~MW-10~~
INSPECTOR: KAL
DATE/TIME: 4/30/15
WELL ID.: MW-10

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	

WELL COORDINATES? NYTM X_____ NYTM Y_____
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____
GPS Method (circle) Trimble And/Or Magellan

	YES	NO
WELL I.D. VISIBLE?		X
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	X	

WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL:

	YES	NO
SURFACE SEAL PRESENT?		Y
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	~~X~~

HEADSPACE READING (ppm) AND INSTRUMENT USED: —
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable): 2FT Stickup
PROTECTIVE CASING MATERIAL TYPE: Steel
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches):

	YES	NO
LOCK PRESENT?		X
LOCK FUNCTIONAL?	NA	
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?	X	

MEASURE WELL DEPTH FROM MEASURING POINT (Feet):
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet):
MEASURE WELL DIAMETER (Inches):
WELL CASING MATERIAL:
PHYSICAL CONDITION OF VISIBLE WELL CASING: PVC
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE: Good
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES: NO

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.
accessible by foot

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.
along access road within small wooded area

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):
Site Contamination

REMARKS:

Sketch

SITE NAME: _____ SITE ID.: 353005

INSPECTOR: KAL

MONITORING WELL FIELD INSPECTION LOG

DATE/TIME: 4/30/15

WELL ID.: MW-11

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	

WELL COORDINATES? NYTM X_____ NYTM Y_____

PDOP Reading from Trimble Pathfinder:_____ Satelites:_____

GPS Method (circle) Trimble And/Or Magellan

	YES	NO
WELL I.D. VISIBLE?		X
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)		X

WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL: .....

	YES	NO
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)		X
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	

HEADSPACE READING (ppm) AND INSTRUMENT USED.....

TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable): 4' Stick UP

PROTECTIVE CASING MATERIAL TYPE: Steel

MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches): .....

	YES	NO
LOCK PRESENT?	X	
LOCK FUNCTIONAL?	X	
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?		X

MEASURE WELL DEPTH FROM MEASURING POINT (Feet): .....

MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet): .....

MEASURE WELL DIAMETER (Inches): .....

WELL CASING MATERIAL: PVC

PHYSICAL CONDITION OF VISIBLE WELL CASING: Good

ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE .....

PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES..... NO

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.

accessible by foot

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.

in a heavily wooded area.

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):

Site Contamination

REMARKS:

Sketch

SITE NAME: Beaver Smelting

SITE ID.: 353005
INSPECTOR: KAL
DATE/TIME: 4/30/15
WELL ID.: MW-12

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	

WELL COORDINATES? NYTM X_____ NYTM Y_____
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____
GPS Method (circle) Trimble And/Or Magellan

	YES	NO
WELL I.D. VISIBLE?	X	
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	X	

WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL: MW-12

	YES	NO
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	

HEADSPACE READING (ppm) AND INSTRUMENT USED: —
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable): 3' Stick up
PROTECTIVE CASING MATERIAL TYPE: Steel
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches): _____

	YES	NO
LOCK PRESENT?	X	
LOCK FUNCTIONAL?		X
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?		X

MEASURE WELL DEPTH FROM MEASURING POINT (Feet): _____
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet): _____
MEASURE WELL DIAMETER (Inches): _____
WELL CASING MATERIAL: PVC
PHYSICAL CONDITION OF VISIBLE WELL CASING: Good
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE: —
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES: NO

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.

accessible by foot

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.

heavily wooded area.

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):

Site Contamination

REMARKS:

Sketch

SITE NAME: Beaver Smelting

SITE ID.: 353005
INSPECTOR: KAL
DATE/TIME: 4/30/15
WELL ID.: MW-B

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	

WELL COORDINATES? NYTM X_____ NYTM Y_____
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____
GPS Method (circle) Trimble And/Or Magellan

	YES	NO
WELL I.D. VISIBLE?	X	
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	V	

WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL: MW-13

	YES	NO
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	

HEADSPACE READING (ppm) AND INSTRUMENT USED: —
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable): 3' Stickup
PROTECTIVE CASING MATERIAL TYPE: Steel
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches): _____

	YES	NO
LOCK PRESENT?	X	
LOCK FUNCTIONAL?		X
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?	V	

MEASURE WELL DEPTH FROM MEASURING POINT (Feet): _____
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet): _____
MEASURE WELL DIAMETER (Inches): _____
WELL CASING MATERIAL: PVC
PHYSICAL CONDITION OF VISIBLE WELL CASING: Good
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE _____
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES: NO

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.
Accessible by foot

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.
heavily wooded area

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):
Site Contaminants

REMARKS:

Sketch

PHOTOGRAPHIC LOG

Client Name:	Site Location:	Project No.
NYSDEC	Beaver Smelting – Fallsburg, NY	60302031

Photo No.	Date:
1	4/30/15

Direction Photo Taken: Facing east

Description: Location of seep along western slope of landfill

Photo No.	Date:
2	4/30/15

Direction Photo Taken: Facing northwest

Description: Monitoring well MW-13

PHOTOGRAPHIC LOG

Client Name:	Site Location:	Project No.
NYSDEC	Beaver Smelting – Fallsburg, NY	60302031

Photo No.	Date:
3	4/30/15

Direction Photo Taken: Facing northeast

Description: Drain pipe running under ditch on southwest side of landfill

Photo No.	Date:
4	4/30/15

Direction Photo Taken: Facing west

Description: The eastern slope of the landfill, facing west

Site-Wide Semi-Annual Inspection Form

Beaver Smelting
Beaver Lane
Fallsburg, New York

Monitoring wells
Drainage ditches

Engineering Control (s): Soil Cap

Inspection Date: 12/4/15

Item	Yes	No	N/A	Comments
Does the Engineering Control continue to perform as designed?	X			
Does the Engineering Control continue to protect human health and the environment?	X			
Does the Engineering Control comply with requirements established in the SMP?	X			
Has remedial performance criteria been achieved or maintained?	X			Maintained
Has sampling and analysis of appropriate media been performed during the monitoring event?		X		Not during this inspection but has been completed per the SMP.
Have there been any modifications made to the remedial or monitoring system?		X		
Does the remedial or monitoring system need to be changed or altered at this time?		X		
Has there been any intrusive activity, excavation, or construction occurred at the site?		X		
Were the activities mentioned above, performed in accordance with the SMP?	X			
Was there a change in the use of the site or were there new structures constructed on the site?		X		
In case a new occupied structure is constructed or the use of the current building changed, was a vapor intrusion evaluation done?			X	
Were new mitigation systems installed based on monitoring results?			X	
Were the groundwater wells in the monitoring network inspected during this site inspection? If so, were the Monitoring Well Field Inspection Logs Completed?	X			See attached Monitoring Well field inspection Logs * Could not access MW-6 and MW-7 → log piles in the way to get to wells safely

Note: Upon completion of the form any non-conforming items warranting corrective action should be identified here within.

Name of Inspector: Kelly Lurie
Inspector's Company: AECOM

Signature of Inspector: Kelly Lurie
Date: 12/4/15

IMMEDIATELY REPORT ANY FAILURE OR DEFECT TO THE PROJECT MANAGER SO A COUNTERMEASURE PLAN CAN BE IMPLEMENTED.

SITE NAME:

SITE ID.: 35003
INSPECTOR: KAL
DATE/TIME: 12/9/15 / 1125
WELL ID.: MW-2

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	

WELL COORDINATES? NYTM X_____ NYTM Y_____
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____
GPS Method (circle) Trimble And/Or Magellan

	YES	NO
WELL I.D. VISIBLE?		X
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	X	

WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL: —

	YES	NO
SURFACE SEAL PRESENT?		Y
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	Y	

HEADSPACE READING (ppm) AND INSTRUMENT USED: —
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable): 1' Stickup
PROTECTIVE CASING MATERIAL TYPE: Steel
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches): 4"

	YES	NO
LOCK PRESENT?		X
LOCK FUNCTIONAL?	NA	
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?		X

MEASURE WELL DEPTH FROM MEASURING POINT (Feet): —
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet): —
MEASURE WELL DIAMETER (Inches): 2"
WELL CASING MATERIAL: PVC
PHYSICAL CONDITION OF VISIBLE WELL CASING: Good
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE —
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES: NA

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.
easily accessible by foot or vehicle - had been covered by heavy brush in the past but had been recently cleared.

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.)
AND ASSESS THE TYPE OF RESTORATION REQUIRED.
bottom of landfill in grassy area next to gravel/dirt road.

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT
(e.g. Gas station, salt pile, etc.):
landfilled Site Contaminants; on Site activities → logging - heavy equipment

REMARKS: Photo #1

Sketch

SITE NAME: Beaver Smelting

SITE ID.: 353005
INSPECTOR: KAL
DATE/TIME: 12/4/15
WELL ID.: MW-4

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	

WELL COORDINATES? NYTM X_____ NYTM Y_____
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____
GPS Method (circle) Trimble And/Or Magellan

	YES	NO
WELL I.D. VISIBLE?	X	
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	X	

WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL: MW-4

	YES	NO
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	

HEADSPACE READING (ppm) AND INSTRUMENT USED: —
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable): 2' Stickup
PROTECTIVE CASING MATERIAL TYPE: Steel
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches): —

	YES	NO
LOCK PRESENT?		X
LOCK FUNCTIONAL?	NA	
DID YOU REPLACE THE LOCK?	X	
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?		X

MEASURE WELL DEPTH FROM MEASURING POINT (Feet): —
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet): —
MEASURE WELL DIAMETER (Inches): 2"
WELL CASING MATERIAL: PVC
PHYSICAL CONDITION OF VISIBLE WELL CASING: good
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES: NA

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.
foot or Vehicle

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.
along toe of landfill

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):
Site Contamination

REMARKS:
Photo #8

Sketch

SITE NAME: Beaver Smelting

SITE ID.: 353005
INSPECTOR: KAL
DATE/TIME: 12/4/15
WELL ID.: ~~MW-3~~ MW-3

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	
WELL COORDINATES? NYTM X_____ NYTM Y_____		
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____		
GPS Method (circle) Trimble And/Or Magellan		
WELL I.D. VISIBLE?	X	
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	X	
WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL: MW-3		
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	
HEADSPACE READING (ppm) AND INSTRUMENT USED	—	
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable)	2' Stick up	
PROTECTIVE CASING MATERIAL TYPE:	Steel	
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches): 4"		
LOCK PRESENT?		X
LOCK FUNCTIONAL?	NA	
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?		X
MEASURE WELL DEPTH FROM MEASURING POINT (Feet):	—	
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet):	—	
MEASURE WELL DIAMETER (Inches):	2"	
WELL CASING MATERIAL:	PVC	
PHYSICAL CONDITION OF VISIBLE WELL CASING:	Good	
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE	—	
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES	NO	

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.

Vehicle or foot

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.

Below rip-rap at toe of landfill

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):

Site

REMARKS:

Sketch

SITE NAME: Beaver Smelting

SITE ID.: 353003
INSPECTOR: KAL
DATE/TIME: 12/4/15
WELL ID.: MW-5

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	
WELL COORDINATES? NYTM X_____ NYTM Y_____		
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____		
GPS Method (circle) Trimble And/Or Magellan		
WELL I.D. VISIBLE?	X	
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	Y	
WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL: MW-5		
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	
HEADSPACE READING (ppm) AND INSTRUMENT USED	—	
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable)	3' Stick up	
PROTECTIVE CASING MATERIAL TYPE:	Steel	
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches):		
LOCK PRESENT?		X
LOCK FUNCTIONAL?	NA	
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?	X	
MEASURE WELL DEPTH FROM MEASURING POINT (Feet):	—	
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet):		
MEASURE WELL DIAMETER (Inches):	2"	
WELL CASING MATERIAL:	PVC	
PHYSICAL CONDITION OF VISIBLE WELL CASING:	good	
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE	—	
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES	NA	

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.

foot - easily accessible - not by vehicle

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.

in stand of trees - Southwest side of landfill

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):

Site Contaminants

REMARKS:

Photo #4 - MW-5

Photo #5 → Ponded

Sketch

NW

SITE NAME:

SITE ID.: 353005
INSPECTOR: KAL
DATE/TIME: 12/4/15
WELL ID.: MW-9

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	

WELL COORDINATES? NYTM X_____ NYTM Y_____
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____
GPS Method (circle) Trimble And/Or Magellan

	YES	NO
WELL I.D. VISIBLE?		X
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	X	

WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL:

	YES	NO
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	

HEADSPACE READING (ppm) AND INSTRUMENT USED: —
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable): 3' riser
PROTECTIVE CASING MATERIAL TYPE: steel
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches): 4"

	YES	NO
LOCK PRESENT?		X
LOCK FUNCTIONAL?	NA	
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?		X

MEASURE WELL DEPTH FROM MEASURING POINT (Feet): —
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet): —
MEASURE WELL DIAMETER (Inches): 2"
WELL CASING MATERIAL: PVC
PHYSICAL CONDITION OF VISIBLE WELL CASING: good
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES: NA

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.

poor access — only by foot

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.

within heavily wooded area — off of dirt/grass road

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):

REMARKS:

Sketch

SITE NAME: Beaver Smelting

SITE ID.: 353005
INSPECTOR: KAL
DATE/TIME: 12/14/15
WELL ID.: MW-10

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	

WELL COORDINATES? NYTM X_____ NYTM Y_____
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____
GPS Method (circle) Trimble And/Or Magellan

	YES	NO
WELL I.D. VISIBLE?		X
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	X	

WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL: .....

	YES	NO
SURFACE SEAL PRESENT?		V
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	

HEADSPACE READING (ppm) AND INSTRUMENT USED	—
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable)	2' Stickup
PROTECTIVE CASING MATERIAL TYPE:	Steel
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches): 4"	

	YES	NO
LOCK PRESENT?		X
LOCK FUNCTIONAL?	NA	
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?	X	

MEASURE WELL DEPTH FROM MEASURING POINT (Feet):	—
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet):	—
MEASURE WELL DIAMETER (Inches):	2"
WELL CASING MATERIAL:	PVC
PHYSICAL CONDITION OF VISIBLE WELL CASING:	Good
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE	
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES	NA

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.

by foot

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.

Small wooded area along grassy/dirt road.

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):

Silt

REMARKS:

Sketch

SITE NAME:

SITE ID.: 353005
INSPECTOR: KAL
DATE/TIME: 12/9/15
WELL ID.: MW-11

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	

WELL COORDINATES? NYTM X_____ NYTM Y_____
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____
GPS Method (circle) Trimble And/Or Magellan

	YES	NO
WELL I.D. VISIBLE?		X
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)		X

WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL: —

	YES	NO
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)		X
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	

HEADSPACE READING (ppm) AND INSTRUMENT USED: —
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable): 4' Stickup
PROTECTIVE CASING MATERIAL TYPE: steel
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches): 4"

	YES	NO
LOCK PRESENT?	X	
LOCK FUNCTIONAL?	X	
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?		X

MEASURE WELL DEPTH FROM MEASURING POINT (Feet): —
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet): —
MEASURE WELL DIAMETER (Inches): 2"
WELL CASING MATERIAL: PVC
PHYSICAL CONDITION OF VISIBLE WELL CASING: Good
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE —
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES: NA

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.

Foot Only

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.

heavily wooded area

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):

REMARKS:

Sketch

SITE NAME: Beaver Smelting

SITE ID.: 353005
INSPECTOR: KAL
DATE/TIME: 12/19/15
WELL ID.: MW-12

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	

WELL COORDINATES? NYTM X_____ NYTM Y_____
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____
GPS Method (circle) Trimble And/Or Magellan

	YES	NO
WELL I.D. VISIBLE?		X
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	X	

WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL: .....

	YES	NO
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	

HEADSPACE READING (ppm) AND INSTRUMENT USED.....
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable): 4' Stick up
PROTECTIVE CASING MATERIAL TYPE: Steel
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches): 4"

	YES	NO
LOCK PRESENT?	X	
LOCK FUNCTIONAL?	X	
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE?		X

MEASURE WELL DEPTH FROM MEASURING POINT (Feet): —
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet): —
MEASURE WELL DIAMETER (Inches): 2"
WELL CASING MATERIAL: PVC
PHYSICAL CONDITION OF VISIBLE WELL CASING: Good
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE —
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES: NA

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.
Only by foot

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.
heavily wooded area

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):

REMARKS:
Photo #6 - MW-12

Photo #7 - MUST Seep Still active but not flowing

Sketch

SITE NAME:

SITE ID.: 353005
INSPECTOR: KAL
DATE/TIME: 12-4-15
WELL ID.: MW-13

MONITORING WELL FIELD INSPECTION LOG

	YES	NO
WELL VISIBLE? (If not, provide directions below)	X	
WELL COORDINATES? NYTM X_____ NYTM Y_____		
PDOP Reading from Trimble Pathfinder:_____ Satelites:_____		
GPS Method (circle) Trimble And/Or Magellan		
WELL I.D. VISIBLE?	X	
WELL LOCATION MATCH SITE MAP? (if not, sketch actual location on back)	X	
WELL I.D. AS IT APPEARS ON PROTECTIVE CASING OR WELL: MW-13		
SURFACE SEAL PRESENT?		X
SURFACE SEAL COMPETENT? (If cracked, heaved etc., describe below)	NA	
PROTECTIVE CASING IN GOOD CONDITION? (If damaged, describe below)	X	
HEADSPACE READING (ppm) AND INSTRUMENT USED	—	
TYPE OF PROTECTIVE CASING AND HEIGHT OF STICKUP IN FEET (If applicable)	4' Stick up	
PROTECTIVE CASING MATERIAL TYPE:	Steel	
MEASURE PROTECTIVE CASING INSIDE DIAMETER (Inches):		
LOCK PRESENT?	X	
LOCK FUNCTIONAL?		X
DID YOU REPLACE THE LOCK?		X
IS THERE EVIDENCE THAT THE WELL IS DOUBLE CASED? (If yes,describe below)		X
WELL MEASURING POINT VISIBLE? NO		
MEASURE WELL DEPTH FROM MEASURING POINT (Feet):	KAL	
MEASURE DEPTH TO WATER FROM MEASURING POINT (Feet):	—	
MEASURE WELL DIAMETER (Inches):	2"	
WELL CASING MATERIAL:	PVC	
PHYSICAL CONDITION OF VISIBLE WELL CASING:	Good	
ATTACH ID MARKER (if well ID is confirmed) and IDENTIFY MARKER TYPE	—	
PROXIMITY TO UNDERGROUND OR OVERHEAD UTILITIES	NA	

DESCRIBE ACCESS TO WELL: (Include accessibility to truck mounted rig, natural obstructions, overhead power lines, proximity to permanent structures, etc.); ADD SKETCH OF LOCATION ON BACK, IF NECESSARY.

easily accessible by foot only

DESCRIBE WELL SETTING (For example, located in a field, in a playground, on pavement, in a garden, etc.) AND ASSESS THE TYPE OF RESTORATION REQUIRED.

Wooded area

IDENTIFY ANY NEARBY POTENTIAL SOURCES OF CONTAMINATION, IF PRESENT (e.g. Gas station, salt pile, etc.):

REMARKS:

Photo #3

Sketch

PHOTOGRAPHIC LOG

Client Name:	Site Location:	Project No.
NYSDEC	Beaver Smelting – Fallsburg, NY	60302031

Photo No.	Date:
1	12/4/15

Direction Photo Taken: Facing east

Description:
Monitoring Well MW-2

Photo No.	Date:
2	12/4/15

Direction Photo Taken: Facing east

Description:
Monitoring Well MW-4

PHOTOGRAPHIC LOG

Client Name:	Site Location:	Project No.
NYSDEC	Beaver Smelting – Fallsburg, NY	60302031

Photo No.	Date:
3	12/4/15

Direction Photo Taken: NA

Description:
Monitoring Well MW-13

Photo No.	Date:
4	12/4/15

Direction Photo Taken: NA

Description:
Monitoring Well MW-5

PHOTOGRAPHIC LOG

Client Name:	Site Location:	Project No.
NYSDEC	Beaver Smelting – Fallsburg, NY	60302031

Photo No.	Date:
5	12/4/15

Direction Photo Taken: Facing south

Description: Ponded area south of the landfill, adjacent to Beaver Lane

Photo No.	Date:
6	12/4/15

Direction Photo Taken: Facing northwest

Description: Monitoring Well MW-13

PHOTOGRAPHIC LOG

Client Name:	Site Location:	Project No.
NYSDEC	Beaver Smelting – Fallsburg, NY	60302031

Photo No.	Date:
7	12/4/15

Direction Photo Taken: Facing east

Description: Seep along west slope of the landfill (previously existing)

Photo No.	Date:
8	12/4/15

Direction Photo Taken: Facing southwest

Description: Monitoring Well MW-10

Site-Wide Semi-Annual Inspection Form

Beaver Smelting
Beaver Lane
Fallsburg, New York

Engineering Control (s): Soil Cover, wells, ditches Inspection Date: 5/23/16

Item	Yes	No	N/A	Comments
Does the Engineering Control continue to perform as designed?	X			
Does the Engineering Control continue to protect human health and the environment?	X			
Does the Engineering Control comply with requirements established in the SMP?	X			
Has remedial performance criteria been achieved or maintained?	X			Maintained – Still exceedances in GW
Has sampling and analysis of appropriate media been performed during the monitoring event?		X		GW monitoring wells Sampled 3/2016
Have there been any modifications made to the remedial or monitoring system?		X		
Does the remedial or monitoring system need to be changed or altered at this time?		X		
Has there been any intrusive activity, excavation, or construction occurred at the site?		X		- tire ruts left during previous sampling event were filled in - See photos.
Were the activities mentioned above, performed in accordance with the SMP?			X	
Was there a change in the use of the site or were there new structures constructed on the site?		X		
In case a new occupied structure is constructed or the use of the current building changed, was a vapor intrusion evaluation done?			X	
Were new mitigation systems installed based on monitoring results?			X	
Were the groundwater wells in the monitoring network inspected during this site inspection? If so, were the Monitoring Well Field Inspection Logs Completed?		X		*wells were sampled 3/2016 w/ no issues – determined no changes from 12/4/16 wells logs.

Note: Upon completion of the form any non-conforming items warranting corrective action should be identified here within.

Name of Inspector: Kelly Lurie
Inspector's Company: AECOM

Signature of Inspector: Kelly Lurie
Date: 5/23/16

IMMEDIATELY REPORT ANY FAILURE OR DEFECT TO THE PROJECT MANAGER SO A COUNTERMEASURE PLAN CAN BE IMPLEMENTED.

PHOTOGRAPHIC LOG

Client Name:	Site Location:	Project No.
NYSDEC	Beaver Smelting – Fallsburg, NY	60302031

Photo No.	Date:
1	5/23/16

Direction Photo Taken: Facing west

Description: Toe of west slope of landfill, in the area of the seep. Photo shows area of tire ruts lefts during the sampling the previous month after filling in.

Photo No.	Date:
2	5/23/16

Direction Photo Taken: Facing east

Description: Toe of west slope of landfill, in the area of the seep. Photo shows area of tire ruts lefts during the sampling the previous month after filling in.

PHOTOGRAPHIC LOG

Client Name:	Site Location:	Project No.
NYSDEC	Beaver Smelting – Fallsburg, NY	60302031

Photo No.	Date:
3	5/23/16

Direction Photo Taken: Facing north

Description: Toe of west slope of landfill, in the area of the seep. Photo shows area of tire ruts lefts during the sampling the previous month after filling in.

Photo No.	Date:
4	5/23/16

Direction Photo Taken: Facing east

Description: Toe of west slope of landfill, in the area of the seep. Photo shows area of tire ruts lefts during the sampling the previous month after filling in and seeding.

Site-Wide Semi-Annual Inspection Form

Beaver Smelting
Beaver Lane
Fallsburg, New York
Site Inpsection Checklist

Engineering Control (s): Soil cover, ditches, monitoring wells

Inspection Date: 11/7/2016

Item	Yes	No	N/A	Comments
Does the Engineering Control continue to perform as designed?	x			
Does the Engineering Control continue to protect human health and the environment?	x			
Does the Engineering Control comply with requirements established in the SMP?	x			
Has remedial performance criteria been achieved or maintained?	x			Maintained
Has sampling and analysis of appropriate media been performed during the monitoring event?		x		
Have there been any modifications made to the remedial or monitoring system?		x		
Does the remedial or monitoring system need to be changed or altered at this time?		x		
Has there been any intrusive activity, excavation, or construction occurred at the site?		x		
Were the activities mentioned above, performed in accordance with the SMP?			x	
Was there a change in the use of the site or were there new structures constructed on the site?		x		
In case a new occupied structure is constructed or the use of the current building changed, was a vapor intrusion evaluation done?			x	
Were new mitigation systems installed based on monitoring results?			x	
Were the groundwater wells in the monitoring network inspected during this site inspection? If so, were the Monitoring Well Field Inspection Logs Completed?	x			See attached for monitoring well inspection forms

Note: Upon completion of the form any non-conforming items warranting corrective action should be identified here within.

Name of Inspector: Kelly Lurie

Signature of Inspector: _____

Inspector's Company: AECOM

Date: 11/7/1016

IMMEDIATELY REPORT ANY FAILURE OR DEFECT TO THE PROJECT MANAGER SO A COUNTERMEASURE PLAN CAN BE IMPLEMENTED.

Beaver Smelting
Beaver Lane
Fallsburg, New York
Monitoring Well Field Inspection Log

Inspection Date: 11/7/2016
Completed By: Kelly Lurie
Well ID: MW-2

	Yes	No
Well Visible? If not, provide directions below.	x	
Well ID Visible?		x
Well location match site map? If not, sketch actual location on back.	x	
Well ID as it appears on well casing	NA	
	Yes	**No**
Surface seal present?	NA	
Surface seal competent? If cracked, heaved, etc., describe below.	NA	
Protective casing on good condition? If damaged, describe below.	x	
	Notes	
Headspace reading (ppm) and instrument used	NA	
Type of protective casing and height of stickup in feet (if applicable)	1' stickup	
Protective casing material type	Steel	
Protective casing inside diameter (inches)	4"	
	Yes	**No**
Lock present?		x
Lock functional?	NA	
Was lock replaced during inspection?		x
Is there evidence that the well is double-cased?		x
Is the well measurement point visible?		x
	Notes	
Measure well depth from measuring point (feet)	NA	
Measure depth to water from measuring point (feet)	NA	
Well diameter (inches)	2"	
Welll casing material	PVC	
Physical condition of visible well casing	Good	
Proximity to underground or overhead utilities	NA	
Describe well setting and access to well (include accessability to truck mounted rig, natural obstructions, etc.): easily accessible by foot or vehicle - in grassy area/brush next to access road		
Identify nearby potential sources of contamination, if present (e.g., gas station, salt pile, etc.): site landfill; on site activities including logging, use of heavy machinary		
Other Remarks:		

Beaver Smelting
Beaver Lane
Fallsburg, New York
Monitoring Well Field Inspection Log

Inspection Date: 11/7/2016
Completed By: Kelly Lurie
Well ID: MW-3

	Yes	No
Well Visible? If not, provide directions below.	x	
Well ID Visible?	x	
Well location match site map? If not, sketch actual location on back.	x	
Well ID as it appears on well casing	MW-3	
	Yes	**No**
Surface seal present?	NA	
Surface seal competent? If cracked, heaved, etc., describe below.	NA	
Protective casing on good condition? If damaged, describe below.	x	
	Notes	
Headspace reading (ppm) and instrument used	NA	
Type of protective casing and height of stickup in feet (if applicable)	2' stickup	
Protective casing material type	Steel	
Protective casing inside diameter (inches)	4"	
	Yes	**No**
Lock present?		x
Lock functional?	NA	
Was lock replaced during inspection?		x
Is there evidence that the well is double-cased?		x
Is the well measurement point visible?		x
	Notes	
Measure well depth from measuring point (feet)	NA	
Measure depth to water from measuring point (feet)	NA	
Well diameter (inches)	2"	
Welll casing material	PVC	
Physical condition of visible well casing	Good	
Proximity to underground or overhead utilities	NA	

Describe well setting and access to well (include accessability to truck mounted rig, natural obstructions, etc.):

easily accessible by foot or vehicle - below the rip-rap on west slope of the landfill - however should not drive off of access road into this area.

Identify nearby potential sources of contamination, if present (e.g., gas station, salt pile, etc.):

site landfill

Other Remarks:

Beaver Smelting
Beaver Lane
Fallsburg, New York
Monitoring Well Field Inspection Log

Inspection Date: 11/7/2016
Completed By: Kelly Lurie
Well ID: MW-4

	Yes	No
Well Visible? If not, provide directions below.	x	
Well ID Visible?	x	
Well location match site map? If not, sketch actual location on back.	x	
Well ID as it appears on well casing	MW-4	
	Yes	**No**
Surface seal present?	NA	
Surface seal competent? If cracked, heaved, etc., describe below.	NA	
Protective casing on good condition? If damaged, describe below.	x	
	Notes	
Headspace reading (ppm) and instrument used	NA	
Type of protective casing and height of stickup in feet (if applicable)	2' stickup	
Protective casing material type	Steel	
Protective casing inside diameter (inches)	4"	
	Yes	**No**
Lock present?		x
Lock functional?	NA	
Was lock replaced during inspection?		x
Is there evidence that the well is double-cased?		x
Is the well measurement point visible?		x
	Notes	
Measure well depth from measuring point (feet)	NA	
Measure depth to water from measuring point (feet)	NA	
Well diameter (inches)	2"	
Welll casing material	PVC	
Physical condition of visible well casing	Good	
Proximity to underground or overhead utilities	NA	

Describe well setting and access to well (include accessability to truck mounted rig, natural obstructions, etc.):

easily accessible by foot or vehicle - along toe of landfill - however should not drive off of access road into this area.

Identify nearby potential sources of contamination, if present (e.g., gas station, salt pile, etc.):

site landfill

Other Remarks:

Beaver Smelting
Beaver Lane
Fallsburg, New York
Monitoring Well Field Inspection Log

Inspection Date: 11/7/2016
Completed By: Kelly Lurie
Well ID: MW-5

	Yes	No
Well Visible? If not, provide directions below.	x	
Well ID Visible?	x	
Well location match site map? If not, sketch actual location on back.	x	
Well ID as it appears on well casing	MW-5	
	Yes	**No**
Surface seal present?	NA	
Surface seal competent? If cracked, heaved, etc., describe below.	NA	
Protective casing on good condition? If damaged, describe below.	x	
	Notes	
Headspace reading (ppm) and instrument used	NA	
Type of protective casing and height of stickup in feet (if applicable)	2' stickup	
Protective casing material type	Steel	
Protective casing inside diameter (inches)	4"	
	Yes	**No**
Lock present?		x
Lock functional?	NA	
Was lock replaced during inspection?		x
Is there evidence that the well is double-cased?		x
Is the well measurement point visible?	x	
	Notes	
Measure well depth from measuring point (feet)	NA	
Measure depth to water from measuring point (feet)	NA	
Well diameter (inches)	2"	
Welll casing material	PVC	
Physical condition of visible well casing	Good	
Proximity to underground or overhead utilities	NA	
Describe well setting and access to well (include accessability to truck mounted rig, natural obstructions, etc.): Limited - no truck mounted rig accessibility, surrounded by trees		
Identify nearby potential sources of contamination, if present (e.g., gas station, salt pile, etc.): site landfill		
Other Remarks:		

Beaver Smelting
Beaver Lane
Fallsburg, New York
Monitoring Well Field Inspection Log

Inspection Date: 11/7/2016
Completed By: Kelly Lurie
Well ID: MW-6

	Yes	No
Well Visible? If not, provide directions below.	x	
Well ID Visible?		x
Well location match site map? If not, sketch actual location on back.	x	
Well ID as it appears on well casing	NA	
	Yes	**No**
Surface seal present?	NA	
Surface seal competent? If cracked, heaved, etc., describe below.	NA	
Protective casing on good condition? If damaged, describe below.	x	
	Notes	
Headspace reading (ppm) and instrument used	NA	
Type of protective casing and height of stickup in feet (if applicable)	2' stickup	
Protective casing material type	Steel	
Protective casing inside diameter (inches)	4"	
	Yes	**No**
Lock present?		x
Lock functional?	NA	
Was lock replaced during inspection?		x
Is there evidence that the well is double-cased?		x
Is the well measurement point visible?	x	
	Notes	
Measure well depth from measuring point (feet)	NA	
Measure depth to water from measuring point (feet)	NA	
Well diameter (inches)	2"	
Welll casing material	PVC	
Physical condition of visible well casing	Good	
Proximity to underground or overhead utilities	NA	
Describe well setting and access to well (include accessability to truck mounted rig, natural obstructions, etc.): Very poor; within heavily wooded area		
Identify nearby potential sources of contamination, if present (e.g., gas station, salt pile, etc.):		
Other Remarks:		

Beaver Smelting
Beaver Lane
Fallsburg, New York
Monitoring Well Field Inspection Log

Inspection Date: 11/7/2016
Completed By: Kelly Lurie
Well ID: MW-7

	Yes	No
Well Visible? If not, provide directions below.	x	
Well ID Visible?		x
Well location match site map? If not, sketch actual location on back.	x	
Well ID as it appears on well casing	NA	
	Yes	**No**
Surface seal present?	NA	
Surface seal competent? If cracked, heaved, etc., describe below.	NA	
Protective casing on good condition? If damaged, describe below.	x	
	Notes	
Headspace reading (ppm) and instrument used	NA	
Type of protective casing and height of stickup in feet (if applicable)	2' stickup	
Protective casing material type	Steel	
Protective casing inside diameter (inches)	4"	
	Yes	**No**
Lock present?	x	
Lock functional?		x
Was lock replaced during inspection?		x
Is there evidence that the well is double-cased?		x
Is the well measurement point visible?	x	
	Notes	
Measure well depth from measuring point (feet)	NA	
Measure depth to water from measuring point (feet)	NA	
Well diameter (inches)	2"	
Welll casing material	PVC	
Physical condition of visible well casing	Good	
Proximity to underground or overhead utilities	NA	
Describe well setting and access to well (include accessability to truck mounted rig, natural obstructions, etc.): Very poor; within heavily wooded area		
Identify nearby potential sources of contamination, if present (e.g., gas station, salt pile, etc.):		
Other Remarks:		

Beaver Smelting
Beaver Lane
Fallsburg, New York
Monitoring Well Field Inspection Log

Inspection Date: 11/7/2016
Completed By: Kelly Lurie
Well ID: MW-9

	Yes	No
Well Visible? If not, provide directions below.	x	
Well ID Visible?		x
Well location match site map? If not, sketch actual location on back.	x	
Well ID as it appears on well casing	NA	
	Yes	**No**
Surface seal present?	NA	
Surface seal competent? If cracked, heaved, etc., describe below.	NA	
Protective casing on good condition? If damaged, describe below.	x	
	Notes	
Headspace reading (ppm) and instrument used	NA	
Type of protective casing and height of stickup in feet (if applicable)	3' stickup	
Protective casing material type	Steel	
Protective casing inside diameter (inches)	4"	
	Yes	**No**
Lock present?		x
Lock functional?		x
Was lock replaced during inspection?		x
Is there evidence that the well is double-cased?		x
Is the well measurement point visible?		x
	Notes	
Measure well depth from measuring point (feet)	NA	
Measure depth to water from measuring point (feet)	NA	
Well diameter (inches)	2"	
Welll casing material	PVC	
Physical condition of visible well casing	Good	
Proximity to underground or overhead utilities	NA	
Describe well setting and access to well (include accessability to truck mounted rig, natural obstructions, etc.): Very poor; within heavily wooded area, large rocks, etc.		
Identify nearby potential sources of contamination, if present (e.g., gas station, salt pile, etc.):		
Other Remarks: Upgradient from landfill		

Beaver Smelting
Beaver Lane
Fallsburg, New York
Monitoring Well Field Inspection Log

Inspection Date: 11/7/2016
Completed By: Kelly Lurie
Well ID: MW-10

	Yes	No
Well Visible? If not, provide directions below.	x	
Well ID Visible?		x
Well location match site map? If not, sketch actual location on back.	x	
Well ID as it appears on well casing	NA	
	Yes	**No**
Surface seal present?	NA	
Surface seal competent? If cracked, heaved, etc., describe below.	NA	
Protective casing on good condition? If damaged, describe below.	x	
	Notes	
Headspace reading (ppm) and instrument used	NA	
Type of protective casing and height of stickup in feet (if applicable)	2' stickup	
Protective casing material type	Steel	
Protective casing inside diameter (inches)	4"	
	Yes	**No**
Lock present?		x
Lock functional?		x
Was lock replaced during inspection?		x
Is there evidence that the well is double-cased?		x
Is the well measurement point visible?	x	
	Notes	
Measure well depth from measuring point (feet)	NA	
Measure depth to water from measuring point (feet)	NA	
Well diameter (inches)	2"	
Welll casing material	PVC	
Physical condition of visible well casing	Good	
Proximity to underground or overhead utilities	NA	
Describe well setting and access to well (include accessability to truck mounted rig, natural obstructions, etc.): Poor; within wooded area		
Identify nearby potential sources of contamination, if present (e.g., gas station, salt pile, etc.):		
Other Remarks: Upgradient from landfill		

Beaver Smelting
Beaver Lane
Fallsburg, New York
Monitoring Well Field Inspection Log

Inspection Date: 11/7/2016
Completed By: Kelly Lurie
Well ID: MW-11

	Yes	No
Well Visible? If not, provide directions below.	x	
Well ID Visible?		x
Well location match site map? If not, sketch actual location on back.	x	
Well ID as it appears on well casing	NA	
	Yes	**No**
Surface seal present?	NA	
Surface seal competent? If cracked, heaved, etc., describe below.	NA	
Protective casing on good condition? If damaged, describe below.	x	
	Notes	
Headspace reading (ppm) and instrument used	NA	
Type of protective casing and height of stickup in feet (if applicable)	4' stickup	
Protective casing material type	Steel	
Protective casing inside diameter (inches)	4"	
	Yes	**No**
Lock present?		x
Lock functional?		x
Was lock replaced during inspection?		x
Is there evidence that the well is double-cased?		x
Is the well measurement point visible?	x	
	Notes	
Measure well depth from measuring point (feet)	NA	
Measure depth to water from measuring point (feet)	NA	
Well diameter (inches)	4"	
Welll casing material	PVC	
Physical condition of visible well casing	Good	
Proximity to underground or overhead utilities	NA	
Describe well setting and access to well (include accessability to truck mounted rig, natural obstructions, etc.): Poor; within wooded area		
Identify nearby potential sources of contamination, if present (e.g., gas station, salt pile, etc.):		
Other Remarks: Upgradient from landfill		

Beaver Smelting
Beaver Lane
Fallsburg, New York
Monitoring Well Field Inspection Log

Inspection Date: 11/7/2016
Completed By: Kelly Lurie
Well ID: MW-12

	Yes	No
Well Visible? If not, provide directions below.	x	
Well ID Visible?		x
Well location match site map? If not, sketch actual location on back.	x	
Well ID as it appears on well casing	NA	
	Yes	**No**
Surface seal present?	NA	
Surface seal competent? If cracked, heaved, etc., describe below.	NA	
Protective casing on good condition? If damaged, describe below.	x	
	Notes	
Headspace reading (ppm) and instrument used	NA	
Type of protective casing and height of stickup in feet (if applicable)	4' stickup	
Protective casing material type	Steel	
Protective casing inside diameter (inches)	4"	
	Yes	**No**
Lock present?	x	
Lock functional?	x	
Was lock replaced during inspection?		x
Is there evidence that the well is double-cased?		x
Is the well measurement point visible?		x
	Notes	
Measure well depth from measuring point (feet)	NA	
Measure depth to water from measuring point (feet)	NA	
Well diameter (inches)	2"	
Welll casing material	PVC	
Physical condition of visible well casing	Good	
Proximity to underground or overhead utilities	NA	

Describe well setting and access to well (include accessability to truck mounted rig, natural obstructions, etc.):

Poor; within wooded area, accessible by foot

Identify nearby potential sources of contamination, if present (e.g., gas station, salt pile, etc.):

Other Remarks:

Upgradient from landfill

Beaver Smelting
Beaver Lane
Fallsburg, New York
Monitoring Well Field Inspection Log

Inspection Date: 11/7/2016
Completed By: Kelly Lurie
Well ID: MW-13

	Yes	No
Well Visible? If not, provide directions below.	x	
Well ID Visible?	x	
Well location match site map? If not, sketch actual location on back.	x	
Well ID as it appears on well casing	MW-13	
	Yes	**No**
Surface seal present?	NA	
Surface seal competent? If cracked, heaved, etc., describe below.	NA	
Protective casing on good condition? If damaged, describe below.	x	
	Notes	
Headspace reading (ppm) and instrument used	NA	
Type of protective casing and height of stickup in feet (if applicable)	4' stickup	
Protective casing material type	Steel	
Protective casing inside diameter (inches)	2"	
	Yes	**No**
Lock present?	x	
Lock functional?		x
Was lock replaced during inspection?		x
Is there evidence that the well is double-cased?		x
Is the well measurement point visible?		x
	Notes	
Measure well depth from measuring point (feet)	NA	
Measure depth to water from measuring point (feet)	NA	
Well diameter (inches)	2"	
Welll casing material	PVC	
Physical condition of visible well casing	Good	
Proximity to underground or overhead utilities	NA	
Describe well setting and access to well (include accessability to truck mounted rig, natural obstructions, etc.): Poor; within wooded area, accessible by foot		
Identify nearby potential sources of contamination, if present (e.g., gas station, salt pile, etc.):		
Other Remarks: Upgradient from landfill		

Appendix B

Enclosure 1
Engineering Controls - Standby Consultant/Contractor Certification Form

Site Details **Box 1**

Site No. 353005

Site Name Beaver Smelting

Site Address: Beaver Lane Zip Code: 12788
City/Town: Woodbourne
County: Sullivan
Site Acreage: 2.0

Reporting Period: December 31, 2014 to December 31, 2017

	YES	NO
1. Is the information above correct?	X	
If NO, include handwritten above or on a separate sheet.		
2. To your knowledge has some or all of the site property been sold, subdivided, merged, or undergone a tax map amendment during this Reporting Period?	X	
3. To your knowledge has there been any change of use at the site during this Reporting Period (see 6NYCRR 375-1.11(d))?		X
4. To your knowledge have any federal, state, and/or local permits (e.g., building, discharge) been issued for or at the property during this Reporting Period?		X
If you answered YES to questions 2 thru 4, include documentation or evidence that documentation has been previously submitted with this certification form.		
5. To your knowledge is the site currently undergoing development?		X

- See attached.

Box 2

	YES	NO
6. Is the current site use consistent with the use(s) listed below? Industrial	X	
7. Are all ICs/ECs in place and functioning as designed?	X	

IF THE ANSWER TO EITHER QUESTION 6 OR 7 IS NO, sign and date below and contact the DEC PM regarding the development of a Corrective Measures Work Plan to address these issues.

Signature of Standby Consultant/Contractor Date

SITE NO. 353005 **Box 3**

Description of Institutional Controls

Parcel	Owner	Institutional Control
16.-1-8.1	Woodbourne Mining, Smelting and Refi	Ground Water Use Restriction Soil Management Plan Landuse Restriction Monitoring Plan Site Management Plan O&M Plan IC/EC Plan

Deed restriction includes the following provisions:
Access shall not be prevented;
Land use can be commercial or industrial use only;
Periodic certifications of the ICs and compliance with the SMP and non-impairment of ECs must be provided;
ICs must be maintained.

16.-1-8.2	Woodbourne Mining, Smelting and Refi	Soil Management Plan Site Management Plan Monitoring Plan O&M Plan Ground Water Use Restriction Landuse Restriction IC/EC Plan

Deed restriction includes the following provisions:
Access shall not be prevented;
Land use can be commercial or industrial use only;
Periodic certifications of the ICs and compliance with the SMP and non-impairment of ECs must be provided;
ICs must be maintained.

Box 4

Description of Engineering Controls

Parcel	Engineering Control
16.-1-8.1	Cover System Monitoring Wells

Landfill cap.
Monitoring well network is in place.

16.-1-8.2	Cover System Monitoring Wells

Landfill cap.
Monitoring well network is in place.

Box 5

Periodic Review Report (PRR) Certification Statements

1. I certify by checking "YES" below that:

   a) the Periodic Review report and all attachments were prepared under the direction of, and reviewed by, the party making the certification, including data and material prepared by previous contractors for the current certifying period, if any;

   b) to the best of my knowledge and belief, the work and conclusions described in this certification are in accordance with the requirements of the site remedial program, and generally accepted engineering practices; and the information presented is accurate and compete.

YES	NO
X	☐

2. If this site has an IC/EC Plan (or equivalent as required in the Decision Document), for each Institutional or Engineering control listed in Boxes 3 and/or 4, I certify by checking "YES" below that all of the following statements are true:

   (a) the Institutional Control and/or Engineering Control(s) employed at this site is unchanged since the date that the Control was put in-place, or was last approved by the Department;

   (b) nothing has occurred that would impair the ability of such Control, to protect public health and the environment;

   (c) nothing has occurred that would constitute a failure to comply with the Site Management Plan, or equivalent if no Site Management Plan exists.

YES	NO
X	☐

IF THE ANSWER TO QUESTION 2 IS NO, sign and date below and contact the DEC PM regarding the development of a Corrective Measures Work Plan to address these issues.

Signature of Standby Consultant/Contractor

Date

Box 6

IC/EC CERTIFICATIONS

Qualified Environmental Professional Signature

I certify that all information in Boxes 2 through 5 are true. I understand that a false statement made herein is punishable as a Class "A" misdemeanor, pursuant to Section 210.45 of the Penal Law.

I Michael L. Spera at AECOM
print name

40 British American Blvd.
Latham, NY 12110
(print business address)

am certifying as a Qualified Environmental Professional.

Michael L Spera
Signature of Qualified Environmental Professional

STATE OF NEW YORK
MICHAEL L. SPERA
Stamp Required for PE
073731
LICENSED PROFESSIONAL ENGINEER

1/29/18
Date

Documentation Provided for Box 1

In 2016, the site owner notified Kelly Lurie (AECOM) that he would be dividing the original tax parcel into two parcels and placing the deed restriction required by the Consent Order on the landfill portion of the site. The deed restriction was filed by the site owner in May 2016. The following emails from March 2017 document the communications between AECOM and NYSDEC regarding the newly filed deed restriction.

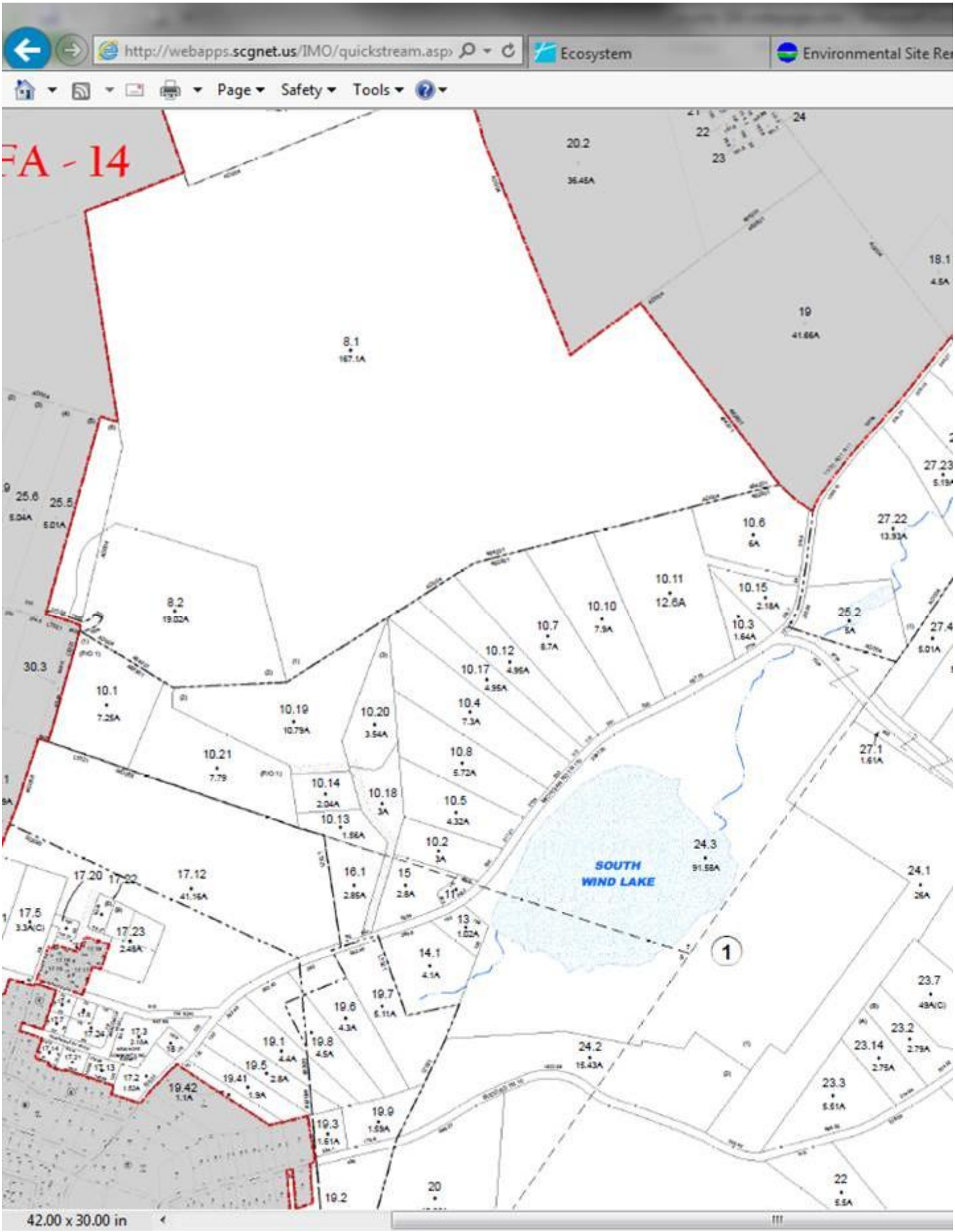
At this time, it is planned to update the Site Management Plan with the deed restriction by spring 2018.

Lurie, Kelly

From:	Lurie, Kelly
Sent:	Friday, March 31, 2017 12:15 PM
To:	Edwards, Susan L (DEC) (susan.edwards@dec.ny.gov)
Subject:	RE: Deed Restriction for Beaver Smelting
Attachments:	Deed Restriction Area Map.pdf

Based on the description in the DR and the recent tax map below, I believe so. It's a little hard to see on this screenshot, but 8.1 and 8.2 are the property, in the upper left-hand corner. I believe that 8.2 is the area of the landfill itself. The attached PDF is a reconstruction of the DR area from the Consent Order.

I can call the county clerk and/or check online next week to see what they do have (e.g., Map Number 14-351).


http://webapps.scgnet.us/IMO/quickstream.asp
Ecosystem
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Page
Safety
Tools
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SOUTH
WIND LAKE
42.00 x 30.00 in

From: Edwards, Susan L (DEC) [mailto:susan.edwards@dec.ny.gov]
Sent: Friday, March 31, 2017 9:30 AM
To: Lurie, Kelly
Subject: RE: Deed Restriction for Beaver Smelting

Ok. Do the two parcels named in the DR cover the entire site?

From: Lurie, Kelly [mailto:Kelly.Lurie@aecom.com]
Sent: Friday, March 31, 2017 9:16 AM
To: Edwards, Susan L (DEC) <susan.edwards@dec.ny.gov>
Subject: RE: Deed Restriction for Beaver Smelting

Sue,

There wasn't with what Art sent to me, but I was planning on contacting the county clerk with the info I have to see what is available. We could swing by there to make copies as needed during the next site inspection.

Thanks,
Kelly

From: Edwards, Susan L (DEC) [mailto:susan.edwards@dec.ny.gov]
Sent: Friday, March 31, 2017 9:13 AM
To: Lurie, Kelly
Subject: RE: Deed Restriction for Beaver Smelting

Kelly, Was there a metes and bounds and a figure with the deed restriction?

-Sue

From: Lurie, Kelly [mailto:Kelly.Lurie@aecom.com]
Sent: Thursday, March 30, 2017 4:27 PM
To: Hoffman, Carl (DEC) <carl.hoffman@dec.ny.gov>; Edwards, Susan L (DEC) <susan.edwards@dec.ny.gov>
Subject: Deed Restriction for Beaver Smelting

Hi Carl and Sue,

Attached please find the receipt and the deed restriction for Beaver Smelting. Art, the site owner provided this to me, and Tami and I confirmed on the tax maps that it is for the correct parcel.

I'll get this into the upcoming SMP update.

Please let me know if you need anything else for this.

Thanks,
Kelly

Enclosure 1
Institutional and Engineering Controls - Property Owner Survey

Site Details **Box 1**

Site No. **353005**

Site Name Beaver Smelting

Site Address: Beaver Lane Zip Code: 12788
City/Town: Woodbourne
County: Sullivan
Site Acreage: 2.0

Reporting Period: December 31, 2014 to December 31, 2017

	YES	NO
1. Is the information above correct?	X	☐
If NO, include handwritten above or on a separate sheet.		
2. Has some or all of the site property been sold, subdivided, merged, or undergone a tax map amendment during this Reporting Period?	X	☐
3. Has there been any change of use at the site during this Reporting Period (see 6NYCRR 375-1.11(d))?	☐	X
4. Have any federal, state, and/or local permits (e.g., building, discharge) been issued for or at the property during this Reporting Period?	☐	X
If you answered YES to questions 2, 3 or 4, include documentation with this form.		
5. Is the site currently undergoing development?	☐	X

Box 2

	YES	NO
6. Is the current site use consistent with the use(s) listed below? Industrial	X	☐
7. Are all Institutional Controls (ICs) in place and functioning as designed?	X	☐

Arthur Rosenshein
Signature of Property Owner

27 NOV 2017
Date

SITE NO. 353005 **Box 3**

Description of Institutional Controls

Parcel	Owner	Institutional Control
16.-1-8.2	Woodbourne Mining, Smelting and Refi	Ground Water Use Restriction Landuse Restriction IC/EC Plan Soil Management Plan Site Management Plan Monitoring Plan O&M Plan

Deed restriction includes the following provisions:
Access shall not be prevented;
Land use can be commercial or industrial use only;
Periodic certifications of the ICs and compliance with the SMP and non-impairment of ECs must be provided;
ICs must be maintained.

Box 4

Description of Engineering Controls

Parcel	Engineering Control
16.-1-8.2	Monitoring Wells Cover System

Landfill cap.
Monitoring well network is in place.

SITE NO. 353005 **Box 3**

Description of Institutional Controls

Parcel	Owner	Institutional Control
16.-1-8.1	Woodbourne Mining, Smelting and Refi	Ground Water Use Restriction Soil Management Plan Landuse Restriction Monitoring Plan Site Management Plan O&M Plan IC/EC Plan

Deed restriction includes the following provisions:
Access shall not be prevented;
Land use can be commercial or industrial use only;
Periodic certifications of the ICs and compliance with the SMP and non-impairment of ECs must be provided;
ICs must be maintained.

Box 4

Description of Engineering Controls

Parcel	Engineering Control
16.-1-8.1	Cover System Monitoring Wells

Landfill cap.
Monitoring well network is in place.

Box 5

Periodic Review Report (PRR) Survey Statements

For each Institutional or Engineering control listed in Boxes 3 and/or 4, by checking "YES" below I believe all of the following statements to be true:

(a) the Institutional Control(s) and/or Engineering Control(s) employed at this site remain unchanged since the date that the Control was put in-place, or was last approved by the Department;

(b) nothing has occurred that would impair the ability of such Control, to protect public health and the environment;

(c) access to the site will continue to be provided to the Department, to evaluate the remedy, including access to evaluate the continued maintenance of this Control; and

(d) if a Site Management Plan (SMP) exists, nothing has occurred that would constitute a violation or failure to comply with the SMP for this Control.

YES	NO
X	☐

Arthur Rosenshein
Signature of Property Owner

27 NOV 2017
Date

Arthur N. Rosenshein
6438 RR 42
PO Box 89
Woodbourne, NY 12788-0089

ALBANY NY 122

27 NOV 2017 PM 4 L

Carl Hoffman
Project Manager
NYS Dept Environmental Cons
Division of Remediation Bureau
625 Broadway
Albany, NY

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