

IRM No. 2 CONSTRUCTION COMPLETION REPORT

SOURCE AREA REMOVAL

Staubs Textile Services, Inc.
935-951 East Main Street
Rochester, Monroe County, New York
Site Number 828160
Contract Work Authorization Number: D006132-24

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List of Acronyms & Abbreviations

bgs	below ground surface
CCR	Construction Completion Report
CIS-1,2 DCE	dichloroethylene
Chemtech	Chemtech Consulting Group
COI	Compounds of Interest
Cycle Chem	Cycle Chem Inc.
CVOCs	Chlorinated Volatile Organic Compounds
DUSR	data usability summary report
ESA	Environmental Site Assessment
Frontier	Frontier Telephone of Rochester, Inc.
Gast	Gast Manufacturing
GAC	Granulated Vapor Extraction
IRM	Interim Remedial Measure
NYSDEC	New York State Department of Environmental Conservation
OP-TECH	OP-TECH Environmental Services, Inc.
PCE	perchloroethylene
PID	photoionization detector
PM	Project Manager
PPE	Personal Protective Equipment
ppm	parts per million
RG&E	Rochester Gas & Electric
RI	Remedial Investigation
ROI	Radius of Influence
SCOs	Soil Cleanup Objectives
SVE	Soil Vapor Extraction
SVOCs	Semivolatile Organic Compounds
Shaw	Shaw Environmental & Infrastructure Engineering of New York, P.C.
Staubs	Staubs Textile Services, Inc.
TCE	trichloroethene
USEPA	U.S. Environmental Protection Agency
UST	underground storage tank
VCV	vapor control valve
VOC	volatile organic compound
VOW	vapor observation well

1.0 Introduction

Shaw Environmental & Infrastructure Engineering of New York, P.C. (Shaw) has prepared this Interim Remedial Measure (IRM) No. 2 Construction Completion Report (CCR) summarizing the source area removal activities completed at the Staubs Textile Services, Inc. (Staubs) Site (Site No. 828160) located at 935-951 East Main Street, Rochester, Monroe County, New York (Site) (**Figure 1**). A Remedial Investigation (RI), provided under separate cover, was designed to investigate the extent of contamination that resulted from historical on-site operations. The purpose of Interim Remedial Measure (IRM) IRM No. 1 CCR, provided under separate cover, discussed the removal and closure of existing Underground Storage Tanks (USTs) at the Site. The purpose of IRM No. 2 was to remediate the source area (i.e. where USTs were located inside the building)

1.1 Facility Description and Location

Site Description

The Site is located in a largely commercial neighborhood, bordered by residential houses to the south. The Site is comprised of two contiguous parcels totaling approximately 1.2 acres on the south side of East Main Street and west side of Circle Street in the City of Rochester, New York. There is an approximate 58,451-square-foot 2.5-story masonry building with a partial basement on the Site. The Site is currently owned by 951 East Main Street, LLC; it was historically operated as a uniform leasing business, a laundry, and a dry cleaning facility referred to as Staubs. The original portion of the building was constructed circa 1910 and “William Staub of Staub & Son” purchased the building in 1922. In September 1927, Staub & Son completed a permit to add the cleaning plant. In 1995, a permit was submitted to build a third floor of the dry cleaning plant. Since then, other additions/renovations have been made to the building. The Site is serviced by the City of Rochester public water and sewer system. A commercial building is located to the east of the Site. East Main Street borders the site to the north. Commercial and residential properties border the Site to the west.

Historic Operations

According to a Phase I Environmental Site Assessment (ESA) Report written by Passero Associates (March 18, 2009), the Site was historically utilized as a dry cleaning operation. The Site owner indicated that the Site was a uniform supplier and laundry at the time of the Phase 1. A Dry Cleaning Compliance Inspection was performed on April 25, 2002. Two dry cleaning machines that used perchloroethylene (PCE) as the dry cleaning solvent were identified. The compliance report also stated that the PCE usage log indicated the use of 160 gallons of PCE in the previous 12 months (April 2001-2002). The Phase I ESA also noted that the New York State Department of Environmental Conservation (NYSDEC) October 2005 “Hazardous Waste

Compliance Inspection” confirmed that the facility was closed and no longer regulated at that time. According to the Phase I ESA Report, Passero Associates inspected the Site on March 4 and again on March 11, 2009. At the time of the inspections, the Site building was vacant. Two dry cleaning machines labeled PCE were present and located in the southern portion of the building.

A review of historic Sanborn® Fire Insurance Maps (Sanborn®) indicated that the Site was occupied by Faber in the early 1900s; Faber was noted as a manufacturer and repairer of sulkies (i.e., carriages). The Sanborn® maps dated 1938, 1950, and 1971 indicate that the subject building was referred to as Staub & Son, Inc. “laundry and dry cleaning;” six solvent tanks, a chemical storage area, a clarifier tank, and a gas tank were present on Site throughout this period. Two of the solvent tanks were located inside the subject building (south side). The remaining solvent tanks, clarifier tank, and the gas tank were located along the southern portion of the building; this area was subsequently covered by an addition to the building.

Shaw’s review of the Sanborn® maps identified the presence of nine possible tanks (with unknown contents) at the Site. In October 2012, Shaw located seven of the nine possible tanks. Six of the seven located tanks were removed and one was closed-in-place. This work was completed and summarized in the Final IRM No. 1 Construction Completion Report dated April 2013 (provided under separate cover).

1.2 IRM No. 1 – Tank Removal

A focused IRM was completed to identify whether the USTs existed, determine the nature, type, orientation, and contents of the tanks, and to remove/close the USTs. The initial plan was to close-in-place the USTs; however, after consultation with the NYSDEC Project Manager, it was decided that it would be more beneficial to remove the USTs. A summary of the work is discussed below; additional detail is presented in Shaw’s *IRM No. 1 Construction Completion Report*, April 2013 (under separate cover).

1.2.1 Indoor UST Removals/Closures

Area 1 – Tank Farm Area

Five USTs were uncovered and removed from Area 1 along with several feet of product piping. A sixth UST suspected to be present in the area was never located. The vertical tank bottoms were estimated to occur at 13 feet below ground surface (bgs). All tanks were constructed of steel and exhibited some deterioration.

UST	Alignment	Approximate Size	Tank Contents
UST-1	Horizontal	8 feet, 6 inches x 4 feet, 6 inches	Dry
UST-2	Vertical	5 feet, 4 inches x 3 feet, 4 inches	Slightly wet on bottom

UST-3	Vertical	5 feet x 6 feet	Liquid present
UST-4	Vertical	5 feet, 4 inches x 3 feet, 4 inches	Liquid present with some solids/sludge present; solvent odor
UST-5	Vertical	7 feet, 6 inches x 7 feet, 6 inches	Liquid present

The tank pits were backfilled with the native excavated soils as directed by the NYSDEC upon removal of the tanks. The remaining void space within the excavation was filled with clean fill imported to the Site and topped with plastic sheeting. OP-TECH, Shaw's Subcontractor, installed approximately six inches of crusher run gravel, leveling the excavated area with the concrete floor in the building.

Tanks UST-3, UST-4, and UST-5 all contained liquid; the liquid was sampled and analyzed by Chemtech for waste disposal characterization purposes. The remaining liquid was emptied from the tanks using a submersible pump and stored in 250-gallon totes for disposal as hazardous waste at Cycle Chem.

Area 2

This area was saw-cut using a concrete core/cut 33-749 machine and excavated similar to the process utilized in Area 1. One underground chemical storage tank was believed to be present in this area according to the historical drawings of the site and the results of the GPR survey. However, only a black cast iron pipe (believed to be a sewer or rain water pipe) was discovered at approximately 1.5 feet bgs. The excavation area was expanded in an attempt to locate this UST. No USTs were discovered and the excavated native soils were used to backfill the excavation; the surface layer was leveled and covered by a layer of crusher run gravel to grade.

Area 3 – 4,200-Gallon Tank

Area 3 consisted of one vertically oriented 4,200-gallon UST. The top of the tank was approximately 4 feet bgs and the bottom of the tank was encountered between 14 and 15 feet bgs. The UST was roughly 12 feet (height) by 8 feet (diameter); the fill port was 2 inches wide and located approximately 3 feet bgs with a "T" to the cap serving as a possible fill port. Approximately 1.5 feet of liquid was observed in the tank. The tank was located in a vault (concrete box) and had limited access for the excavation equipment.

The surface concrete was saw-cut and removed using the same process as the other areas. After partially excavating the soils above the tank, the tank was opened and the interior contents were analyzed with a ppbRae Photo Ionization Detector (PID); the PID reading exceeded 2,000 parts per million (ppm). After consultation with the NYSDEC Project Manager (PM), it was decided to close the tank in place so as not to undermine the building footings. The interstitial liquid was removed, the tank interior was rinsed, and grout was emplaced within the tank to render it

inoperable. Excavated soils were backfilled, covered with plastic sheeting, and topped with a level layer of crusher run gravel. All liquid removed from the tank, including any cleaning solution, was stored in 250-gallon totes and sent for disposal as hazardous waste at Cycle Chem, Inc. (Cycle Chem) in Lewisberry, PA.

Area 4 – Solvent Tank

Area 4 included one vertical UST located approximately 18 inches bgs and situated in the room west/northwest of Area 1. The size of the tank was estimated at 11,000 gallons. This was also the area where the highest contaminated soil concentrations were identified during the RI. The tank was located approximately 15 feet from the original GPR markout after following what was believed to be a fill line. After partially excavating the area around the top of the tank, the tank was opened and the vapor contents were analyzed with a ppbRae PID; the PID reading exceeded 2,000 ppm. The tank was excavated and removed. The tank was steel and had some deterioration. The tank pit was backfilled with the excavated soils and clean fill imported to the site and topped with plastic sheeting. OP-TECH proceeded to install approximately six inches of crusher run gravel, leveling the excavated area with the concrete floor.

All liquid removed from the tank, including any cleaning solution, was stored in 250-gallon totes and sent for disposal as hazardous waste at Cycle Chem.

1.2.2 Exterior UST Removal

Pre-Excavation Work

The original scope stated that the fencing and bollards in the immediate area of the excavation of this 2000 gallon UST would be removed prior to site operations commencing. OP-TECH would then use a crane to extract the UST in one piece. Once removed, the UST would be disassembled off Site per the City of Rochester regulations. During a site visit, it was determined that the original plan could not be executed because of the limited space available. It was determined that the UST, with the Fire Marshall's permission, would be "cut in-place" and removed in sections.

On December 14, 2012, Rochester Gas & Electric (RG&E) "cut dead" the gas service to 935-957 East Main Street. As part of this work, RG&E cut the line at the service line valve approximately 2 feet south of the north wall and 16 feet west of the west wall at the 1 Circle Street property. Frontier Telephone of Rochester, Inc. (Frontier) mobilized to the Site on January 24, 2013 to temporarily remove the overhead fiber-optic line. The line would be reinstalled after excavation activities were completed.

20,000-Gallon UST Removal

OP-TECH mobilized to the Site on February 11, 2013 to commence the excavation of the fuel oil UST. The 20,000-gallon UST was located along the southwest corner of the building exterior,

next to the adjacent property's parking lot. The westernmost fencing gate was removed; the remainder of the fencing remained intact. The 6-inch gas line leading to the building was excavated and the fiber-optic line removed. The top of the tank was excavated using a backhoe and hand tools until the hatch could be located and opened. The liquid within the tank was removed with a vacuum truck as the area surrounding the tank was excavated. A total of 20,000 gallons of liquid were removed—more than the 1,000 gallons that was anticipated within the tank.

A Fire Marshall from the City of Rochester was brought on Site to ensure that safe work practices were conducted. The Fire Marshall agreed that it would be acceptable to cut the tank in place provided the contents were emptied and the inside of the tank was cleaned and rendered inert prior to starting work. This procedure rendered the operation of a crane unnecessary. Per the Fire Marshall's instructions, the tank was filled with carbon dioxide to inert the atmosphere prior to opening, and tested for lower explosive limit and oxygen using a multi gas meter. Although 20,000 gallons of liquid were pumped from the tank prior to extraction, holes were noted in the tank. Staining of the soil and elevated PID readings were noted at the bottom of the excavation. However, no water infiltrated the excavation during the work. The tank was saw-cut into manageable sections and removed; the void space was backfilled as the sections were removed to prevent collapse of the excavation.

On February 16 and 19, 2013, samples were collected from soil deposits around the UST and sent to Chemtech for analysis of volatile organic compounds (VOCs) via USEPA Method 8260 and semivolatile organic compounds (SVOCs) via USEPA Method 8270. Samples were taken from the four side walls and one from the bottom of the excavation.

Once all pieces were removed and post-excavation samples collected, the excavation was completely backfilled using the excavated soils and approximately 155 tons of select fill and topped with a level layer of crusher run gravel.

Post-Excavation Work

Excavation activities were completed by February 21, 2013. Once the tank was excavated and backfilled to grade, OP-TECH remained on Site to finish repair of grounds disturbed during the excavation activities. Sonotubes[®] were emplaced during the backfilling of the tank pit in order to replace the fencing. The existing standpipe that attached the previously removed fiber-optic cable to the building was a vent pipe, most likely originating from the removed UST, and no longer met standards for reinstallation. The installation of a two-inch standpipe was required to meet these standards. Frontier reinstalled the fiber-optic line and standpipe once the excavation was complete. OP-TECH returned to the Site on April 17, 2013 to add more backfill and remove and reset the sagging westernmost fence post. On April 22, 2013, OP-TECH repaved the area leading from the gate to the adjacent property's parking lot.

2.0 Scope of Work

After IRM No. 1 was completed, it was decided that confirmatory soil sampling should be conducted to determine if all soil impacts had been removed. Furthermore, if soil impacts were still present, it was decided that another focused IRM (IRM No. 2) would be necessary to remediate the source area (i.e. where USTs were located inside the building). The purpose of IRM No. 2 was to determine the concentrations of residual impacts and remediate the source area if possible. A summary of the work conducted during this second IRM is discussed below.

2.1 Confirmatory Sampling

On July 29, 2013 Shaw and PW mobilized to the Site to collect confirmatory soil samples from seven locations. Soil borings (designated SB-49, through SB-55) were advanced indoor at the Site. Prior to drilling, the concrete floor was cored until soil was reached at a depth of approximately 6-inches bgs. The soil borings were advanced through the unconsolidated deposits to a maximum depth of 19.9-feet bgs and logged by a Shaw geologist according to USCS and field screened for VOCs using a MiniRae PID.

Soil samples were collected continuously from the ground surface to refusal using a GeoProbe® 6712DT rig outfitted with 4-foot Macro-Core samplers and acetate liners to provide vertical characterization of contaminant impacts as well as stratigraphic information for the Site. A total of 35 soil sample intervals exhibited PID readings higher than 50 ppm. These samples (plus two MS and two MSD samples) were collected and sent to Chemtech for analysis of VOCs via USEPA Method 8260.

PCE detections for the confirmation sampling ranged from 167.2 ppm in SB-54 (0-4') to 12,669.3 ppm in the duplicate sample of SB-50 (12-16'). Results are shown on **Table 1**. Multiple detections of PCE above the restricted commercial soil clean up objective (SCO) indicated that residual impacts remained and remediation would be necessary.

2.2 Pilot Test

The NYSDEC Project Manager, Shaw Project Manager and Shaw Project Engineer had multiple discussions about the remediation strategy for the Site. It was determined that a pilot test be conducted to evaluate the most cost effective remedial approach, source removal technique and future operational costs. After a review of different remedial options including no further action, institutional controls, electrical resistance heating, thermal conductance heating soil vapor extraction (SVE) and excavation, SVE was chosen for the pilot test.

SVE is a demonstrated, relatively low-cost technology used to remediate VOCs in soils. SVE uses an induced vacuum to remove contamination in soil via air or steam. The extracted soil

vapor is then separated into liquid and vapor streams; each media is then treated (usually through granulated activated carbon [GAC] and or thermal/catalytic oxidizer), if necessary, prior to discharge. The pilot study would ensure that a vacuum could be obtained in the soil and that this technology would be a viable remedial option for the Site. The first pilot study ran from August 2013 through April 2014. A second pilot study commenced using the same SVE skid system but using a catalytic oxidizer in lieu of GAC ran from October 2014 through August 2015.

3.0 *Soil Vapor Extraction (SVE) System*

3.1 *SVE System*

Based upon the results from the confirmatory sampling, the NYSDEC requested that a remediation system be installed to address the residual soil impacts observed at the Site. The remediation system consisted of a SVE Skid system (4 HP blower, manifold and knockout drum), seven SVE wells (designated SVE-1 through SVE-7) and two vapor observation wells (VOWs, designated VOW-1 and VOW-2). The skid system was installed on August 20, 2013 and the piping was completed on August 21, 2013. The blower was manufactured by GAST. The skid system consisted of the following components:

- Moisture Separator Tank (Knockout tank)
- Air filter
- Fresh air mix/bleed valve
- Positive displacement blower with 4 HP explosion-proof motor and belt drive.

The SVE components of the remedial system were operational upon arrival during all of the O&M visits. PID readings and velocity readings recorded from the individual extraction wells during the site visits.

3.2 *SVE System Wells and Piping*

During the same mobilization as the confirmatory sampling, Shaw and PW installed the seven SVE wells and two VOWs aboveground inside the building. SVE-1, SVE-2 and SVE-5 were placed in the former tank farm area. SVE-4, SVE-6 and SVE-7 were placed in the former solvent tank room. SVE-3 was placed in the hallway behind the solvent tank room in the same vicinity as the closed-in-place Stoddard solvent tank (Tank #6). The two VOWs were also installed in the former tank farm area. The SVE wells and VOWs were installed using 4.25-inch inner diameter hollow stem augers (HSAs) and generally constructed using 13 to 15-feet of 2-inch schedule 40 polyvinyl chloride (PVC) 0.010-inch screen and 4-feet of schedule 40 PVC casing. Exact SVE and VOW construction specifications can be found in the borings logs (**Appendix A**).

The Shaw technician began installing the piping for the SVE system on August 8, 2013. Piping from the SVE wells to the manifold were 2-inch schedule 40 PVC. A sampling port and ball valve were installed on each leg near the SVE well/VOW. The ball valve allowed for greater flexibility in how the system operated by being able to control which wells were venting at any time. The individual legs were then manifolded into a single 4-inch PVC pipe that joined to the

SVE system skid. There was also a 4-inch PVC pipe venting to the atmosphere (through skylight in solvent tank room) from the skid system through the GAC units

On August 22nd Shaw met the licensed electrician onsite to read the Rochester Gas & Electric (RG&E) meter and hookup electrical to the system. The system, as described below, became fully operation on this day.

3.3 *Radius of Influence (ROI) Test*

On January 21, 2014, Shaw conducted two ROI tests the Site. The Test 1 began by measuring the distance from SVE-2 (designated the soil vapor extraction well in this test) to VOW-1, VOW-2, SVE-1, SVE-5 and SVE-7 (designated the vapor observation wells). The valve on SVE-2 was fully opened while the valves on the other wells and system bleed valve remained closed. The system was then left to equilibrate for 30 minutes before beginning the test.

The field technician read the vacuum measurements and collected PID readings at each of the wells specified above. These were then on the field sheet (**Appendix E**) under time “0”. Readings were recorded every 20 minutes. After an hour of readings the bleed valve was set to 50% open. Readings were then recorded from each of the wells every 20 minutes for another hour.

Test 2 followed the same steps as Test 1 but used SVE-5 as the vapor extraction well and VOW-1, VOW-2, SVE-2, SVE-3 and SVE-6 as vapor observation wells. All readings were recorded on the field sheet (**Appendix J**).

3.4 *System Controls*

The extraction system was equipped with interlocking protective controls, which shut down the extraction system in the event of fault conditions. A primary dilution air inlet valve was also provided to control the flow rate and vacuum applied to the manifold. Valving was adjusted for one of two reasons:

- The dilution valve had to be opened to allow for a sufficient amount of dilution to relieve vacuum and prevent overheating of the blower.
- The throttle valves were adjusted to regulate flow and vacuum applied to individual SVE wells.

3.5 *Moisture Separator (Knockout Drum)*

The moisture separator removes and collects any water or large debris entrained in the air stream. A high level switch is installed in the separator which shuts down the blower in the event that the

separator becomes filled with water. The separator has a brass drain valve is located near its bottom to remove any accumulated liquid.

3.6 *Filters*

The air filter and fresh air bleed filter housings are both manufactured by Solberg. The fresh mix filter is a 30 percent. The air filter measures 8 ¾” in height and the inside bore is 3 ½ inches. The overall outside length of the element is 6-inches. The air filter serves to removal particulate matter that does not fall out of the airstream in the moisture separator.

3.7 *Vacuum Blower*

The blower is a Gast Manufacturing Regenair® Regenerative explosion-proof blower, Model R-6340R-50. The blower and motor assembly is mounted on a steel frame. The motor is a 4 HP, 180 cfm explosion-proof motor that operations on 3-phase, 208/120V AC power. The regenerative blower allows air to “slip past each impellar blade during rotation and return to the base of a succeeding blade for reacceleration”. The blower exhaust passes through an internally baffled silencer to provide noise reduction on the blower exit air stream. Specifications for the blower are found in **Appendix B**. No maintenance was necessary for the blower.

3.8 *Vapor Treatment*

3.8.1 *Granulated Activated Carbon*

The original pilot test design had the chlorinated volatile organic carbons (CVOCs) within the extraction system off gas air stream area treated via a single 55-gallon GAC adsorption unit. The GAC unit piping was equipped with both pre-GAC and post-GAC sampling ports. Treated air discharged from the GAC units to the atmosphere through an exhaust stack in the solvent tank room.

After the first set of analytical results were received (**Appendix C**), it was determined that the GAC was spent and that two GAC drums in series would be more effective. On September 26, 2013 the Shaw Technician made modifications to the system to accept the GAC in series. A sample port was added between the two GAC units to allow the technician to collect a mid-GAC sample during future O&M visits.

3.8.2 *Catalytic Oxidizer*

On October 30, 2014, Shaw personnel replaced the GAC units with a Falmouth Products Falco 300 catalytic oxidizer (Falco 300). The Falco 300 works by converting hydrocarbon contaminates in the air stream to carbon dioxide and water vapor via combustion (300°C-620°C). A bed of platinum and palladium on 1/8” ceramic beads serves as a catalyst allowing VOCs to oxidize at lower temperatures with 99.5% conversion efficiency.

The FALCO Liquid Separator removes liquids and mist from air streams in soil vapor extraction applications. Air from the SVE wells is pulled through the liquid separator prior to the blower and treatment system to prevent liquid carryover to the blower and treatment system.

The Falco 300 has three programmable controllers to regulate the temperature of vapor entering the catalyst. The controllers are programmed to shut down the system if selected temperature limits are exceeded, and also cooperate in the regulation of a Vapor Control Valve (VCV) that controls the input vapor concentrations to the FALCO 300. Auxiliary relays in the T1, T2, and T3 controllers shut down the system if the thermocouple temperatures move above or below the set points by selected amounts. If the VCV does not respond rapidly enough to an increase in vapor line concentration, T2 and T3 will increase to their alarm settings and turn off the system.

The FALCO 300 is supplied with a 5 foot section of 6" Type B gas vent pipe (Hart and Cooley 6RP5) and rain cap (Hart and Cooley 6RHW) for installation on the exhaust stack.

4.0 SVE System Operation, Monitoring & Maintenance

Shaw, on behalf of the NYSDEC, performed weekly O&M visits during the first pilot test beginning the week of September 3rd and ending on April 29, 2014. The weekly visits resumed during the SVE pilot test beginning the week of November 7, 2014 ending on August 20, 2015. A summary of site visits for SVE pilot tests 1 and 2 can be viewed on **Table 2A** and **Table 2B** respectively. The visits were completed to evaluate the remedial systems performance and included site inspections, weekly system operational measurements and routine maintenance of the remedial equipment. The weekly pilot study site visits included recording volatile organic compound (VOC) vapor concentrations using a photoionization detector (PID) and air velocity readings from individual wells during both runs. A summary of these measurements are shown on **Table 3A** and **Table 3B**.

Vapor samples were collected over the duration of pilot tests 1 and 2 to gauge the removal efficiency of the SVE system. The samples were collected from the SVE using a Tedlar® bag and analyzed for VOCs via USEPA Method TO-15 modified at ALS in Rochester, New York. During the first pilot test air samples were collected before and after the carbon filter during the weekly visits. Influent samples were taken from one or more of the SVE wells. Effluent samples were collected from the discharge port of the SVE system. After September 26, 2013, a mid-GAC sample was also collected. The analytical results are presented in **Table 4A**.

During the second pilot test air samples were collected during the weekly visits. Influent samples were taken from each of the seven SVE wells, as well as a combined influent sample prior to treatment from the Catalytic Oxidizer. An effluent sample was collected from the discharge port after the vapor had been treated. The analytical results are presented in **Table 4B**. Routine maintenance of the equipment included checking, cleaning and replacing, when necessary, both the air and the intake filters as well as the GAC. This was completed to ensure that the system maintains peak operational performance.

The activities listed below provided for monitoring organic vapor levels and adjusting extraction points to maximize the rate of extraction of CVOC extraction. System performance checks included air flow rates, temperature, organic vapor concentrations and vacuum pressure. During O&M events, an inspection checklist (**Appendix C**) was completed to provide proper documentation of system operating parameters and maintenance activities during both pilot tests.

4.1 General System Inspection Item

To ensure that the site was properly maintained as well as to ensure that general site maintenance activities were performed, the following was performed during each site inspection:

- The building was unlocked, the general appearance of the interior was noted such as lights, vents and outdoor piping. The purpose of this visual inspection was to ensure that all components appeared in good condition.
- The field technician noted any problems with the building interior and equipment such as signs of trespassing, poor housekeeping, missing parts, if the SVE system was running on arrival, etc.

4.2 *Soil Vapor Extraction (SVE) and Manifold*

Extraction rates and concentrations of VOCs were monitored at each of the SVE and VOW wells during each visit. During the site visits, individual wells were monitored for VOCs with a PID. PID readings were taken at SVE points utilizing Tedlar® bags and a vacuum pump. Headspace readings were recorded in non-open wells. All valve positions were recorded on arrival and departure on the inspection checklist. The valve adjustments allowed for the removal of the maximum mass of VOCs from the subsurface with the available VOW/SVE wells. Field personnel continued to monitor and adjust extraction points to maximize system effectiveness. Air flow velocity readings were collected subsequent to valve adjustment with a hot wire anemometer. During the second pilot test the dilution valve was adjusted on a weekly basis to keep the concentration of VOCs in the influent vapor at around 1,000 ppm to optimize treatment in the catalytic oxidizer. All seven collection wells were left 100% for the duration of the test. Additional data and inspections were performed and noted on the inspection checklist.

4.3 *Extraction System*

Extensive field monitoring of the treatment system has shown the extraction blower is capable of long term operation with minimal maintenance. However, to ensure that the SVE system was operating properly, the following was performed during each site visit during the first pilot test (**Appendix C**):

- Influent flow (B1), influent vacuum (A1), vacuum after knock out drum / before filter (A2), vacuum after air filter (A3), blower effluent flow (C4), blower effluent temperature (E1), and blower discharge pressure (F1),
- PID levels of influent air stream before GAC and at the effluent,
- Total injected air flow, temperature and pressure, individual well air flow rates and pressures,
- Position of control valves on seven collection wells (to what degree were they opened or closed).

As mentioned previously, the second pilot test used a catalytic oxidizer in place of the GAC for treatment. During the second pilot test all of the previous operational information was recorded

to ensure the SVE system was operating properly, with the addition of information pertaining to the operation of the catalytic oxidizer. The information was recorded each visit as follows.

- Influent flow (B1), influent vacuum (A1), vacuum after knock out drum with air filter(A2 & A3), blower effluent flow (C4), blower effluent temperature (E1),
- PID levels of influent air stream before catalytic oxidizer, the effluent post treatment, and at each of the seven collection wells,
- Total injected air flow, temperature and pressure, individual well air flow rates and pressures,
- Operating data for the catalytic oxidizer catalyst entrance temperature (T1), catalyst exit temperature (T2), catalyst interior temperature (T3).

4.4 *Moisture Separator (Moisture Knockout)*

The level of water in the separator was monitored during each site visit and recorded. If water was present, it was removed using the brass drain valve. Liquid removed from the separator was evaporated and never needed to be removed.

4.5 *Air Filter*

The blowers were not operated without a filter cartridge properly installed in the appropriate air filter housing. The field technician checked the degree of restriction at the extraction blower air filter by recording the vacuum pressure before and after the filter and calculated the pressure drop by subtracting the readings. The extraction air filter media was replaced if the pressure drop across the filter exceeds eight inches of water. During the second pilot test the air filter was installed on the knock-out drum as it was not necessary at the blower unit in this configuration.

4.6 *SVE Wells*

As previously discussed, the SVE system included seven SVE and two VOW wells. In order to measure the system's overall effectiveness and efficiency, the SVE wells were operated at different intervals during the first pilot test through the use of individual manifolds.

4.6.1 *Pilot Test #1*

A summary of valve position, PID readings and flow rates are presented in **Table 3A**.

4.6.2 *Pilot Test 2*

During the second pilot test all seven collection wells were left 100% open from the start of the system on October 30, 2014 through system shutdown on August 20, 2015. Vapor flow and VOC concentrations were regulated by adjusting the dilution valve on the SVE system. The vapor input concentrations for the CAT/OX were adjusted between 1,000 ppm and 1,400 ppm on each O&M visit to reduce the power consumption required to heat the unit and maintain high

conversion efficiency. A summary of valve position, PID readings and flow rates are presented on **Table 3B**.

4.7 Air Treatment

4.7.1 Granulated Activated Carbon

System air was treated to remove CVOC constituents prior to exhaust. Regular monitoring of the air stream with a PID was used to determine when the GAC media was exhausted and required replacement. It was determined during the first month of the pilot test that the GAC was likely spent. A decision was made to order three GAC drums and install two in series, leaving the third as an extra. This modification to the system was made by Shaw on September 26, 2013. After the modification was complete the GAC was replaced when the air concentration between the GAC adsorbers exceeded 50% of the pre-GAC air concentration. On average, the GAC was changed every two to four weeks.

4.7.2 Catalytic Oxidizer

On October 30, 2014 a Falco 300 catalytic oxidizer was installed as part of the SVE system and the GAC was removed. All SVE wells were opened during this pilot test.

4.8 Exhaust Sampling

System off gas air monitoring was principally accomplished through the use of a PID. PID data was collected during each visit to track the air concentration of CVOC constituents being removed from the SVE wells and to document the exhaust concentrations. During start-up, samples were taken for laboratory analysis by modified EPA Method TO-15. The modification of this method consists of collecting the sample in a Tedlar® bag rather than a summa canister.

4.8.1 Pilot Test #1

As previously discussed, the SVE system is comprised of seven SVE wells that discharge through GAC. During Pilot Test#1 not all of the SVE wells were kept opened at all times. A summary of well operation is presented as **Table 3A**.

4.8.2 Pilot Test #2

The SVE wells remained open during this pilot test. Depending upon the influent PID reading the fresh air valve was adjusted to keep the influent concentrations at around 1,100 ppm. **Table 2B** presents each site inspection.

4.9 Waste Handling and Disposal

Shaw was responsible for all characterization, manifesting (if applicable), and off-site disposal of wastes generated on-site. Spent GAC units from the air pollution control adsorbers was the only waste stream generated during the IRM.

The NYSDEC project manager was notified when a waste material drum was filled or when additional drums were required. When a new drum was placed on-line, or a full drum removed and sealed, the drum was labeled as hazardous waste and disposed of in accordance with State and Federal regulations. A total of 12 GAC drums were removed from the Site during this pilot test.

Non-hazardous waste, personal protective equipment (PPE), and disposable supplies were generated by maintenance activities on the equipment. This material was appropriately disposed of by OP-TECH as directed by NYSDEC.

5.0 Results

5.1 Confirmatory Sampling

As described in the previous section, a total of 40 subsurface soil samples (including QA/QC samples) were collected as part of the confirmatory sampling completed in July 2013. The analytical results are summarized and compared to the NYSDEC Division of Environmental Remediation's Soil Cleanup Objectives (SCOs) as presented in 6NYCRR Part 375 (May 2010) in **Table 2** for VOCs; the complete analytical data package is included as **Appendix C** and summarized in the following paragraphs.

5.2 SVE System

The SVE system consisted of SVE wells (SVE-1 through SVE-7) and pertinent equipment (SVE blower, valves, etc.), located inside the on-site building. The SVE components of the remedial system were operational upon arrival during all of the weekly pilot study O&M visits. PID readings and velocity readings recorded from the individual extraction wells during the site visits are shown on **Table 4**. If the valve position is "0" or off, PID and velocity readings were not collected. The PID readings indicate that VOCs are no longer accumulating in sufficient quantities in the vapor extraction wells, where they would be removed from the subsurface and treated by the bioventing system before being released to the atmosphere. **Table 6** provides an estimate of the cumulative mass of PCE removed during each monitoring period and the cumulative mass of PCE removed to date. Approximately 3,053 pounds or (449 gallons) of PCE were removed during the pilot study.

SVE discharge air samples were collected weekly during the pilot test study. The samples were analyzed for VOCs via a modified (i.e. Tedlar® bag) TO-15 list. The analytical data for Pilot Test #1 is summarized in **Table 5A** and attached as **Appendix E**. The analytical data for Pilot Test #2 is summarized in **Table 5B** and attached as **Appendix F**.

5.2.1 Granulated Activated Carbon Results

The COI concentrations decreased during pilot test #1 as shown on **Figures 3** through **5**. COI concentrations are included as **Table 5A**.

5.2.2 Catalytic Oxidizer Results

The COI concentrations decreased during pilot test #2 as shown on **Figures 6** through **8**. COI concentrations are included on **Table 5B**.

5.3 *Data Quality Assurance /Quality Control and Management*

All confirmatory soil samples from this investigation were collected in a manner that was consistent with the protocol described in Shaw's Quality Assurance Program Plan. Field duplicates and rinse blank samples were collected with each different sample matrix at a frequency of 1 per 20 samples. Additionally, all analytical results from these samples were evaluated for data usability by a third party data validator, Environmental Data Services of Williamsburg, VA. The validator's deliverable to Shaw included a data usability summary report (DUSR) and revised Form I data packages that include data qualifiers the validator determined to be necessary. DUSRs and all subsequent deliverables have been included in **Appendix K**.

5.4 *Investigation Derived Waste Management*

Shaw was responsible for all characterization, manifesting, and disposal of wastes generated on-site. The SVE system generated one hazardous waste stream (spent GAC) from the air pollution control adsorbers.

The NYSDEC Project Manager was notified when a waste material drum was filled or when additional drums were required. When a new drum was placed on-line, or a full drum removed and sealed, the drum was labeled as hazardous waste and disposed of in accordance with State and Federal regulations. A total of 12 GAC drums were removed from the Site during this pilot test.

Non-hazardous waste (PPE and disposable supplies) were generated by maintenance activities on the equipment. This material was appropriately disposed of as directed by NYSDEC.

5.5 *ROI Test*

Results of the two tests indicated that the ROI was between 18.68 ft and 19.97 ft. Note that the results may have been influenced by backfill materials placed during the previous UST removals.

6.0 Conclusions

It was determined that the SVE system was effective in remediating soil vapor concentrations observed at the Site. PCE, Trichloroethene (TCE) and Dichloroethylene (cis-1,2-DCE) concentrations continued to decrease from system start-up (August 2013) to system shutdown (August 2015). Approximately 18,866 pounds of PCE were removed during Pilot test 1. Approximately 3,810 pounds of PCE were removed during Pilot Test 2. These totals were determined by measuring influent concentrations and flow rate of the SVE system.

Evaluation of the analytical results from the influent samples collected at SVE-2 through SVE-6 at system startup through system shut down show the following reduction in concentrations:

Well ID	PCE		TCE		Cis-1,2-DCE	
	%	Δ [] in $\mu\text{g}/\text{m}^3$	%	Δ [] in $\mu\text{g}/\text{m}^3$	%	Δ [] in $\mu\text{g}/\text{m}^3$
SVE-2	-98.63	19,000,000 D	-98.64	440,000	-98.63	160,000
		260,000		6,000		2,200
SVE-3	-87.63	3,800,000	-98.2	100,000	-97.37	30,000
		470,000		1,800		non-detect at 790*
SVE-4	-69.49	5,900,000	-91.67	120,000	-91.79	28,000
		1,800,000		10,000		2,300
SVE-5	-92.27	2,200,000	-98.91	10,000	-97.31	3,500
		170,000		non-detect at 110**		non-detect at 790***
SVE-6	-66.67	3,300,000	-82.89	76,000	-78.72	47,000
		1,100,000		13,000		10,000

Notes:

*789 $\mu\text{g}/\text{m}^3$ was used for the calculation

** 109 $\mu\text{g}/\text{m}^3$ was used for the calculation

*** 94 $\mu\text{g}/\text{m}^3$ was used for the calculation because it was the last detectable concentration recorded.

It is estimated (based on influent concentrations) that approximately 18,000 pounds of PCE were removed during Pilot Test 1 and 4,000 pounds during Pilot Test 2.

The concentrations in the sub-surface soil gas were too elevated to use the granulated activated carbon to be a cost effective effluent treatment. The catalytic oxidizer proved to be more cost effective to treat the effluent; however, the SVE wells were not able to operate at 100% because the influent was limited to 1,100 ppm.

Table 1
 Soil Confirmation Analytical Results
 VOCs by Method 8260
 Staubs Textile Services, Inc.
 July 2013

Site ID			SB-49	SB-49	SB-49	SB-49	SB-49	SB-50	SB-50
Field Sample ID			SB-49(0-4)	SB-49(4-8)	SB-49(8-12)	SB-49(12-16)	SB-49(16-19.7)	SB-50(0-4)	SB-50(4-8)
Sample Date			7/29/2013	7/29/2013	7/29/2013	7/29/2013	7/29/2013	7/29/2013	7/29/2013
Sample Depth(ft)			0-4	4-8	8-12	12-16	16-19.7	0-4	4-8
Analyte (mg/kg)	SCO - Unrestricted	SCO - Restricted Commerical	Primary Dilution: 1 Dilution: 10	Primary Dilution: 500	Primary Dilution: 50 Dilution: 1000	Primary Dilution: 1000	Primary	Primary Dilution: 500	Primary Dilution: 500
1,1,1-Trichloroethane	0.68	500 ^b	0.00057 U	3.2 U	0.31 UJ	2.8 U	3.1 U	2.7 U	2.7 U
1,1,2,2-Tetrachloroethane	NGV	NGV	0.00057 UJ	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
1,1,2-Trichloroethane	NGV	NGV	0.0011 U	6.5 U	0.61 UJ	5.7 U	6.1 U	5.5 U	5.4 U
1,1,2-Trichlorotrifluoroethane	NGV	NGV	0.00057 U	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
1,1-Dichloroethane	0.27	240	0.00057 U	3.2 U	0.31 UJ	2.8 U	3.1 U	2.7 U	2.7 U
1,1-Dichloroethene	0.33	500 ^b	0.00057 U	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
1,2,3-Trichlorobenzene	NGV	NGV	0.0011 UJ	6.5 U	0.61 U	5.7 U	6.1 U	5.5 U	5.4 U
1,2,4-Trichlorobenzene	NGV	NGV	0.00057 UJ	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
1,2,4-Trimethylbenzene	3.6	190	0.00057 UJ	52.2 J	132 J	268.1 J	14.6 J	242.7 J	86.7 J
1,2-Dibromo-3-Chloropropane	NGV	NGV	0.0057 UJ	32.3 U	3.1 U	28.3 U	30.6 U	27.3 U	26.9 U
1,2-Dibromoethane	NGV	NGV	0.00057 U	3.2 U	0.31 UJ	2.8 U	3.1 U	2.7 U	2.7 U
1,2-Dichlorobenzene	1.1	500 ^b	0.00057 UJ	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
1,2-Dichloroethane	0.02 ^o	30	0.00057 U	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
1,2-Dichloropropane	NGV	NGV	0.00057 U	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
1,3,5-Trimethylbenzene	8.4	190	0.00057 UJ	29.7 J	41.1 J	111.7 J	9.2 J	113.3 J	43.4 J
1,3-Dichlorobenzene	2	280	0.00057 UJ	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
1,4-Dichlorobenzene	1.8	130	0.00057 UJ	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
2-Butanone	0.12	130	0.0085 U	48.4 U	4.6 U	42.4 U	45.8 U	40.9 U	40.4 U
2-Hexanone	NGV	NGV	0.0028 U	16.1 U	1.5 U	14.1 U	15.3 U	13.6 U	13.5 U
4-Methyl-2-Pentanone	NGV	NGV	0.0028 U	16.1 U	1.5 U	14.1 U	15.3 U	13.6 U	13.5 U
Acetone	0.05	500	0.0028 U	16.1 U	1.5 U	14.1 U	15.3 U	13.6 U	13.5 U
Benzene	0.06	44	0.00057 U	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
Bromochloromethane	NGV	NGV	0.00057 U	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
Bromodichloromethane	NGV	NGV	0.00057 U	3.2 U	0.31 UJ	2.8 U	3.1 U	2.7 U	2.7 U
Bromoform	NGV	NGV	0.0017 U	9.7 U	0.92 U	8.5 U	9.2 U	8.2 U	8.1 U
Bromomethane	NGV	NGV	0.0011 U	6.5 U	0.61 UJ	5.7 U	6.1 U	5.5 U	5.4 U
Carbon Disulfide	NGV	NGV	0.00057 U	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
Carbon Tetrachloride	0.76	22	0.00057 U	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
Chlorobenzene	1.1	500 ^b	0.00057 U	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
Chloroethane	NGV	NGV	0.00057 U	3.2 U	0.31 UJ	2.8 U	3.1 U	2.7 U	2.7 U
Chloroform	0.37	350	0.0036 J	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
Chloromethane	NGV	NGV	0.00057 U	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
cis-1,2-Dichloroethene	0.25	500 ^b	0.0789	3.2 U	1.6 J	6.2 J	3.1 U	2.7 U	2.7 U
cis-1,3-Dichloropropene	NGV	NGV	0.00057 U	3.2 U	0.31 UJ	2.8 U	3.1 U	2.7 U	2.7 U
Cyclohexane	NGV	NGV	0.0031 J	3.2 U	0.31 UJ	2.8 U	3.1 U	2.7 U	2.7 U
Dibromochloromethane	NGV	NGV	0.00057 U	3.2 U	0.31 UJ	2.8 U	3.1 U	2.7 U	2.7 U
Dichlorodifluoromethane	NGV	NGV	0.00057 U	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
Ethyl Benzene	1	390	0.00057 U	3.2 U	0.99 J	3.1 J	3.1 U	2.7 U	2.7 U
Isopropylbenzene	NGV	NGV	0.00057 UJ	23.5 J	6.3 J	24.3 J	3.1 U	23.6 J	20.6 J
m/p-Xylenes	0.26	500 ^b	0.0011 U	6.5 U	8.1 J	23.8 J	6.1 U	4.9 J	5.4 U
Methyl Acetate	NGV	NGV	0.0011 U	6.5 U	0.61 U	5.7 U	6.1 U	5.5 U	5.4 U
Methyl tert-butyl Ether	1	500 ^b	0.00057 U	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
Methylcyclohexane	NGV	NGV	0.0043 J	3.2 U	3.3 J	28.5 J	3.1 U	2.7 U	2.7 U
Methylene Chloride	0.05	500 ^b	0.0146	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
n-Butylbenzene	12	500 ^b	0.00057 UJ	3.2 U	11.2 J	31.6 J	3.1 U	31.1 J	2.7 U
n-propylbenzene	3.9	500 ^b	0.00057 UJ	23.2 J	14.3 J	32.4 J	3.1 U	31.6 J	22.2 J
o-Xylene	0.26	500 ^b	0.00057 U	3.2 U	6.2 J	14.7 J	3.1 U	7.9 J	2.9 J
p-Isopropyltoluene	NGV	NGV	0.00057 UJ	4.8 J	14.4 J	18.4 J	3.1 U	22 J	6.9 J
sec-Butylbenzene	11	500 ^b	0.00057 U	23 J	12.3 J	30.2 J	19.1 J	30.6 J	21.3 J
Styrene	NGV	NGV	0.00057 U	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
t-1,3-Dichloropropene	NGV	NGV	0.00057 U	3.2 U	0.31 UJ	2.8 U	3.1 U	2.7 U	2.7 U
tert-Butylbenzene	5.9	500 ^b	0.00057 UJ	19.6 J	3.7 J	19.1 J	3.1 U	18 J	2.7 U
Tetrachloroethene	1.3	150	35.9 D	3153.2	5035.6 J	6243.8 J	524.6 J	4501.6	3804.6
Toluene	0.7	500 ^b	0.00057 U	3.2 U	0.9 J	6.1 J	3.1 U	2.7 U	2.7 U
trans-1,2-Dichloroethene	0.19	500 ^b	0.00057 U	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
Trichloroethene	0.47	200	1.3 D	5.7 J	50.4 J	78.6 J	3.1 U	13.3 J	2.7 U
Trichlorofluoromethane	NGV	NGV	0.00057 UJ	3.2 U	0.31 UJ	2.8 U	3.1 U	2.7 U	2.7 U
Vinyl Chloride	0.02	13	0.00057 U	3.2 U	0.31 U	2.8 U	3.1 U	2.7 U	2.7 U
Xylenes (Total)	0.26	500 ^b	0.00167 U	9.7 U	14.3 J	38.5 J	9.2 U	12.8 J	2.9 J

Table 1
Soil Confirmation Analytical Results
VOCs by Method 8260
Staubs Textile Services, Inc.
July 2013

Site ID			SB-50	SB-50	SB-50	SB-50	SB-51	SB-51	SB-51
Field Sample ID			SB-50(8-12)	SB-50(12-16)	DUP072913	SB-50(16-19.5)	SB-51(0-4)	SB-51(4-8)	SB-51(8-12)
Sample Date			7/29/2013	7/29/2013	7/29/2013	7/29/2013	7/29/2013	7/29/2013	7/29/2013
Sample Depth(ft)			8-12	12-16	12-16	16-19.5	0-4	4-8	8-12
Analyte (mg/kg)	SCO - Unrestricted	SCO - Restricted Commerical	Primary Dilution: 500	Primary Dilution: 250	Duplicate Dilution: 5000	Primary	Primary	Primary Dilution: 2500	Primary Dilution: 5000
1,1,1-Trichloroethane	0.68	500 ^b	2.6 U	2.8 UJ	2.9 U	0.0553 U	5.6 UJ	26.5 UJ	27.4 UJ
1,1,2,2-Tetrachloroethane	NGV	NGV	2.6 U	2.8 U	2.9 U	0.0553 U	5.6 U	26.5 U	27.4 U
1,1,2-Trichloroethane	NGV	NGV	5.2 U	5.6 U	5.8 U	0.11 U	11.3 UJ	53.1 U	54.9 U
1,1,2-Trichlorotrifluoroethane	NGV	NGV	2.6 U	2.8 UJ	2.9 U	0.0553 U	5.6 UJ	26.5 UJ	27.4 UJ
1,1-Dichloroethane	0.27	240	2.6 U	2.8 U	2.9 U	0.0553 U	5.6 U	26.5 UJ	27.4 UJ
1,1-Dichloroethene	0.33	500 ^b	2.6 U	2.8 UJ	2.9 U	0.0553 U	5.6 UJ	26.5 UJ	27.4 UJ
1,2,3-Trichlorobenzene	NGV	NGV	5.2 U	5.6 U	7.3 J	0.26 J	26.8 J	53.1 U	54.9 U
1,2,4-Trichlorobenzene	NGV	NGV	2.6 U	2.8 U	4.5 J	0.15 J	17.2 J	26.5 U	27.4 U
1,2,4-Trimethylbenzene	3.6	190	13.9 J	146.7 J	236.4 J	0.0553 U	21.4 J	26.5 U	27.4 U
1,2-Dibromo-3-Chloropropane	NGV	NGV	26 U	28.1 U	29 U	0.55 U	56.3 U	265.4 U	274.3 U
1,2-Dibromoethane	NGV	NGV	2.6 U	2.8 U	2.9 U	0.0553 U	5.6 UJ	26.5 U	27.4 U
1,2-Dichlorobenzene	1.1	500 ^b	2.6 U	2.8 U	2.9 U	0.0553 U	5.6 U	26.5 U	27.4 U
1,2-Dichloroethane	0.02 ^c	30	2.6 U	2.8 UJ	2.9 U	0.0553 U	5.6 U	26.5 U	27.4 U
1,2-Dichloropropane	NGV	NGV	2.6 U	2.8 U	2.9 U	0.0553 U	5.6 U	26.5 U	27.4 U
1,3,5-Trimethylbenzene	8.4	190	8.8 J	66.6 J	103 J	0.0553 U	16 J	26.5 U	27.4 U
1,3-Dichlorobenzene	2	280	2.6 U	2.8 U	2.9 U	0.0553 U	5.6 U	26.5 U	27.4 U
1,4-Dichlorobenzene	1.8	130	2.6 U	2.8 U	2.9 U	0.0553 U	5.6 U	26.5 U	27.4 U
2-Butanone	0.12	130	39 U	42.2 UJ	43.5 U	0.83 U	84.4 U	398 UJ	411.5 UJ
2-Hexanone	NGV	NGV	13 U	14.1 U	14.5 U	0.28 U	28.1 U	132.7 U	137.2 U
4-Methyl-2-Pentanone	NGV	NGV	13 U	14.1 U	14.5 U	0.28 U	28.1 U	132.7 U	137.2 U
Acetone	0.05	500	13 U	14.1 UJ	14.5 U	0.28 U	28.1 U	132.7 UJ	137.2 UJ
Benzene	0.06	44	2.6 U	2.8 U	2.9 U	0.0553 U	5.6 U	26.5 U	27.4 U
Bromochloromethane	NGV	NGV	2.6 U	2.8 UJ	2.9 U	0.0553 U	5.6 U	26.5 UJ	27.4 UJ
Bromodichloromethane	NGV	NGV	2.6 U	2.8 U	2.9 U	0.0553 U	5.6 UJ	26.5 UJ	27.4 UJ
Bromoform	NGV	NGV	7.8 U	8.4 U	8.7 U	0.17 U	16.9 U	79.6 U	82.3 U
Bromomethane	NGV	NGV	5.2 U	5.6 UJ	5.8 U	R	11.3 UJ	53.1 U	54.9 U
Carbon Disulfide	NGV	NGV	2.6 U	2.8 UJ	2.9 U	0.0553 U	5.6 U	26.5 UJ	27.4 UJ
Carbon Tetrachloride	0.76	22	2.6 U	2.8 UJ	2.9 U	0.0553 U	5.6 U	26.5 UJ	27.4 UJ
Chlorobenzene	1.1	500 ^b	2.6 U	2.8 UJ	2.9 U	0.0553 U	5.6 U	26.5 U	27.4 U
Chloroethane	NGV	NGV	2.6 U	2.8 UJ	2.9 U	R	5.6 UJ	26.5 UJ	27.4 UJ
Chloroform	0.37	350	2.6 U	2.8 UJ	2.9 U	0.0553 U	5.6 U	26.5 UJ	27.4 UJ
Chloromethane	NGV	NGV	2.6 U	2.8 UJ	2.9 U	0.0553 U	5.6 U	26.5 UJ	27.4 UJ
cis-1,2-Dichloroethene	0.25	500 ^b	2.6 U	2.8 UJ	3.9 J	0.0553 U	5.6 U	26.5 UJ	27.4 UJ
cis-1,3-Dichloropropene	NGV	NGV	2.6 U	2.8 U	2.9 U	0.0553 U	5.6 UJ	26.5 U	27.4 U
Cyclohexane	NGV	NGV	2.6 U	2.8 UJ	2.9 U	0.0553 UJ	5.6 UJ	26.5 UJ	27.4 UJ
Dibromochloromethane	NGV	NGV	2.6 U	2.8 U	2.9 U	0.0553 U	5.6 UJ	26.5 U	27.4 U
Dichlorodifluoromethane	NGV	NGV	2.6 U	2.8 UJ	2.9 U	0.0553 U	5.6 U	26.5 UJ	27.4 UJ
Ethyl Benzene	1	390	2.6 U	2.8 U	2.9 U	0.0553 U	5.6 U	26.5 U	27.4 U
Isopropylbenzene	NGV	NGV	18.6 J	21.8 J	25 J	0.0553 U	40.7 J	26.5 UJ	27.4 UJ
m/p-Xylenes	0.26	500 ^b	5.2 U	14.8 J	19.6 J	0.11 U	11.3 U	53.1 U	54.9 U
Methyl Acetate	NGV	NGV	5.2 U	5.6 UJ	5.8 U	0.11 U	11.3 U	53.1 UJ	54.9 UJ
Methyl tert-butyl Ether	1	500 ^b	2.6 U	2.8 UJ	2.9 U	0.0553 U	5.6 U	26.5 UJ	27.4 UJ
Methylcyclohexane	NGV	NGV	2.6 U	26.9 J	27.5 J	0.0553 U	5.6 U	26.5 U	27.4 U
Methylene Chloride	0.05	500 ^b	2.6 U	2.8 UJ	2.9 U	0.0553 U	5.6 U	26.5 UJ	27.4 UJ
n-Butylbenzene	12	500 ^b	2.6 U	25.9 J	31.8 J	0.0553 U	5.6 UJ	26.5 U	27.4 U
n-propylbenzene	3.9	500 ^b	17.3 J	23.9 J	30.9 J	0.0553 U	5.6 U	26.5 U	27.4 U
o-Xylene	0.26	500 ^b	2.6 U	9.1 J	12.7 J	0.0553 U	5.6 U	26.5 U	27.4 U
p-Isopropyltoluene	NGV	NGV	2.6 U	9.8 J	17.4 J	0.0553 U	6.9 J	26.5 U	27.4 U
sec-Butylbenzene	11.00	500 ^b	16.4 J	23.5 J	29.9 J	0.0553 U	38.9 J	26.5 U	27.4 U
Styrene	NGV	NGV	2.6 U	2.8 U	2.9 U	0.0553 U	5.6 U	26.5 U	27.4 U
t-1,3-Dichloropropene	NGV	NGV	2.6 U	2.8 U	2.9 U	0.0553 U	5.6 UJ	26.5 U	27.4 U
tert-Butylbenzene	5.9	500 ^b	2.6 U	17.9 J	20.3 J	0.0553 U	5.6 UJ	26.5 U	27.4 U
Tetrachloroethene	1.3	150	1339.9	1054	12669.3 J	1.3 J	448.6 J	14709 J	19647 J
Toluene	0.7	500 ^b	2.6 U	4.6 J	4.6 J	0.0553 U	5.6 U	26.5 U	27.4 U
trans-1,2-Dichloroethene	0.19	500 ^b	2.6 U	2.8 UJ	2.9 U	0.0553 U	5.6 U	26.5 UJ	27.4 UJ
Trichloroethene	0.47	200	2.6 U	10.9 J	67.8 J	0.0553 U	5.6 U	26.5 U	27.4 U
Trichlorofluoromethane	NGV	NGV	2.6 U	2.8 UJ	2.9 U	0.0553 UJ	5.6 UJ	26.5 UJ	27.4 UJ
Vinyl Chloride	0.02	13	2.6 U	2.8 UJ	2.9 U	0.0553 U	5.6 U	26.5 UJ	27.4 UJ
Xylenes (Total)	0.26	500 ^b	7.8 U	23.9 J	32.3 J	0.165 U	16.9 U	79.6 U	82.3 U

Table 1
Soil Confirmation Analytical Results
VOCs by Method 8260
Staubs Textile Services, Inc.
July 2013

Site ID			SB-51	SB-51	SB-52	SB-52	SB-52	SB-52	SB-52
Field Sample ID			SB-51(12-16)	SB-51(16-19.9)	SB-52(0-4)	SB-52(4-8)	SB-52(8-12)	SB-52(12-16)	SB-52(16-19)
Sample Date			7/29/2013	7/29/2013	7/30/2013	7/30/2013	7/30/2013	7/30/2013	7/30/2013
Sample Depth(ft)			12-16	16-19.9	0-4	4-8	8-12	12-16	16-19
Analyte (mg/kg)	SCO - Unrestricted	SCO - Restricted Commerical	Primary Dilution: 2500	Primary	Primary	Primary	Primary	Primary	Primary
1,1,1-Trichloroethane	0.68	500 ^b	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 U
1,1,2,2-Tetrachloroethane	NGV	NGV	27.8 U	2.8 U	5.4 U	27.2 U	27.7 U	5.6 U	0.00056 U
1,1,2-Trichloroethane	NGV	NGV	55.7 U	5.6 U	10.9 U	54.3 UJ	55.5 UJ	11.2 U	0.0011 U
1,1,2-Trichlorotrifluoroethane	NGV	NGV	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 U
1,1-Dichloroethane	0.27	240	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 U
1,1-Dichloroethene	0.33	500 ^b	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 U
1,2,3-Trichlorobenzene	NGV	NGV	55.7 U	5.6 U	10.9 U	54.3 U	55.5 U	11.2 U	0.0011 U
1,2,4-Trichlorobenzene	NGV	NGV	27.8 U	2.8 U	5.4 U	27.2 U	27.7 U	5.6 U	0.00056 U
1,2,4-Trimethylbenzene	3.6	190	27.8 U	2.8 U	5.4 U	27.2 U	27.7 U	63.5	0.0018 J
1,2-Dibromo-3-Chloropropane	NGV	NGV	278.4 U	28.1 U	54.3 U	271.6 U	277.5 U	55.8 U	0.0056 U
1,2-Dibromoethane	NGV	NGV	27.8 U	2.8 U	5.4 U	27.2 UJ	27.7 UJ	5.6 U	0.00056 U
1,2-Dichlorobenzene	1.1	500 ^b	27.8 U	2.8 U	5.4 U	27.2 U	27.7 U	5.6 U	0.00056 U
1,2-Dichloroethane	0.02 ^c	30	27.8 U	2.8 U	5.4 U	27.2 UJ	27.7 UJ	5.6 U	0.00056 U
1,2-Dichloropropane	NGV	NGV	27.8 U	2.8 U	5.4 U	27.2 UJ	27.7 UJ	5.6 U	0.00056 U
1,3,5-Trimethylbenzene	8.4	190	27.8 U	2.8 U	5.4 U	27.2 U	27.7 U	32.5 J	0.00056 U
1,3-Dichlorobenzene	2	280	27.8 U	2.8 U	5.4 U	27.2 UJ	27.7 U	5.6 U	0.00056 U
1,4-Dichlorobenzene	1.8	130	27.8 U	2.8 U	5.4 U	27.2 U	27.7 U	5.6 U	0.00056 U
2-Butanone	0.12	130	417.6 UJ	42.1 UJ	81.5 UJ	407.4 UJ	416.2 UJ	83.8 UJ	0.0083 U
2-Hexanone	NGV	NGV	139.2 U	14 U	27.2 U	135.8 UJ	138.7 UJ	27.9 U	0.0028 U
4-Methyl-2-Pentanone	NGV	NGV	139.2 U	14 U	27.2 U	135.8 UJ	138.7 UJ	27.9 U	0.0057 J
Acetone	0.05	500	139.2 UJ	14 UJ	27.2 UJ	135.8 UJ	138.7 UJ	27.9 UJ	0.0028 U
Benzene	0.06	44	27.8 U	2.8 U	5.4 U	27.2 UJ	27.7 UJ	5.6 U	0.00056 U
Bromochloromethane	NGV	NGV	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 U
Bromodichloromethane	NGV	NGV	27.8 U	2.8 U	5.4 U	27.2 UJ	27.7 UJ	5.6 U	0.00056 U
Bromoform	NGV	NGV	83.5 U	8.4 U	16.3 U	81.5 U	83.2 U	16.8 U	0.0017 U
Bromomethane	NGV	NGV	55.7 UJ	5.6 UJ	10.9 UJ	54.3 UJ	55.5 UJ	11.2 UJ	0.0011 U
Carbon Disulfide	NGV	NGV	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 U
Carbon Tetrachloride	0.76	22	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 U
Chlorobenzene	1.1	500 ^b	27.8 U	2.8 U	5.4 U	27.2 U	27.7 U	5.6 U	0.00056 U
Chloroethane	NGV	NGV	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 UJ
Chloroform	0.37	350	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 U
Chloromethane	NGV	NGV	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 U
cis-1,2-Dichloroethene	0.25	500 ^b	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 U
cis-1,3-Dichloropropene	NGV	NGV	27.8 U	2.8 U	5.4 U	27.2 UJ	27.7 UJ	5.6 U	0.00056 U
Cyclohexane	NGV	NGV	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 U	5.6 UJ	0.00056 U
Dibromochloromethane	NGV	NGV	27.8 U	2.8 U	5.4 U	27.2 UJ	27.7 UJ	5.6 U	0.00056 U
Dichlorodifluoromethane	NGV	NGV	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 U	5.6 UJ	0.00056 U
Ethyl Benzene	1	390	27.8 U	2.8 U	5.4 U	27.2 U	27.7 UJ	5.6 U	0.00056 U
Isopropylbenzene	NGV	NGV	27.8 UJ	2.8 UJ	5.4 UJ	27.2 U	27.7 UJ	5.6 UJ	0.00056 U
m/p-Xylenes	0.26	500 ^b	55.7 U	5.6 U	10.9 U	54.3 U	55.5 U	11.2 U	0.0011 U
Methyl Acetate	NGV	NGV	55.7 UJ	5.6 UJ	10.9 UJ	54.3 UJ	55.5 UJ	11.2 UJ	0.0011 UJ
Methyl tert-butyl Ether	1	500 ^b	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 U
Methylcyclohexane	NGV	NGV	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 U
Methylene Chloride	0.05	500 ^b	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 U
n-Butylbenzene	12	500 ^b	27.8 U	2.8 U	5.4 U	27.2 U	27.7 U	5.6 U	0.00056 U
n-propylbenzene	3.9	500 ^b	27.8 U	2.8 U	5.4 U	27.2 U	27.7 U	5.6 U	0.00056 U
o-Xylene	0.26	500 ^b	27.8 U	2.8 U	5.4 U	27.2 U	27.7 U	5.6 U	0.00056 U
p-Isopropyltoluene	NGV	NGV	27.8 U	2.8 U	5.4 U	27.2 U	27.7 U	5.6 U	0.00056 U
sec-Butylbenzene	11.00	500 ^b	27.8 U	2.8 U	5.4 U	27.2 U	27.7 U	35.8 J	0.00056 U
Styrene	NGV	NGV	27.8 U	2.8 U	5.4 U	27.2 U	27.7 U	5.6 U	0.00056 U
t-1,3-Dichloropropene	NGV	NGV	27.8 U	2.8 U	5.4 U	27.2 UJ	27.7 UJ	5.6 U	0.00056 U
tert-Butylbenzene	5.9	500 ^b	27.8 U	2.8 U	5.4 U	27.2 U	27.7 U	5.6 U	0.00056 U
Tetrachloroethene	1.3	150	10557 J	293.3 J	907.3 J	4496.6 J	2817.4 J	1012.3	0.0183
Toluene	0.7	500 ^b	27.8 U	2.8 U	5.4 U	27.2 UJ	27.7 UJ	5.6 U	0.00056 U
trans-1,2-Dichloroethene	0.19	500 ^b	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 U
Trichloroethene	0.47	200	27.8 U	2.8 U	5.4 U	27.2 UJ	27.7 UJ	5.6 U	0.00056 U
Trichlorofluoromethane	NGV	NGV	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 U
Vinyl Chloride	0.02	13	27.8 UJ	2.8 UJ	5.4 UJ	27.2 UJ	27.7 UJ	5.6 UJ	0.00056 U
Xylenes (Total)	0.26	500 ^u	83.5 U	8.4 U	16.3 U	81.5 U	83.2 U	16.8 U	0.00166 U

Table 1
Soil Confirmation Analytical Results
VOCs by Method 8260
Staubs Textile Services, Inc.
July 2013

Site ID			SB-53	SB-53	SB-53	SB-53	SB-53	SB-54	SB-54
Field Sample ID			SB-53(0-4)	SB-53(4-8)	SB-53(8-12)	SB-53(12-16)	SB-53(16-19)	SB-54(0-4)	DUP073013
Sample Date			7/30/2013	7/30/2013	7/30/2013	7/30/2013	7/30/2013	7/30/2013	7/30/2013
Sample Depth(ft)			0-4	4-5	8-12	12-16	16-19	0-4	0-4
Analyte (mg/kg)	SCO - Unrestricted	SCO - Restricted Commerical	Primary	Primary	Primary Dilution: 500	Primary	Primary	Primary	Duplicate Dilution: 10
1,1,1-Trichloroethane	0.68	500 ^b	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.00056 U	2.7 UJ	0.0564 UJ
1,1,2,2-Tetrachloroethane	NGV	NGV	10.8 U	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	0.0564 U
1,1,2-Trichloroethane	NGV	NGV	21.6 UJ	110 UJ	5.6 U	5.5 UJ	0.0011 U	5.4 U	0.11 UJ
1,1,2-Trichlorotrifluoroethane	NGV	NGV	10.8 UJ	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 UJ	0.0564 U
1,1-Dichloroethane	0.27	240	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.00056 U	2.7 UJ	0.0564 U
1,1-Dichloroethene	0.33	500 ^b	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.00056 U	2.7 UJ	0.0564 UJ
1,2,3-Trichlorobenzene	NGV	NGV	21.6 U	110 UJ	5.6 U	5.5 U	0.0011 U	5.4 U	0.11 U
1,2,4-Trichlorobenzene	NGV	NGV	10.8 U	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	0.0564 U
1,2,4-Trimethylbenzene	3.6	190	16 J	183.8 J	399.8	70.4 J	0.0482	2.7 U	90.9
1,2-Dibromo-3-Chloropropane	NGV	NGV	108 U	550.2 UJ	27.8 U	27.7 U	0.0056 U	26.9 U	0.56 U
1,2-Dibromoethane	NGV	NGV	10.8 UJ	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	0.0564 UJ
1,2-Dichlorobenzene	1.1	500 ^b	10.8 U	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	0.0564 U
1,2-Dichloroethane	0.02 ^c	30	10.8 U	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	0.0564 U
1,2-Dichloropropane	NGV	NGV	10.8 UJ	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	0.0564 U
1,3,5-Trimethylbenzene	8.4	190	10.8 U	125.4 J	173.5	26.2 J	0.0088	2.7 U	28.4
1,3-Dichlorobenzene	2	280	10.8 U	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	0.0564 UJ
1,4-Dichlorobenzene	1.8	130	10.8 U	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	0.0564 U
2-Butanone	0.12	130	162 UJ	825.3 UJ	41.7 U	41.6 UJ	0.0084 U	40.3 UJ	0.85 U
2-Hexanone	NGV	NGV	54 UJ	275.1 UJ	13.9 U	13.9 U	0.0028 U	13.4 U	0.28 U
4-Methyl-2-Pentanone	NGV	NGV	54 UJ	275.1 UJ	13.9 U	13.9 U	0.0028 U	13.4 U	0.28 U
Acetone	0.05	500	54 UJ	275.1 UJ	13.9 U	13.9 UJ	0.0163 J	13.4 UJ	0.28 U
Benzene	0.06	44	10.8 UJ	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	0.0564 U
Bromochloromethane	NGV	NGV	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.00056 U	2.7 UJ	0.0564 U
Bromodichloromethane	NGV	NGV	10.8 UJ	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	0.0564 UJ
Bromoform	NGV	NGV	32.4 U	165.1 UJ	8.3 U	8.3 U	0.0017 U	8.1 U	0.17 U
Bromomethane	NGV	NGV	21.6 UJ	110 UJ	5.6 U	5.5 UJ	0.0011 U	5.4 UJ	0.11 UJ
Carbon Disulfide	NGV	NGV	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.00056 U	2.7 UJ	0.0564 U
Carbon Tetrachloride	0.76	22	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.00056 U	2.7 J	0.0564 U
Chlorobenzene	1.1	500 ^b	10.8 U	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	0.0564 U
Chloroethane	NGV	NGV	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.00056 U	2.7 UJ	0.0564 UJ
Chloroform	0.37	350	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.00056 U	2.7 UJ	0.0564 U
Chloromethane	NGV	NGV	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.00056 U	2.7 UJ	0.0564 U
cis-1,2-Dichloroethene	0.25	500 ^b	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.0029 J	2.7 UJ	0.68 J
cis-1,3-Dichloropropene	NGV	NGV	10.8 UJ	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	0.0564 UJ
Cyclohexane	NGV	NGV	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.00056 U	2.7 UJ	5.6 J
Dibromochloromethane	NGV	NGV	10.8 UJ	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	0.0564 UJ
Dichlorodifluoromethane	NGV	NGV	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.00056 U	2.7 UJ	0.0564 U
Ethyl Benzene	1	390	10.8 U	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	1.5 J
Isopropylbenzene	NGV	NGV	10.8 UJ	55 UJ	25.1 J	2.8 UJ	0.00056 U	2.7 UJ	1.8 J
m/p-Xylenes	0.26	500 ^b	21.6 U	110 UJ	24.3 J	5.5 U	0.0011 U	5.4 U	6.7 J
Methyl Acetate	NGV	NGV	21.6 UJ	110 UJ	5.6 UJ	5.5 UJ	0.0011 UJ	5.4 UJ	0.11 U
Methyl tert-butyl Ether	1	500 ^b	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.00056 U	2.7 UJ	0.0564 U
Methylcyclohexane	NGV	NGV	10.8 U	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	11.5
Methylene Chloride	0.05	500 ^b	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.0037 J	2.7 UJ	0.0564 U
n-Butylbenzene	12	500 ^b	10.8 U	55 UJ	34.2	21.4 J	0.0068	2.7 U	5.1 J
n-propylbenzene	3.9	500 ^b	10.8 U	55 UJ	32.2	19.2 J	0.0015 J	2.7 U	5.0 J
o-Xylene	0.26	500 ^b	10.8 U	55 UJ	10.4 J	2.8 U	0.00056 U	2.7 U	1.9 J
p-Isopropyltoluene	NGV	NGV	10.8 U	55 UJ	31.3	2.8 U	0.0082	2.7 U	5.3 J
sec-Butylbenzene	11	500 ^b	67.2 J	55 UJ	37.5	19.3 J	0.002 J	2.7 U	4.0 J
Styrene	NGV	NGV	10.8 U	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	0.0564 U
t-1,3-Dichloropropene	NGV	NGV	10.8 UJ	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	0.0564 UJ
tert-Butylbenzene	5.9	500 ^b	10.8 UJ	55 UJ	25.3 J	17.1 J	0.00056 U	2.7 U	2.3 J
Tetrachloroethene	1.3	150	1343.2 J	8839 J	3627	195.8 J	0.11	167.2 J	21.2 J
Toluene	0.7	500 ^b	10.8 U	55 UJ	2.8 U	2.8 U	0.00056 U	2.7 U	0.0564 U
trans-1,2-Dichloroethene	0.19	500 ^b	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.00056 U	2.7 UJ	0.0564 U
Trichloroethene	0.47	200	10.8 U	55 UJ	55	2.8 U	0.0017 J	2.7 U	0.5 J
Trichlorofluoromethane	NGV	NGV	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.00056 U	2.7 UJ	0.0564 UJ
Vinyl Chloride	0.02	13	10.8 UJ	55 UJ	2.8 U	2.8 UJ	0.00056 U	2.7 UJ	0.0564 U
Xylenes (Total)	0.26	500 ^u	32.4 U	165 UJ	34.7	8.3 U	0.00166 U	8.1 U	8.6 J

Table 1
Soil Confirmation Analytical Results
VOCs by Method 8260
Staubs Textile Services, Inc.
July 2013

Site ID			SB-54	SB-54	SB-54	SB-54	SB-55	SB-55	SB-55
Field Sample ID			SB-54(4-8)	SB-54(8-12)	SB-54(12-16)	SB-54(16-19.5)	SB-55(0-4)	SB-55(4-8)	SB-55(8-12)
Sample Date			7/30/2013	7/30/2013	7/30/2013	7/30/2013	7/30/2013	7/30/2013	7/30/2013
Sample Depth(ft)			4-8	8-12	12-16	16-19.5	0-4	4-8	8-12
Analyte (mg/kg)	SCO - Unrestricted	SCO - Restricted Commerical	Primary	Primary	Primary	Primary	Primary Dilution: 20	Primary	Primary Dilution: 10
1,1,1-Trichloroethane	0.68	500 ^b	2.7 UJ	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.00056 U	0.0559 U
1,1,2,2-Tetrachloroethane	NGV	NGV	2.7 U	29 U	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.0559 U
1,1,2-Trichloroethane	NGV	NGV	5.5 U	58.1 UJ	22.6 U	0.11 U	0.11 U	0.0011 U	0.11 U
1,1,2-Trichlorotrifluoroethane	NGV	NGV	2.7 UJ	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.00056 U	0.0559 UJ
1,1-Dichloroethane	0.27	240	2.7 UJ	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.00056 U	0.0559 U
1,1-Dichloroethene	0.33	500 ^b	2.7 UJ	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.00056 U	0.0559 U
1,2,3-Trichlorobenzene	NGV	NGV	5.5 U	58.1 U	22.6 U	0.11 U	0.11 U	0.0011 U	0.11 U
1,2,4-Trichlorobenzene	NGV	NGV	2.7 U	29 U	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.0559 U
1,2,4-Trimethylbenzene	3.6	190	2.7 U	29 U	91.3 J	2.8	16 J	0.0076	25.9 J
1,2-Dibromo-3-Chloropropane	NGV	NGV	27.3 U	290.3 U	113 U	0.56 U	0.56 U	0.0056 U	0.56 U
1,2-Dibromoethane	NGV	NGV	2.7 U	29 UJ	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.0559 U
1,2-Dichlorobenzene	1.1	500 ^b	2.7 U	29 U	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.0559 U
1,2-Dichloroethane	0.02 ^c	30	2.7 U	29 UJ	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.0559 U
1,2-Dichloropropane	NGV	NGV	2.7 U	29 UJ	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.0559 U
1,3,5-Trimethylbenzene	8.4	190	2.7 U	29 U	46.1 J	1.1	6.2 J	0.0012 J	0.0559 U
1,3-Dichlorobenzene	2	280	2.7 U	29 UJ	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.0559 U
1,4-Dichlorobenzene	1.8	130	2.7 U	29 U	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.0559 U
2-Butanone	0.12	130	41 UJ	435.4 UJ	169.5 UJ	0.84 U	0.84 UJ	0.0084 U	0.84 U
2-Hexanone	NGV	NGV	13.7 U	145.1 UJ	56.5 U	0.28 U	0.28 U	0.0028 U	0.28 U
4-Methyl-2-Pentanone	NGV	NGV	13.7 U	145.1 UJ	56.5 U	0.28 U	0.28 U	0.0028 U	0.28 U
Acetone	0.05	500	13.7 UJ	145.1 UJ	56.5 UJ	0.28 U	0.28 UJ	0.0172 J	0.28 U
Benzene	0.06	44	2.7 U	29 UJ	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.0559 U
Bromochloromethane	NGV	NGV	2.7 U	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.00056 U	0.0559 U
Bromodichloromethane	NGV	NGV	2.7 UJ	29 UJ	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.0559 U
Bromoform	NGV	NGV	8.2 U	87.1 U	33.9 U	0.17 U	0.17 U	0.0017 U	0.17 U
Bromomethane	NGV	NGV	R	58.1 UJ	22.6 UJ	0.11 U	0.11 UJ	0.0011 U	0.11 U
Carbon Disulfide	NGV	NGV	2.7 UJ	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.0025 J	0.0559 U
Carbon Tetrachloride	0.76	22	2.7 UJ	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.00056 U	0.0559 U
Chlorobenzene	1.1	500 ^b	2.7 U	29 U	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.0559 U
Chloroethane	NGV	NGV	R	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.00056 UJ	0.0559 U
Chloroform	0.37	350	2.7 UJ	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.00056 U	0.0559 U
Chloromethane	NGV	NGV	2.7 UJ	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.00056 UJ	0.0559 U
cis-1,2-Dichloroethene	0.25	500 ^b	7.5 J	29 UJ	11.3 UJ	0.0563 U	3.5 J	0.0115	0.0559 U
cis-1,3-Dichloropropene	NGV	NGV	2.7 U	29 UJ	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.0559 U
Cyclohexane	NGV	NGV	2.7 UJ	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.00056 U	0.0559 UJ
Dibromochloromethane	NGV	NGV	2.7 U	29 UJ	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.0559 U
Dichlorodifluoromethane	NGV	NGV	2.7 UJ	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.00056 UJ	0.0559 U
Ethyl Benzene	1	390	2.7 U	29 U	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.21 J
Isopropylbenzene	NGV	NGV	2.7 UJ	29 UJ	11.3 UJ	0.81 J	0.64 J	0.00056 U	0.79 J
m/p-Xylenes	0.26	500 ^b	5.5 U	58.1 U	22.6 U	0.14 J	0.42 J	0.0011 U	0.34 J
Methyl Acetate	NGV	NGV	5.5 UJ	58.1 UJ	22.6 UJ	0.11 UJ	0.11 UJ	0.0011 UJ	0.11 U
Methyl tert-butyl Ether	1	500 ^b	2.7 UJ	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.00056 U	0.0559 U
Methylcyclohexane	NGV	NGV	2.7 U	29 UJ	11.3 U	0.82	0.49 J	0.0023 J	6.8 J
Methylene Chloride	0.05	500 ^b	2.7 UJ	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.005 J	0.0559 U
n-Butylbenzene	12	500 ^b	2.7 U	29 U	11.3 U	0.5 J	2.0 J	0.00056 U	2.9 J
n-propylbenzene	3.9	500 ^b	2.7 U	29 U	11.3 U	0.41 J	1.1 J	0.00056 U	1.4 J
o-Xylene	0.26	500 ^b	2.7 U	29 U	11.3 U	0.0563 U	0.24 J	0.00056 U	0.0559 U
p-Isopropyltoluene	NGV	NGV	2.7 U	29 U	11.3 U	0.23 J	2.4 J	0.00056 U	2.6 J
sec-Butylbenzene	11	500 ^b	2.7 U	29 U	11.3 U	0.48 J	2.0 J	0.00056 U	1.9 J
Styrene	NGV	NGV	2.7 U	29 U	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.0559 U
t-1,3-Dichloropropene	NGV	NGV	2.7 U	29 UJ	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.0559 U
tert-Butylbenzene	5.9	500 ^b	2.7 U	29 U	11.3 U	0.0563 U	0.63 J	0.00056 U	0.54 J
Tetrachloroethene	1.3	150	215.1	5232.4 J	1406.5	16.2	196.6 J	0.0878	21.2 J
Toluene	0.7	500 ^b	2.7 U	29 UJ	11.3 U	0.0563 U	0.0557 U	0.00056 U	0.0559 U
trans-1,2-Dichloroethene	0.19	500 ^b	2.7 UJ	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.00056 U	0.0559 U
Trichloroethene	0.47	200	2.7 U	29 UJ	11.3 U	0.0563 U	4.3 J	0.0038 J	0.0972 J
Trichlorofluoromethane	NGV	NGV	2.7 UJ	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.00056 U	0.0559 UJ
Vinyl Chloride	0.02	13	2.7 UJ	29 UJ	11.3 UJ	0.0563 U	0.0557 UJ	0.00056 UJ	0.0559 U
Xylenes (Total)	0.26	500 ^u	8.2 U	87.1 U	33.9 U	0.14	0.66 J	0.00166 U	0.34 J

Table 1
Soil Confirmation Analytical Results
VOCs by Method 8260
Staubs Textile Services, Inc.
July 2013

Site ID			SB-55	SB-55
Field Sample ID			SB-55(12-16)	SB-55(16-19)
Sample Date			7/30/2013	7/30/2013
Sample Depth(ft)			12-16	16-19
Analyte (mg/kg)	SCO - Unrestricted	SCO - Restricted Commerical	Primary Dilution: 10	Primary
1,1,1-Trichloroethane	0.68	500 ^b	0.0574 U	0.00056 U
1,1,2,2-Tetrachloroethane	NGV	NGV	0.0574 U	0.00056 U
1,1,2-Trichloroethane	NGV	NGV	0.11 U	0.0011 U
1,1,2-Trichlorotrifluoroethane	NGV	NGV	0.0574 U	0.00056 U
1,1-Dichloroethane	0.27	240	0.0574 U	0.00056 U
1,1-Dichloroethene	0.33	500 ^b	0.0574 U	0.00056 U
1,2,3-Trichlorobenzene	NGV	NGV	0.11 U	0.0011 U
1,2,4-Trichlorobenzene	NGV	NGV	0.0574 U	0.00056 U
1,2,4-Trimethylbenzene	3.6	190	114.9	0.0026 J
1,2-Dibromo-3-Chloropropane	NGV	NGV	0.57 U	0.0056 U
1,2-Dibromoethane	NGV	NGV	0.0574 U	0.00056 U
1,2-Dichlorobenzene	1.1	500 ^b	0.0574 U	0.00056 U
1,2-Dichloroethane	0.02 ^c	30	0.0574 U	0.00056 U
1,2-Dichloropropane	NGV	NGV	0.0574 U	0.00056 U
1,3,5-Trimethylbenzene	8.4	190	1.1	0.00056 U
1,3-Dichlorobenzene	2	280	0.0574 U	0.00056 U
1,4-Dichlorobenzene	1.8	130	0.0574 U	0.00056 U
2-Butanone	0.12	130	0.86 U	0.0084 U
2-Hexanone	NGV	NGV	0.29 U	0.0028 U
4-Methyl-2-Pentanone	NGV	NGV	0.29 U	0.0028 U
Acetone	0.05	500	0.29 U	0.0198 J
Benzene	0.06	44	0.0574 U	0.00056 U
Bromochloromethane	NGV	NGV	0.0574 U	0.00056 U
Bromodichloromethane	NGV	NGV	0.0574 U	0.00056 U
Bromoform	NGV	NGV	0.17 U	0.0017 U
Bromomethane	NGV	NGV	0.11 U	0.0011 U
Carbon Disulfide	NGV	NGV	0.0574 U	0.00056 U
Carbon Tetrachloride	0.76	22	0.0574 U	0.00056 U
Chlorobenzene	1.1	500 ^b	0.0574 U	0.00056 U
Chloroethane	NGV	NGV	0.0574 U	0.00056 UJ
Chloroform	0.37	350	0.0574 U	0.00056 U
Chloromethane	NGV	NGV	0.0574 U	0.00056 U
cis-1,2-Dichloroethene	0.25	500 ^b	4.1	0.0041 J
cis-1,3-Dichloropropene	NGV	NGV	0.0574 U	0.00056 U
Cyclohexane	NGV	NGV	27.5 J	0.00056 U
Dibromochloromethane	NGV	NGV	0.0574 U	0.00056 U
Dichlorodifluoromethane	NGV	NGV	0.0574 U	0.00056 U
Ethyl Benzene	1	390	5.1	0.00056 U
Isopropylbenzene	NGV	NGV	1.9 J	0.00056 U
m/p-Xylenes	0.26	500 ^b	1.2	0.0011 U
Methyl Acetate	NGV	NGV	0.11 U	0.0011 UJ
Methyl tert-butyl Ether	1	500 ^b	0.0574 U	0.00056 U
Methylcyclohexane	NGV	NGV	70	0.00056 U
Methylene Chloride	0.05	500 ^b	0.0574 U	0.0024 J
n-Butylbenzene	12	500 ^b	6.3	0.00056 U
n-propylbenzene	3.9	500 ^b	4.3	0.00056 U
o-Xylene	0.26	500 ^b	0.23 J	0.00056 U
p-Isopropyltoluene	NGV	NGV	6.0	0.00056 U
sec-Butylbenzene	11	500 ^b	4.0	0.00056 U
Styrene	NGV	NGV	0.0574 U	0.00056 U
t-1,3-Dichloropropene	NGV	NGV	0.0574 U	0.00056 U
tert-Butylbenzene	5.9	500 ^b	0.83 J	0.00056 U
Tetrachloroethene	1.3	150	12.9	0.0308
Toluene	0.7	500 ^b	0.0574 U	0.00056 U
trans-1,2-Dichloroethene	0.19	500 ^b	0.0574 U	0.00056 U
Trichloroethene	0.47	200	2.4	0.0015 J
Trichlorofluoromethane	NGV	NGV	0.0574 UJ	0.00056 U
Vinyl Chloride	0.02	13	0.0574 U	0.00056 U
Xylenes (Total)	0.26	500 ^b	1.43	0.00166 U

Table 1
Soil Confirmation Analytical Results
VOCs by Method 8260
Staubs Textile Services, Inc.
July 2013

Notes:

- 1) All results are in milligrams per kilogram (mg/kg) or parts per million (ppm).
- 2) New York State Department of Environmental Conservation (NYSDEC) Soil Clean-Up Objectives obtained from 6 NYCRR Part 375 December 14, 2006.
- 3) NGV - No guidance value listed 6 NYCRR Part 375.
- 4) N/A - Not Analyzed.
- 5) **Bold** - Indicates analyte detected by laboratory.
- 6) Shaded area indicates analyte detected at or above Restricted-Commercial SCO guidance value.
- 7) U - Not detected at laboratory method detection limit;.
- 8) J - Data indicates the presence of a compound that meets the identification criteria. The result is less than the quantitation limit but greater than MDL. The concentration given is an approximate value.
- 9) UJ - The analyte was not detected above the sample reporting limit; and the reporting limit is approximate.
- 10) R - The sample results is rejected due to serious deficiencies. The presence or absence of the analyte cannot be verified.
- 11) D - Compound analyzed at secondary dilution.
- 12) ^b - The SCOs for commercial use were capped at a maximum value of 500 ppm. See TSD section 9.3.
- 13) ^c - For analytes where the calculated SCO was lower than the rural soil background concentration, as determined by the Department and Department of Health rural soil survey, the rural soil background concentration is used as the Track 1 SCO value for this use of the site.
- 14) ^d - For analytes where the calculated SCO was lower than the contract required quantitation limit (CRQL), the CRQL is used as the Track 1 SCO value.
- 15) ^f - Protection of ecological resources SCOs were not developed for contaminants identified in Table 375-6.8(b) with “NS”. Where such contaminants appear in able 375-6.8(a), the applicant may be required by the Department to calculate a protection of ecological resources SCO according to the TSD.
- 16) % rec - Percentage of the spiked compound recovered through analysis.
- 17) QC lim. - Quality control limits for spiked compound recovery as statistically determined by the laboratory.
- 18) * - Indicates percent recovery was outside of the laboratory quality control limits. Groundwater quality parameters and elevations are shown on **Table 6**.
- 19) ^ - Percent different of MS and MSD percent recoveries is outside of QC limits.
- 20) *Italics* - Compounds were reported as Tentatively Identified Compounds (TICs).
- 21) Trip Blanks analyses are available in the analytical and DUSR packages but not presented on the Tables.

Table 2A
Site Inspection
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Date	System Inspection	Readings	Units	System Maintenance		Other Comments
08/28/13	Influent flow vacuum (before knock out drum)	110.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	No	None
	Vacuum after knockout drum - A2	52	in. of H ₂ O			
	Vacuum after air filter - A3	60	in. of H ₂ O			
	Pressure drop (A2-A3)	8	in. of H ₂ O			
	Blower pressure after blower - A4	NM	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	110	scfm			
	Blower effluent flow (B2)	103	scfm			
	Total influent concentration	NM	ppm			
Blower Effluent Temperature (E-1)	115	degrees				
09/03/13	Influent flow vacuum (before knock out drum)	92.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	No	None
	Vacuum after knockout drum - A2	-54	in. of H ₂ O			
	Vacuum after air filter - A3	-62	in. of H ₂ O			
	Pressure drop (A2-A3)	-8	in. of H ₂ O			
	Blower pressure after blower - A4	60.0	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	92	scfm			
	Blower effluent flow (B2)	60	scfm			
	Total influent concentration	1772.0	ppm			
	Blower Effluent Temperature (E-1)	124	degrees			
09/10/13	Influent flow vacuum (before knock out drum)	105	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	None drained = 10 gallons
	Vacuum after knockout drum - A2	-56	in. of H ₂ O			
	Vacuum after air filter - A3	-62	in. of H ₂ O			
	Pressure drop (A2-A3)	-6	in. of H ₂ O			
	Blower pressure after blower - A4	85.0	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	150	scfm			
	Blower effluent flow (B2)	85	scfm			
	Total influent concentration	1280.0	ppm			
	Blower Effluent Temperature (E-1)	128	degrees			
09/17/13	Influent flow vacuum (before knock out drum)	90	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	None drained = 5 gallons
	Vacuum after knockout drum - A2	60	in. of H ₂ O			
	Vacuum after air filter - A3	66	in. of H ₂ O			
	Pressure drop (A2-A3)	-6	in. of H ₂ O			
	Blower pressure after blower - A4	90	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	90	scfm			
	Blower effluent flow (B2)	90	scfm			
	Total influent concentration	2,590	ppm			
	Blower Effluent Temperature (E-1)	116	degrees			

Table 2A
Site Inspection
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Date	System Inspection	Readings	Units	System Maintenance		Other Comments
09/26/13	Influent flow vacuum (before knock out drum)	82	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	None drained = 5-10 gallons.
	Vacuum after knockout drum - A2	-50	in. of H ₂ O			
	Vacuum after air filter - A3	-58	in. of H ₂ O			
	Pressure drop (A2-A3)	8	in. of H ₂ O			
	Blower pressure after blower - A4	91	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	82	scfm			
	Blower effluent flow (B2)	91	scfm			
	Total influent concentration	2,730	ppm			
	Blower Effluent Temperature (E-1)	130	degrees			
10/02/13	Influent flow vacuum (before knock out drum)	84	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	None drained = 3 gallons
	Vacuum after knockout drum - A2	-51	in. of H ₂ O			
	Vacuum after air filter - A3	-58	in. of H ₂ O			
	Pressure drop (A2-A3)	-7	in. of H ₂ O			
	Blower pressure after blower - A4	100	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	84	scfm			
	Blower effluent flow (B2)	100	scfm			
	Total influent concentration	1,490	ppm			
	Blower Effluent Temperature (E-1)	134	degrees			
10/08/13	Influent flow vacuum (before knock out drum)	70	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	None drained = 2 gallons
	Vacuum after knockout drum - A2	-52	in. of H ₂ O			
	Vacuum after air filter - A3	-59	in. of H ₂ O			
	Pressure drop (A2-A3)	7	in. of H ₂ O			
	Blower pressure after blower - A4	88	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	70	scfm			
	Blower effluent flow (B2)	88	scfm			
	Total influent concentration	1,900	ppm			
	Blower Effluent Temperature (E-1)	130	degrees			
10/15/13	Influent flow vacuum (before knock out drum)	64	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	None drained = 1 gallons; changed out carbon drums. Replaced system air filter with new one! opened fresh air mix valve to achieve influent vacuum pressure of -36 hg (A1), upon restart
	Vacuum after knockout drum - A2	-36	in. of H ₂ O			
	Vacuum after air filter - A3	-44	in. of H ₂ O			
	Pressure drop (A2-A3)	-8	in. of H ₂ O			
	Blower pressure after blower - A4	115	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	64	scfm			
	Blower effluent flow (B2)	115	scfm			
	Total influent concentration	1,400	ppm			
	Blower Effluent Temperature (E-1)	115	degrees			

Table 2A
Site Inspection
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Date	System Inspection	Readings	Units	System Maintenance		Other Comments
10/22/13	Influent flow vacuum (before knock out drum)	56	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	None present
	Vacuum after knockout drum - A2	-38	in. of H ₂ O			
	Vacuum after air filter - A3	-44	in. of H ₂ O			
	Pressure drop (A2-A3)	-6	in. of H ₂ O			
	Blower pressure after blower - A4	120	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	56	scfm			
	Blower effluent flow (B2)	120	scfm			
	Total influent concentration	1,190	ppm			
	Blower Effluent Temperature (E-1)	1325	degrees			
10/25/13	Influent flow vacuum (before knock out drum)	18	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	None present; changed out both lag and lead carbons. Closed SVE-3 to 0 = fully closed; Closed SVE-2 to achieve 1/2 vac of system pull after bleed valve *~-30 in. Hg)
	Vacuum after knockout drum - A2	-58	in. of H ₂ O			
	Vacuum after air filter - A3	-63	in. of H ₂ O			
	Pressure drop (A2-A3)	-5	in. of H ₂ O			
	Blower pressure after blower - A4	80	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	18	scfm			
	Blower effluent flow (B2)	80	scfm			
	Total influent concentration	412	ppm			
	Blower Effluent Temperature (E-1)	118	degrees			
11/05/13	Influent flow vacuum (before knock out drum)	13	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	5 spent carbon drums picked up by OPTECH for disposal today
	Vacuum after knockout drum - A2	-54	in. of H ₂ O			
	Vacuum after air filter - A3	-62	in. of H ₂ O			
	Pressure drop (A2-A3)	-8	in. of H ₂ O			
	Blower pressure after blower - A4	94	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	13	scfm			
	Blower effluent flow (B2)	94	scfm			
	Total influent concentration	3,488	ppm			
	Blower Effluent Temperature (E-1)	120	degrees			
11/12/13	Influent flow vacuum (before knock out drum)	19	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	Changed air filter
	Vacuum after knockout drum - A2	-56	in. of H ₂ O			
	Vacuum after air filter - A3	-64	in. of H ₂ O			
	Pressure drop (A2-A3)	8	in. of H ₂ O			
	Blower pressure after blower - A4	82	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	19	scfm			
	Blower effluent flow (B2)	82	scfm			
	Total influent concentration	420	ppm			
	Blower Effluent Temperature (E-1)	110	degrees			

Table 2A
Site Inspection
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Date	System Inspection	Readings	Units	System Maintenance		Other Comments
11/19/13	Influent flow vacuum (before knock out drum)	39	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	
	Vacuum after knockout drum - A2	-56	in. of H ₂ O			
	Vacuum after air filter - A3	-62	in. of H ₂ O			
	Pressure drop (A2-A3)	6	in. of H ₂ O			
	Blower pressure after blower - A4	84	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	19	scfm			
	Blower effluent flow (B2)	84	scfm			
	Total influent concentration	360	ppm			
	Blower Effluent Temperature (E-1)	108	degrees			
12/03/13	Influent flow vacuum (before knock out drum)	18	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	
	Vacuum after knockout drum - A2	-56	in. of H ₂ O			
	Vacuum after air filter - A3	64	in. of H ₂ O			
	Pressure drop (A2-A3)	-8	in. of H ₂ O			
	Blower pressure after blower - A4	95	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	18	scfm			
	Blower effluent flow (B2)	95	scfm			
	Total influent concentration	324	ppm			
	Blower Effluent Temperature (E-1)	114	degrees			
12/18/13	Influent flow vacuum (before knock out drum)	32	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	3 gallons of water; changed out carbon
	Vacuum after knockout drum - A2	62	in. of H ₂ O			
	Vacuum after air filter - A3	70	in. of H ₂ O			
	Pressure drop (A2-A3)	8	in. of H ₂ O			
	Blower pressure after blower - A4	92	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	32	scfm			
	Blower effluent flow (B2)	92	scfm			
	Total influent concentration	246	ppm			
	Blower Effluent Temperature (E-1)	100	degrees			
12/31/13	Influent flow vacuum (before knock out drum)	16	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	
	Vacuum after knockout drum - A2	56	in. of H ₂ O			
	Vacuum after air filter - A3	66	in. of H ₂ O			
	Pressure drop (A2-A3)	10	in. of H ₂ O			
	Blower pressure after blower - A4	90	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	16	scfm			
	Blower effluent flow (B2)	90	scfm			
	Total influent concentration	260	ppm			
	Blower Effluent Temperature (E-1)	106	degrees			

Table 2A
Site Inspection
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Date	System Inspection	Readings	Units	System Maintenance		Other Comments
01/14/14	Influent flow vacuum (before knock out drum)	21	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	2-3 gallons; none drained
	Vacuum after knockout drum - A2	55	in. of H ₂ O			
	Vacuum after air filter - A3	65	in. of H ₂ O			
	Pressure drop (A2-A3)	-10	in. of H ₂ O			
	Blower pressure after blower - A4	78	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	21	scfm			
	Blower effluent flow (B2)	78	scfm			
	Total influent concentration	4,260	ppm			
	Blower Effluent Temperature (E-1)	105	degrees			
01/28/14	Influent flow vacuum (before knock out drum)	218	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	none
	Vacuum after knockout drum - A2	30	in. of H ₂ O			
	Vacuum after air filter - A3	64	in. of H ₂ O			
	Pressure drop (A2-A3)	-34	in. of H ₂ O			
	Blower pressure after blower - A4	80	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	218	scfm			
	Blower effluent flow (B2)	80	scfm			
	Total influent concentration	3,520	ppm			
	Blower Effluent Temperature (E-1)	86	degrees			
02/04/14	Influent flow vacuum (before knock out drum)	160	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	none
	Vacuum after knockout drum - A2	40	in. of H ₂ O			
	Vacuum after air filter - A3	52	in. of H ₂ O			
	Pressure drop (A2-A3)	12	in. of H ₂ O			
	Blower pressure after blower - A4	118	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	160	scfm			
	Blower effluent flow (B2)	118	scfm			
	Total influent concentration	2,680	ppm			
	Blower Effluent Temperature (E-1)	90	degrees			
02/11/14	Influent flow vacuum (before knock out drum)	92	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	none
	Vacuum after knockout drum - A2	40	in. of H ₂ O			
	Vacuum after air filter - A3	52	in. of H ₂ O			
	Pressure drop (A2-A3)	12	in. of H ₂ O			
	Blower pressure after blower - A4	110	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	92	scfm			
	Blower effluent flow (B2)	110	scfm			
	Total influent concentration	2,740	ppm			
	Blower Effluent Temperature (E-1)	88	degrees			

Table 2A
Site Inspection
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Date	System Inspection	Readings	Units	System Maintenance		Other Comments
02/18/14	Influent flow vacuum (before knock out drum)	145	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	25 Gal. of condensae frozen. Fresh air mix (bleed) valve was 30% open.
	Vacuum after knockout drum - A2	74	in. of H ₂ O			
	Vacuum after air filter - A3	82	in. of H ₂ O			
	Pressure drop (A2-A3)	8	in. of H ₂ O			
	Blower pressure after blower - A4	40	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	145	scfm			
	Blower effluent flow (B2)	40	scfm			
	Total influent concentration	1,345	ppm			
	Blower Effluent Temperature (E-1)	140	degrees			
02/25/14	Influent flow vacuum (before knock out drum)	112	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	10-15 gals. In knockout. Fresh air mix (bleed) valve was 30% open.
	Vacuum after knockout drum - A2	30	in. of H ₂ O			
	Vacuum after air filter - A3	40	in. of H ₂ O			
	Pressure drop (A2-A3)	10	in. of H ₂ O			
	Blower pressure after blower - A4	130	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	112	scfm			
	Blower effluent flow (B2)	130	scfm			
	Total influent concentration	960	ppm			
	Blower Effluent Temperature (E-1)	86	degrees			
03/04/14	Influent flow vacuum (before knock out drum)	140	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	10-15 gals. In knockout. Frozen.
	Vacuum after knockout drum - A2	40	in. of H ₂ O			
	Vacuum after air filter - A3	50	in. of H ₂ O			
	Pressure drop (A2-A3)	10	in. of H ₂ O			
	Blower pressure after blower - A4	128	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	140	scfm			
	Blower effluent flow (B2)	128	scfm			
	Total influent concentration	1,010	ppm			
	Blower Effluent Temperature (E-1)	84	degrees			
03/20/14	Influent flow vacuum (before knock out drum)	36	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	Blower pressure taken after fresh air mix valve. Blower influent taken before mix valve.
	Vacuum after knockout drum - A2	60	in. of H ₂ O			
	Vacuum after air filter - A3	70	in. of H ₂ O			
	Pressure drop (A2-A3)	10	in. of H ₂ O			
	Blower pressure after blower - A4	55	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	36	scfm			
	Blower effluent flow (B2)	55	scfm			
	Total influent concentration	548	ppm			
	Blower Effluent Temperature (E-1)	120	degrees			

Table 2A
Site Inspection
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Date	System Inspection	Readings	Units	System Maintenance		Other Comments
04/01/14	Influent flow vacuum (before knock out drum)	36	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	Approximately 10 gal in knockout drum
	Vacuum after knockout drum - A2	59	in. of H ₂ O			
	Vacuum after air filter - A3	69	in. of H ₂ O			
	Pressure drop (A2-A3)	10	in. of H ₂ O			
	Blower pressure after blower - A4	68	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	36	scfm			
	Blower effluent flow (B2)	68	scfm			
	Total influent concentration	390	ppm			
	Blower Effluent Temperature (E-1)	112	degrees			
04/22/14	Influent flow vacuum (before knock out drum)	47	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	Approximately 5 gal in knockout drum
	Vacuum after knockout drum - A2	54	in. of H ₂ O			
	Vacuum after air filter - A3	65	in. of H ₂ O			
	Pressure drop (A2-A3)	11	in. of H ₂ O			
	Blower pressure after blower - A4	72	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	47	scfm			
	Blower effluent flow (B2)	72	scfm			
	Total influent concentration	368	ppm			
	Blower Effluent Temperature (E-1)	120	degrees			
04/29/14	Influent flow vacuum (before knock out drum)	162	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	Yes	Approximately 15 gal in knockout drum
	Vacuum after knockout drum - A2	35	in. of H ₂ O			
	Vacuum after air filter - A3	48	in. of H ₂ O			
	Pressure drop (A2-A3)	13	in. of H ₂ O			
	Blower pressure after blower - A4	126	scfm	List Quantity of Condensate Drained (if applicable)	0	
	Blower influent flow (B1)	162	scfm			
	Blower effluent flow (B2)	126	scfm			
	Total influent concentration	1,340	ppm			
	Blower Effluent Temperature (E-1)	102	degrees			

NOTES:

scfm - standard cubic feet per minute

GAC - granular activated carbon

NA - Not applicable

NR - Not recorded

**Table 2B
Site Inspection
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York**

Date	System	Inspection	Readings	Units	System Maintenance		Other Comments
11/07/14	Extraction System	Influent flow vacuum (before knock out drum)	53.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	No condensate drained, 10 gallons in knock-out.
		Vacuum after knockout drum - A2	15	in. of H ₂ O			
		Vacuum after air filter - A3	15	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O			
		Blower influent flow (B1)	350	scfm	List Quantity of Condensate Drained (if applicable)		
		Blower effluent flow (B2)	350	scfm			
		Dilution Valve % Open	95	%			
		Blower Effluent Temperature (E-1)	78	degrees			
		Effluent PID reading	690	PPM			
	CAT/OX	Influent Temp	78	degrees			Dilution valve choked to 85-90% oprn, increased influent to the CAT/OX to 1050 PPM.
		Influent Flow	178	scfm			
		Influent PID	685	PPM			
		T1 reading	420	C °			
		T2 reading	444	C °			
		T3 reading	446	C °			
		Effluent PID reading	21	PPM			
11/12/14	Extraction System	Influent flow vacuum (before knock out drum)	64.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	No condensate drained, 5 gallons in knock-out.
		Vacuum after knockout drum - A2	10	in. of H ₂ O			
		Vacuum after air filter - A3	10	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O			
		Blower influent flow (B1)	184	scfm	List Quantity of Condensate Drained (if applicable)		
		Blower effluent flow (B2)	184	scfm			
		Dilution Valve % Open	85-90	%			
		Blower Effluent Temperature (E-1)	82	degrees			
		Effluent PID reading	940	PPM			
	CAT/OX	Influent Temp	82	degrees			Dilution valve choked very slightly to achieve PID input concentration of 1100 PPM
		Influent Flow	184	scfm			
		Influent PID	940	PPM			
		T1 reading	420	C °			
		T2 reading	451	C °			
		T3 reading	449	C °			
		Effluent PID reading	24	PPM			

Table 2B
Site Inspection
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Date	System	Inspection	Readings	Units	System Maintenance		Other Comments
11/20/14	Extraction System	Influent flow vacuum (before knock out drum)	98.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	11	in. of H ₂ O			
		Vacuum after air filter - A3	11	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O			
		Blower influent flow (B1)	190	scfm	List Quantity of Condensate Drained (if applicable)		
		Blower effluent flow (B2)	190	scfm			
		Dilution Valve % Open	85	%			
		Blower Effluent Temperature (E-1)	72.7	degrees			
		Effluent PID reading	959	PPM			
	CAT/OX	Influent Temp	72.7	degrees			
		Influent Flow	190	scfm			
		Influent PID	959	PPM			
		T1 reading	420	C °			
		T2 reading	451	C °			
		T3 reading	449	C °			
		Effluent PID reading	26	PPM			
12/03/14	Extraction System	Influent flow vacuum (before knock out drum)	94.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	14	in. of H ₂ O			
		Vacuum after air filter - A3	14	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O			
		Blower influent flow (B1)	192	scfm	List Quantity of Condensate Drained (if applicable)		
		Blower effluent flow (B2)	192	scfm			
		Dilution Valve % Open	80-85%	%			
		Blower Effluent Temperature (E-1)	79	degrees			
		Effluent PID reading	760	PPM			
	CAT/OX	Influent Temp	79	degrees			Dilution valve choked to 75% to achieve PID reading of 1100 PPM
		Influent Flow	192	scfm			
		Influent PID	760	PPM			
		T1 reading	420	C °			
		T2 reading	451	C °			
		T3 reading	449	C °			
		Effluent PID reading	21	PPM			

Table 2B
Site Inspection
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Date	System	Inspection	Readings	Units	System Maintenance		Other Comments
12/09/14	Extraction System	Influent flow vacuum (before knock out drum)	145.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	changed air filter for SVE system
		Vacuum after knockout drum - A2	18	in. of H ₂ O			
		Vacuum after air filter - A3	18	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O	List Quantity of Condensate Drained (if applicable)		
		Blower influent flow (B1)	180	scfm			
		Blower effluent flow (B2)	180	scfm			
		Dilution Valve % Open	75	%			
		Blower Effluent Temperature (E-1)	83	degrees			
		Effluent PID reading	1085	PPM			
	CAT/OX	Influent Temp	83	degrees			
		Influent Flow	180	scfm			
		Influent PID	1085	PPM			
		T1 reading	420	C °			
		T2 reading	455	C °			
		T3 reading	451	C °			
		Effluent PID reading	26.5	PPM			
12/16/14	Extraction System	Influent flow vacuum (before knock out drum)	108.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	18	in. of H ₂ O			
		Vacuum after air filter - A3	18	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O	List Quantity of Condensate Drained (if applicable)		
		Blower influent flow (B1)	175	scfm			
		Blower effluent flow (B2)	175	scfm			
		Dilution Valve % Open	75	%			
		Blower Effluent Temperature (E-1)	81.3	degrees			
		Effluent PID reading	960	PPM			
	CAT/OX	Influent Temp	81.3	degrees			
		Influent Flow	175	scfm			
		Influent PID	960	PPM			
		T1 reading	420	C °			
		T2 reading	454	C °			
		T3 reading	450	C °			
		Effluent PID reading	23.1	PPM			

Table 2B
Site Inspection
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Date	System	Inspection	Readings	Units	System Maintenance		Other Comments
01/07/15	Extraction System	Influent flow vacuum (before knock out drum)	86.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	17	in. of H ₂ O			
		Vacuum after air filter - A3	17	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O			
		Blower influent flow (B1)	195	scfm	List Quantity of Condensate Drained (if applicable)		
		Blower effluent flow (B2)	195	scfm			
		Dilution Valve % Open	75	%			
		Blower Effluent Temperature (E-1)	66	degrees			
		Effluent PID reading	695	PPM			
	CAT/OX	Influent Temp	66	degrees			
		Influent Flow	195	scfm			
		Influent PID	695	PPM			
		T1 reading	420	C °			
		T2 reading	448	C °			
		T3 reading	446	C °			
		Effluent PID reading	18.4	PPM			
01/14/15	Extraction System	Influent flow vacuum (before knock out drum)	135.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	25	in. of H ₂ O			
		Vacuum after air filter - A3	25	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O			
		Blower influent flow (B1)	170	scfm	List Quantity of Condensate Drained (if applicable)		
		Blower effluent flow (B2)	170	scfm			
		Dilution Valve % Open	60-65	%			
		Blower Effluent Temperature (E-1)	80	degrees			
		Effluent PID reading	915	PPM			
	CAT/OX	Influent Temp	80	degrees			Dilution valve choked to 60-65% to achieve PID reading of 1100 PPM
		Influent Flow	170	scfm			
		Influent PID	915	PPM			
		T1 reading	420	C °			
		T2 reading	453	C °			
		T3 reading	449	C °			
		Effluent PID reading	9.8	PPM			

Table 2B
Site Inspection
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Date	System	Inspection	Readings	Units	System Maintenance		Other Comments
01/22/15	Extraction System	Influent flow vacuum (before knock out drum)	130.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	25	in. of H ₂ O			
		Vacuum after air filter - A3	25	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O			
		Blower influent flow (B1)	170	scfm	List Quantity of Condensate Drained (if applicable)		
		Blower effluent flow (B2)	170	scfm			
		Dilution Valve % Open	60-65	%			
		Blower Effluent Temperature (E-1)	80	degrees			
		Effluent PID reading	915	PPM			
	CAT/OX	Influent Temp	80	degrees			
		Influent Flow	170	scfm			
		Influent PID	915	PPM			
		T1 reading	420	C °			
		T2 reading	453	C °			
		T3 reading	449	C °			
Effluent PID reading		19.8	PPM				
01/29/15	Extraction System	Influent flow vacuum (before knock out drum)	125.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	25	in. of H ₂ O			
		Vacuum after air filter - A3	25	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O			
		Blower influent flow (B1)	160	scfm	List Quantity of Condensate Drained (if applicable)		
		Blower effluent flow (B2)	160	scfm			
		Dilution Valve % Open	50	%			
		Blower Effluent Temperature (E-1)	78	degrees			
		Effluent PID reading	822	PPM			
	CAT/OX	Influent Temp	78	degrees			Dilution valve choked to 50% to achieve PID reading of 1100 PPM
		Influent Flow	160	scfm			
		Influent PID	822	PPM			
		T1 reading	420	C °			
		T2 reading	452	C °			
		T3 reading	448	C °			
Effluent PID reading		5.5	PPM				

Table 2B
Site Inspection
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Date	System	Inspection	Readings	Units	System Maintenance		Other Comments
02/25/15	Extraction System	Influent flow vacuum (before knock out drum)	130.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	Some condensate, but frozen
		Vacuum after knockout drum - A2	52	in. of H ₂ O			
		Vacuum after air filter - A3	52	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O	List Quantity of Condensate Drained (if applicable)		
		Blower influent flow (B1)	110	scfm			
		Blower effluent flow (B2)	110	scfm			
		Dilution Valve % Open	50	%			
		Blower Effluent Temperature (E-1)	92	degrees			
		Effluent PID reading	780	PPM			
	CAT/OX	Influent Temp	92	degrees			
		Influent Flow	110	scfm			
		Influent PID	780	PPM			
		T1 reading	420	C °			
		T2 reading	445	C °			
		T3 reading	444	C °			
		Effluent PID reading	9	PPM			
03/16/15	Extraction System	Influent flow vacuum (before knock out drum)	128.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	40	in. of H ₂ O			
		Vacuum after air filter - A3	40	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O	List Quantity of Condensate Drained (if applicable)		
		Blower influent flow (B1)	170	scfm			
		Blower effluent flow (B2)	170	scfm			
		Dilution Valve % Open	40-50	%			
		Blower Effluent Temperature (E-1)	84	degrees			
		Effluent PID reading	700	PPM			
	CAT/OX	Influent Temp	84	degrees			Dilution valve choked to 40-50% to achieve PID reading of 1100 PPM
		Influent Flow	170	scfm			
		Influent PID	700	PPM			
		T1 reading	420	C °			
		T2 reading	444	C °			
		T3 reading	447	C °			
		Effluent PID reading	13	PPM			

Table 2B
Site Inspection
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Date	System	Inspection	Readings	Units	System Maintenance		Other Comments
03/30/15	Extraction System	Influent flow vacuum (before knock out drum)	145.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	42	in. of H ₂ O			
		Vacuum after air filter - A3	42	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O			
		Blower influent flow (B1)	145	scfm	List Quantity of Condensate Drained (if applicable)		
		Blower effluent flow (B2)	156	scfm			
		Dilution Valve % Open	40-50	%			
		Blower Effluent Temperature (E-1)	86	degrees			
		Effluent PID reading	628	PPM			
	CAT/OX	Influent Temp	86	degrees			
		Influent Flow	156	scfm			
		Influent PID	628	PPM			
		T1 reading	420	C °			
		T2 reading	446	C °			
		T3 reading	445	C °			
Effluent PID reading		10.9	PPM				
04/08/15	Extraction System	Influent flow vacuum (before knock out drum)	140.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	42	in. of H ₂ O			
		Vacuum after air filter - A3	42	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O			
		Blower influent flow (B1)	160	scfm	List Quantity of Condensate Drained (if applicable)		
		Blower effluent flow (B2)	160	scfm			
		Dilution Valve % Open	40	%			
		Blower Effluent Temperature (E-1)	88.2	degrees			
		Effluent PID reading	639	PPM			
	CAT/OX	Influent Temp	88.2	degrees			Dilution valve choked to 40% to achieve PID reading of 1100 PPM
		Influent Flow	160	scfm			
		Influent PID	639	PPM			
		T1 reading	420	C °			
		T2 reading	445	C °			
		T3 reading	444	C °			
Effluent PID reading		12.5	PPM				

Table 2B
Site Inspection
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Date	System	Inspection	Readings	Units	System Maintenance		Other Comments
04/16/15	Extraction System	Influent flow vacuum (before knock out drum)	150.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	35	in. of H ₂ O			
		Vacuum after air filter - A3	35	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O	List Quantity of Condensate Drained (if applicable)		
		Blower influent flow (B1)	150	scfm			
		Blower effluent flow (B2)	150	scfm			
		Dilution Valve % Open	40	%			
		Blower Effluent Temperature (E-1)	99.5	degrees			
		Effluent PID reading	850	PPM			
	CAT/OX	Influent Temp	99.5	degrees			
		Influent Flow	150	scfm			
		Influent PID	850	PPM			
		T1 reading	420	C °			
		T2 reading	449	C °			
		T3 reading	446	C °			
		Effluent PID reading	15.8	PPM			
05/01/15	Extraction System	Influent flow vacuum (before knock out drum)	131.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	50	in. of H ₂ O			
		Vacuum after air filter - A3	50	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O	List Quantity of Condensate Drained (if applicable)		
		Blower influent flow (B1)	131	scfm			
		Blower effluent flow (B2)	131	scfm			
		Dilution Valve % Open	40	%			
		Blower Effluent Temperature (E-1)	102	degrees			
		Effluent PID reading	836	PPM			
	CAT/OX	Influent Temp	102	degrees			
		Influent Flow	131	scfm			
		Influent PID	836	PPM			
		T1 reading	420	C °			
		T2 reading	448	C °			
		T3 reading	445	C °			
		Effluent PID reading	15	PPM			

Table 2B
Site Inspection
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Date	System	Inspection	Readings	Units	System Maintenance		Other Comments
05/18/15	Extraction System	Influent flow vacuum (before knock out drum)	175.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	52	in. of H ₂ O			
		Vacuum after air filter - A3	52	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O	List Quantity of Condensate Drained (if applicable)		
		Blower influent flow (B1)	140	scfm			
		Blower effluent flow (B2)	140	scfm			
		Dilution Valve % Open	40	%			
		Blower Effluent Temperature (E-1)	114	degrees			
		Effluent PID reading	1674	PPM			
	CAT/OX	Influent Temp	114	degrees			
		Influent Flow	140	scfm			
		Influent PID	1674	PPM			
		T1 reading	419	C °			
		T2 reading	451	C °			
		T3 reading	443	C °			
		Effluent PID reading	23.8	PPM			
06/02/15	Extraction System	Influent flow vacuum (before knock out drum)	120.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	42	in. of H ₂ O			
		Vacuum after air filter - A3	42	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O	List Quantity of Condensate Drained (if applicable)		
		Blower influent flow (B1)	160	scfm			
		Blower effluent flow (B2)	160	scfm			
		Dilution Valve % Open	40	%			
		Blower Effluent Temperature (E-1)	103	degrees			
		Effluent PID reading	1520	PPM			
	CAT/OX	Influent Temp	103	degrees			
		Influent Flow	160	scfm			
		Influent PID	1520	PPM			
		T1 reading	420	C °			
		T2 reading	446	C °			
		T3 reading	443	C °			
		Effluent PID reading	43.8	PPM			

Table 2B
Site Inspection
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Date	System	Inspection	Readings	Units	System Maintenance		Other Comments
06/15/15	Extraction System	Influent flow vacuum (before knock out drum)	100.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	28	in. of H ₂ O			
		Vacuum after air filter - A3	28	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O			
		Blower influent flow (B1)	155	scfm	List Quantity of Condensate Drained (if applicable)		
		Blower effluent flow (B2)	155	scfm			
		Dilution Valve % Open	40	%			
		Blower Effluent Temperature (E-1)	108	degrees			
		Effluent PID reading	1050	PPM			
	CAT/OX	Influent Temp	108	degrees			
		Influent Flow	155	scfm			
		Influent PID	1050	PPM			
		T1 reading	420	C °			
		T2 reading	443	C °			
		T3 reading	440	C °			
		Effluent PID reading	23.2	PPM			
07/08/15	Extraction System	Influent flow vacuum (before knock out drum)	105.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	36	in. of H ₂ O			
		Vacuum after air filter - A3	36	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O			
		Blower influent flow (B1)	180	scfm	List Quantity of Condensate Drained (if applicable)		
		Blower effluent flow (B2)	180	scfm			
		Dilution Valve % Open	40	%			
		Blower Effluent Temperature (E-1)	109	degrees			
		Effluent PID reading	992	PPM			
	CAT/OX	Influent Temp	109	degrees			
		Influent Flow	180	scfm			
		Influent PID	992	PPM			
		T1 reading	420	C °			
		T2 reading	443	C °			
		T3 reading	440	C °			
		Effluent PID reading	27	PPM			

Table 2B
Site Inspection
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Date	System	Inspection	Readings	Units	System Maintenance		Other Comments
07/22/15	Extraction System	Influent flow vacuum (before knock out drum)	96.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	37	in. of H ₂ O			
		Vacuum after air filter - A3	37	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O			
		Blower influent flow (B1)	162	scfm	List Quantity of Condensate Drained (if applicable)		
		Blower effluent flow (B2)	162	scfm			
		Dilution Valve % Open	40	%			
		Blower Effluent Temperature (E-1)	112	degrees			
		Effluent PID reading	980	PPM			
	CAT/OX	Influent Temp	112	degrees			
		Influent Flow	162	scfm			
		Influent PID	980	PPM			
		T1 reading	420	C °			
		T2 reading	444	C °			
		T3 reading	441	C °			
		Effluent PID reading	22	PPM			
08/03/15	Extraction System	Influent flow vacuum (before knock out drum)	92.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	36	in. of H ₂ O			
		Vacuum after air filter - A3	36	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O			
		Blower influent flow (B1)	155	scfm	List Quantity of Condensate Drained (if applicable)		
		Blower effluent flow (B2)	155	scfm			
		Dilution Valve % Open	40	%			
		Blower Effluent Temperature (E-1)	114	degrees			
		Effluent PID reading	947	PPM			
	CAT/OX	Influent Temp	114	degrees			
		Influent Flow	155	scfm			
		Influent PID	947	PPM			
		T1 reading	420	C °			
		T2 reading	446	C °			
		T3 reading	441	C °			
		Effluent PID reading	21.5	PPM			

Table 2B
Site Inspection
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Date	System	Inspection	Readings	Units	System Maintenance		Other Comments
08/20/15	Extraction System	Influent flow vacuum (before knock out drum)	84.0	scfm	Check for Condensate in Knock Out (drain if necessary into drum)	yes	
		Vacuum after knockout drum - A2	36	in. of H ₂ O			
		Vacuum after air filter - A3	36	in. of H ₂ O			
		Pressure drop (A2-A3)	NA	in. of H ₂ O			
		Blower influent flow (B1)	150	scfm	List Quantity of Condensate Drained (if applicable)		
		Blower effluent flow (B2)	150	scfm			
		Dilution Valve % Open	40	%			
		Blower Effluent Temperature (E-1)	115	degrees			
		Effluent PID reading	910	PPM			
	CAT/OX	Influent Temp	115	degrees			
		Influent Flow	150	scfm			
		Influent PID	910	PPM			
		T1 reading	420	C °			
		T2 reading	448	C °			
		T3 reading	442	C °			
		Effluent PID reading	27	PPM			

NOTES:

scfm - standard cubic feet per minute

CAT/OX - catalytic oxidizer

NA - Not applicable

NR - Not recorded

Table 3A
PID and Velocity Readings
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Velocity (ft/min)	Valve position % open upon departure	Comments
SVE-1	08/22/13	0	NM	NM	0	System Start-up
	08/28/13	0	NM	NM	0	
	09/03/13	0	0.6	NM	0	Readings @ well head - static
	09/10/13	0	0.5	NM	0	Readings @ well head - static
	09/17/13	0	0.0	NM	0	Readings @ well head - static
	09/26/13	0	0.0	NM	0	Readings @ well head - static
	10/02/13	0	0.4	NM	0	Readings @ well head - static
	10/08/13	0	0.0	NM	0	Readings @ well head - static
	10/15/13	0	0.0	NM	0	Readings @ well head - static
	10/22/13	0	0.4	NM	0	Readings @ well head - static
	10/25/13	0	11.5	NM	0	Readings @ well head - static
	11/05/13	0	110.5	NM	0	Readings @ well head - static
	11/12/13	0	3.8	NM	0	Readings @ well head - static
	11/19/13	0	2.4	NM	0	Readings @ well head - static
	12/03/13	0	0.5	NM	0	Readings @ well head - static
	12/18/13	0	14.2	NM	0	Readings @ well head - static
	12/31/13	0	1.8	NM	0	Readings @ well head - static
	01/14/14	0	0.0	NM	0	Readings @ well head - static
	01/28/14	0	216	NM	100	Readings @ well head - static
	02/04/14	100	164.0	NM	100	Vent piping frozen
	02/11/14	100	11.4	NM	100	Vent piping frozen, no sample collected
	02/18/14	100	57.0	140	100	Sample Collected
	02/25/14	100	650.0	1030	100	Sample Collected
	03/04/14	100	127.0	NM	0	Vent piping frozen, no sample collected
	03/20/14	0	5.0	NM	0	Readings @ well head - static
	04/01/14	0	0.5	NM	0	Readings @ well head - static
	04/22/14	0	0.0	NM	0	Readings @ well head - static
	04/22/14	100	1350.0	425	100	Readings @ well head - static
	04/29/14	100	1290.0	420	100	End of Pilot Test #1

Table 3A
PID and Velocity Readings
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Velocity (ft/min)	Valve position % open upon departure	Comments
SVE-2	08/22/13	0	NM	NM	100	System Start-up
	08/28/13	100	NM	NM	100	reading taken pre blower- combined with SVE-3
	09/03/13	100	3,220	NM	100	sample collected
	09/10/13	100	1,920	NM	100	sample collected
	09/17/13	100	2,400	850	100	sample collected
	09/26/13	100	1,442	775	100	sample collected
	10/02/13	100	1,812	800	100	sample collected
	10/08/13	100	3,000	880	100	sample collected
	10/15/13	100	3,600	920	100	sample collected
	10/22/13	100	2,750	570	100	sample collected
	10/25/13	100	1,391	380	30	No sample collected
	11/05/13	30	15000+	500	30	sample collected
	11/12/13	30	2,804	400	30	No sample collected
	11/19/13	30	2,225	310	30	sample collected
	12/03/13	30	460	NM	30	sample collected
	12/18/13	30	385	330	30	sample collected
	12/31/13	30	297	960	30	sample collected
	01/14/14	30	6,707	650	30	sample collected
	01/28/14	30	1,195	675	100	sample collected
	02/04/14	100	578	780	100	collected combined influent sample
	02/11/14	100	856	600	100	sample collected
	02/18/14	100	720	146	100	Sample Collected
	02/25/14	100	208	470	100	sample collected
	03/04/14	100	668	430	100	sample collected
	03/20/14	100	710	1240	100	sample collected, readings at pump
	04/01/14	100	474	NM	100	sample collected
	04/22/14	100	790	2700	100	sample collected
	04/22/14	100	680	980	100	Readings @ well head - static
	04/29/14	100	680	1200	100	End of Pilot Test #1

Table 3A
PID and Velocity Readings
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Velocity (ft/min)	Valve position % open upon departure	Comments
SVE-3	08/22/13	0	NM	NM	100	System Start-up
	08/28/13	100	NM	NM	100	reading taken pre blower- combined with SVE-2
	09/03/13	100	1,840	NM	100	Sample collected
	09/10/13	100	890	NM	100	Sample collected
	09/17/13	100	2,090	2,700	100	Sample collected
	09/26/13	100	1,120	2,210	100	sample collected
	10/02/13	100	1,650	2,900	100	sample collected
	10/08/13	100	1,957	2,200	100	sample collected
	10/15/13	100	1,840	1,700	100	sample collected
	10/22/13	100	1,520	1,700	100	sample collected
	10/25/13	100	2,100	NM	0	No sample collected
	11/05/13	0	1,863	NM	0	No sample collected
	11/12/13	0	65.0	NM	0	No sample collected
	11/19/13	0	6.9	NM	0	No sample collected
	12/03/13	0	11.5	NM	0	No sample collected
	12/18/13	0	23.6	NM	0	No sample collected
	12/31/13	0	24.3	NM	0	No sample collected
	01/14/14	0	5.8	NM	0	No sample collected
	01/28/14	0	1,140	730	100	No sample collected
	02/04/14	100	1,067	1,380	100	collected combined influent sample
	02/11/14	100	766	450	100	Sample collected
	02/18/14	100	664	390	100	Sample collected
	02/25/14	100	662	730	100	Sample collected
	03/04/14	100	655	1,000	0	Sample Collected
	03/20/14	0	537	NM	0	Reading @ well head - static
	04/01/14	0	298	NM	0	Reading @ well head - static
	04/22/14	0	240	NM	100	Readings @ well head - static
	04/22/14	100	215	1,280	100	Readings @ well head - static
	04/29/14	100	673.0	1100	100	End of Pilot Test #1

Table 3A
PID and Velocity Readings
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Velocity (ft/min)	Valve position % open upon departure	Comments
SVE-4	08/22/13	0	NM	NM	0	System Start-up
	08/28/13	0	NM	NM	0	
	09/03/13	0	0.4	NM	0	Readings @ well head - static
	09/10/13	0	0.7	NM	0	Readings @ well head - static
	09/17/13	0	0.0	NM	0	Readings @ well head - static
	09/26/13	0	0.0	NM	0	Readings @ well head - static
	10/02/13	0	0.1	NM	0	Readings @ well head - static
	10/08/13	0	0.0	NM	0	Readings @ well head - static
	10/15/13	0	0.0	NM	0	Readings @ well head - static
	10/22/13	0	0.7	NM	0	Readings @ well head - static
	10/25/13	0	15.9	NM	0	Readings @ well head - static
	11/05/13	0	4.3	NM	0	Readings @ well head - static
	11/12/13	0	0.0	NM	0	Readings @ well head - static
	11/19/13	0	0.2	NM	0	Readings @ well head - static
	12/03/13	0	0.0	NM	0	Readings @ well head - static
	12/18/13	0	4.6	NM	0	Readings @ well head - static
	12/31/13	0	0	NM	0	Readings @ well head - static
	01/14/14	0	0.5	NM	0	Readings @ well head - static
	01/28/14	0	1,938	420	100	Readings @ well head - static
	02/04/14	100	2,100	1100	100	collected combined influent sample
	02/11/14	100	2,860	1140	100	Sample Collected
	02/18/14	100	1,350	460	100	Sample Collected
	02/25/14	100	504	900	100	Sample Collected
	03/04/14	100	1,166	1440	0	Sample Collected
	03/20/14	0	66	NM	0	Readings @ well head - static
	04/01/14	0	31	NM	0	Readings @ well head - static
	04/22/14	0	4.0	NM	100	Readings @ well head - static
	04/22/14	100	960	1750	100	Readings @ well head - static
	04/29/14	100	1,003	1500	100	End of Pilot Test #1

Table 3A
PID and Velocity Readings
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Velocity (ft/min)	Valve position % open upon departure	Comments
SVE-5	08/22/13	0	NM	NM	0	System Start-up
	08/28/13	0	NM	NM	0	
	09/03/13	0	0.0	NM	0	Readings @ well head - static
	09/10/13	0	1.2	NM	0	Readings @ well head - static
	09/17/13	0	0.0	NM	0	Readings @ well head - static
	09/26/13	0	0.0	NM	0	Readings @ well head - static
	10/02/13	0	0.0	NM	0	Readings @ well head - static
	10/08/13	0	0.0	NM	0	Readings @ well head - static
	10/15/13	0	0.0	NM	0	Readings @ well head - static
	10/22/13	0	0.3	NM	0	Readings @ well head - static
	10/25/13	0	0.0	NM	0	Readings @ well head - static
	11/05/13	0	2.1	NM	0	Readings @ well head - static
	11/12/13	0	0.0	NM	0	Readings @ well head - static
	11/19/13	0	0.0	NM	0	Readings @ well head - static
	12/03/13	0	0.0	NM	0	Readings @ well head - static
	12/18/13	0	0.0	NM	0	Readings @ well head - static
	12/31/13	0	0.0	NM	0	Readings @ well head - static
	01/14/14	0	0.0	NM	0	Readings @ well head - static
	01/28/14	0	520	680	100	Readings @ well head - static
	02/04/14	100	620	905	100	collected combined influent sample
	02/11/14	100	995	1040	100	Sample Collected
	02/18/14	100	713	370	100	Sample Collected
	02/25/14	100	600	720	100	Sample Collected
	03/04/14	100	676	850	0	Sample Collected
	03/20/14	0	6.0	NM	0	Readings @ well head - static
	04/01/14	0	4.5	NM	0	Readings @ well head - static
	04/22/14	0	1.5	NM	100	Readings @ well head - static
	04/22/14	100	260	1250	100	Readings @ well head - static
	04/29/14	100	745	1250	100	End of Pilot Test #1

Table 3A
PID and Velocity Readings
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Velocity (ft/min)	Valve position % open upon departure	Comments
SVE-6	08/22/13	0	NM	NM	0	System Start-up
	08/28/13	0	NM	NM	0	
	09/03/13	0	870	NM	0	Readings @ well head - static
	09/10/13	0	0.8	NM	0	Readings @ well head - static
	09/17/13	0	0.7	NM	0	Readings @ well head - static
	09/26/13	0	0.0	NM	0	Readings @ well head - static
	10/02/13	0	0.0	NM	0	Readings @ well head - static
	10/08/13	0	0.0	NM	0	Readings @ well head - static
	10/15/13	0	0.0	NM	0	Readings @ well head - static
	10/22/13	0	0.8	NM	0	Readings @ well head - static
	10/25/13	0	0.4	NM	0	Readings @ well head - static
	11/05/13	0	13.0	NM	0	Readings @ well head - static
	11/12/13	0	0.0	NM	0	Readings @ well head - static
	11/19/13	0	0.7	NM	0	Readings @ well head - static
	12/03/13	0	1.1	NM	0	Readings @ well head - static
	12/18/13	0	370	NM	0	Readings @ well head - static
	12/31/13	0	0.9	NM	0	Readings @ well head - static
	01/14/14	0	1.4	NM	0	Readings @ well head - static
	01/28/14	0	1,350	470	100	Readings @ well head - static
	02/04/14	100	360	460	100	Collected combined influent sample
	02/11/14	100	65	1150	100	Sample Collected
	02/18/14	100	893	240	100	Sample Collected
	02/25/14	100	710	400	100	Sample Collected
	03/04/14	100	712	780	0	Sample Collected
	03/20/14	0	19	NM	0	Readings @ well head - static
	04/01/14	0	6.4	NM	0	Readings @ well head - static
	04/22/14	0	5	NM	100	Readings @ well head - static
	04/22/14	100	1,340	740	100	Readings @ well head - static
	04/29/14	100	1,850	720	100	End of Pilot Test #1

Table 3A
PID and Velocity Readings
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Velocity (ft/min)	Valve position % open upon departure	Comments
SVE-7	08/22/13	0	NM	NM	0	System Start-up
	08/28/13	0	NM	NM	0	
	09/03/13	0	907	NM	0	Readings @ well head - static
	09/10/13	0	32	NM	0	Readings @ well head - static
	09/17/13	0	21	NM	0	Readings @ well head - static
	09/26/13	0	8.2	NM	0	Readings @ well head - static
	10/02/13	0	9.5	NM	0	Readings @ well head - static
	10/08/13	NA	3.7	NA	NA	Readings @ well head - static
	10/15/13	0	6.7	NM	0	Readings @ well head - static
	10/22/13	0	5.0	NM	0	Readings @ well head - static
	10/25/13	0	77	NM	0	Readings @ well head - static
	11/05/13	0	796	NM	0	Readings @ well head - static
	11/12/13	0	62.6	NM	0	Readings @ well head - static
	11/19/13	0	5.1	NM	0	Readings @ well head - static
	12/03/13	0	120	NM	0	Readings @ well head - static
	12/18/13	0	220	NM	0	Readings @ well head - static
	12/31/13	0	14.4	NM	0	Readings @ well head - static
	01/14/14	0	12.4	NM	0	Readings @ well head - static
	01/28/14	0	207	NM	100	Readings @ well head - static
	02/04/14	100	3.4	NM	100	Vent piping frozen
	02/11/14	100	0.8	NM	100	Vent piping frozen, no sample collected
	02/18/14	100	96	200	100	Sample Collected
	02/25/14	100	540	500	100	Sample Collected
	03/04/14	100	560	NM	0	Vent piping frozen, no sample collected
	03/20/14	0	78	NM	0	Readings @ well head - static
	04/01/14	0	27	NM	0	Readings @ well head - static
	04/22/14	0	18	NM	100	Readings @ well head - static
	04/22/14	100	1860	402	100	Readings @ well head - static
	04/29/14	100	695	420	100	End of Pilot Test #1

Table 3A
PID and Velocity Readings
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Velocity (ft/min)	Valve position % open upon departure	Comments
VOW-1	08/22/13	NA	NA	NA	NA	System Start-up
	08/28/13	NA	NA	NA	NA	
	09/03/13	NA	0.0	NA	NA	Readings @ well head - static
	09/10/13	NA	0.0	NA	NA	Readings @ well head - static
	09/17/13	NA	0.0	NA	NA	Readings @ well head - static
	09/26/13	NA	0.0	NA	NA	Readings @ well head - static
	10/02/13	NA	0.0	NA	NA	Readings @ well head - static
	10/08/13	NA	0.0	NA	NA	Readings @ well head - static
	10/15/13	NA	0.2	NA	NA	Readings @ well head - static
	10/22/13	NA	0.0	NA	NA	Readings @ well head - static
	10/25/13	NA	0.0	NA	NA	Readings @ well head - static
	11/05/13	NA	0.8	NA	NA	Readings @ well head - static
	11/12/13	NA	0.0	NA	NA	Readings @ well head - static
	11/19/13	NA	0.0	NA	NA	Readings @ well head - static
	12/03/13	NA	0.0	NA	NA	Readings @ well head - static
	12/18/13	NA	0.0	NA	NA	Readings @ well head - static
	12/31/13	NA	0.0	NA	NA	Readings @ well head - static
	01/14/14	NA	0.0	NA	NA	Readings @ well head - static
	01/28/14	NA	2.5	NA	NA	Readings @ well head - static
	02/04/14	NA	0.0	NA	NA	Readings @ well head - static
	02/11/14	NA	0.0	NA	NA	Readings @ well head - static
	02/18/14	NA	0.7	NA	NA	Readings @ well head - static
	02/25/14	NA	0.0	NA	NA	Readings @ well head - static
	03/04/14	NA	0.0	NA	NA	Readings @ well head - static
	03/20/14	NA	0.0	NA	NA	Readings @ well head - static
	04/01/14	NA	0.0	NA	NA	Readings @ well head - static
	04/22/14	NA	0.0	NA	NA	Readings @ well head - static
	04/29/14	NA	0.7	NA	NA	End of Pilot Test #1

Table 3A
PID and Velocity Readings
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Velocity (ft/min)	Valve position % open upon departure	Comments
VOW-2	08/22/13	NA	NA	NA	NA	System Start-up
	08/28/13	NA	NA	NA	NA	
	09/03/13	NA	360	NA	NA	Readings @ well head - static
	09/10/13	NA	7.2	NA	NA	Readings @ well head - static
	09/17/13	NA	35	NA	NA	Readings @ well head - static
	09/26/13	NA	0.0	NA	NA	Readings @ well head - static
	10/02/13	NA	1.5	NA	NA	Readings @ well head - static
	10/08/13	NA	0.6	NA	NA	Readings @ well head - static
	10/15/13	NA	0.0	NA	NA	Readings @ well head - static
	10/22/13	NA	0.7	NA	NA	Readings @ well head - static
	10/25/13	NA	13.8	NA	NA	Readings @ well head - static
	11/05/13	NA	97.3	NA	NA	Readings @ well head - static
	11/12/13	NA	11.6	NA	NA	Readings @ well head - static
	11/19/13	NA	8.0	NA	NA	Readings @ well head - static
	12/03/13	NA	3.2	NA	NA	Readings @ well head - static
	12/18/13	NA	13.2	NA	NA	Readings @ well head - static
	12/31/13	NA	3.8	NA	NA	Readings @ well head - static
	01/14/14	NA	18.2	NA	NA	Readings @ well head - static
	01/28/14	NA	22	NA	NA	Readings @ well head - static
	02/04/14	NA	2.4	NA	NA	Readings @ well head - static
	02/11/14	NA	0.0	NA	NA	Readings @ well head - static
	02/18/14	NA	3.3	NA	NA	Readings @ well head - static
	02/25/14	NA	0.0	NA	NA	Readings @ well head - static
	03/04/14	NA	0.0	NA	NA	Readings @ well head - static
	03/20/14	NA	0.0	NA	NA	Readings @ well head - static
	04/01/14	NA	0.0	NA	NA	Readings @ well head - static
	04/22/14	NA	0.0	NA	NA	Readings @ well head - static
	04/29/14	NA	0.7	NA	NA	End of Pilot Test #1

Notes

NM: Not measured

NA: Not applicable

Table 3B
PID and Velocity Readings
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Flow Rate (ft^3/min)	Valve position % open upon departure	Comments
SVE-1	10/30/14	100	NA	NA	100	begin pilot test 2
	11/07/14	100	1470	157	100	
	11/12/14	100	520	170	100	
	11/20/14	100	1040	200	100	
	12/03/14	100	860	320	100	
	12/09/14	100	790	240	100	
	12/16/14	100	870	280	100	
	01/07/15	100	1100	350	100	
	01/14/15	100	640	380	100	
	01/22/15	100	540	780	100	
	01/29/15	100	460	400	100	
	02/25/15	100	200	580	100	
	03/16/15	100	490	470	100	
	03/30/15	100	320	540	100	
	04/08/15	100	403	540	100	
	04/16/15	100	380	510	100	
	05/01/15	100	460	600	100	
	05/18/15	100	1812	400	100	
	06/02/15	100	2390	400	100	
	06/15/15	100	3200	580	100	
	07/08/15	100	625	450	100	
	07/22/15	100	1400	430	100	
	08/03/15	100	2600	400	100	
	08/20/15	100	1000	380	100	end pilot test

Table 3B
PID and Velocity Readings
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Flow Rate (ft ³ /min)	Valve position % open upon departure	Comments
SVE-2	10/30/14	100	NA	NA	100	begin pilot test 2
	11/07/14	100	1860	245	100	
	11/12/14	100	1596	270	100	
	11/20/14	100	1485	230	100	
	12/03/14	100	940	360	100	
	12/09/14	100	850	510	100	
	12/16/14	100	828	510	100	
	01/07/15	100	380	370	100	
	01/14/15	100	450	450	100	
	01/22/15	100	570	630	100	
	01/29/15	100	522	630	100	
	02/25/15	100	380	500	100	
	03/16/15	100	290	630	100	
	03/30/15	100	380	730	100	
	04/08/15	100	310	810	100	
	04/16/15	100	315	920	100	
	05/01/15	100	295	1000	100	
	05/18/15	100	485	960	100	
	06/02/15	100	640	530	100	
	06/15/15	100	450	650	100	
	07/08/15	100	560	660	100	
	07/22/15	100	320	800	100	
	08/03/15	100	670	720	100	
	08/20/15	100	500	700	100	end pilot test

Table 3B
PID and Velocity Readings
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Flow Rate (ft ³ /min)	Valve position % open upon departure	Comments
SVE-3	10/30/14	100	NA	NA	100	begin pilot test 2
	11/07/14	100	1110	360	100	
	11/12/14	100	940	380	100	
	11/20/14	100	1170	610	100	
	12/03/14	100	1020	550	100	
	12/09/14	100	860	730	100	
	12/16/14	100	1210	630	100	
	01/07/15	100	500	480	100	
	01/14/15	100	900	1300	100	
	01/22/15	100	790	720	100	
	01/29/15	100	780	900	100	
	02/25/15	100	600	360	100	
	03/16/15	100	630	730	100	
	03/30/15	100	530	330	100	
	04/08/15	100	602	740	100	
	04/16/15	100	470	960	100	
	05/01/15	100	450	820	100	
	05/18/15	100	970	600	100	
	06/02/15	100	1260	600	100	
	06/15/15	100	540	650	100	
	07/08/15	100	1120	550	100	
	07/22/15	100	830	700	100	
	08/03/15	100	1280	640	100	
	08/20/15	100	900	600	100	end pilot test

Table 3B
PID and Velocity Readings
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Flow Rate (ft ³ /min)	Valve position % open upon departure	Comments
SVE-4	10/30/14	100	NA	NA	100	begin pilot test 2
	11/07/14	100	4680	480	100	
	11/12/14	100	4680	680	100	
	11/20/14	100	4436	660	100	
	12/03/14	100	3100	780	100	
	12/09/14	100	2300	1240	100	
	12/16/14	100	2995	1250	100	
	01/07/15	100	1360	900	100	
	01/14/15	100	2200	650	100	
	01/22/15	100	1740	1550	100	
	01/29/15	100	1510	1550	100	
	02/25/15	100	1300	1100	100	
	03/16/15	100	1115	1650	100	
	03/30/15	100	1050	1500	100	
	04/08/15	100	1172	1620	100	
	04/16/15	100	1040	1960	100	
	05/01/15	100	1000	1600	100	
	05/18/15	100	870	1500	100	
	06/02/15	100	1340	1220	100	
	06/15/15	100	680	1300	100	
	07/08/15	100	2300	1200	100	
	07/22/15	100	1700	1380	100	
	08/03/15	100	2520	1200	100	
	08/20/15	100	1000	1100	100	end pilot test

Table 3B
PID and Velocity Readings
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Flow Rate (ft ³ /min)	Valve position % open upon departure	Comments
SVE-5	10/30/14	100	NA	NA	100	begin pilot test 2
	11/07/14	100	834	260	100	
	11/12/14	100	720	460	100	
	11/20/14	100	580	570	100	
	12/03/14	100	410	570	100	
	12/09/14	100	380	1100	100	
	12/16/14	100	370	670	100	
	01/07/15	100	230	600	100	
	01/14/15	100	220	620	100	
	01/22/15	100	175	860	100	
	01/29/15	100	160	850	100	
	02/25/15	100	140	600	100	
	03/16/15	100	170	820	100	
	03/30/15	100	130	1050	100	
	04/08/15	100	108	970	100	
	04/16/15	100	160	1350	100	
	05/01/15	100	190	1200	100	
	05/18/15	100	420	1200	100	
	06/02/15	100	480	900	100	
	06/15/15	100	315	900	100	
	07/08/15	100	475	760	100	
	07/22/15	100	330	820	100	
	08/03/15	100	370	760	100	
	08/20/15	100	160	700	100	end pilot test

Table 3B
PID and Velocity Readings
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Flow Rate (ft ³ /min)	Valve position % open upon departure	Comments
SVE-6	10/30/14	100	NA	NA	100	begin pilot test 2
	11/07/14	100	7580	100	100	
	11/12/14	100	3700	200	100	
	11/20/14	100	2650	140	100	
	12/03/14	100	1340	280	100	
	12/09/14	100	1590	550	100	
	12/16/14	100	1360	318	100	
	01/07/15	100	1300	330	100	
	01/14/15	100	890	380	100	
	01/22/15	100	765	480	100	
	01/29/15	100	760	450	100	
	02/25/15	100	700	370	100	
	03/16/15	100	670	470	100	
	03/30/15	100	610	500	100	
	04/08/15	100	470	530	100	
	04/16/15	100	690	780	100	
	05/01/15	100	870	700	100	
	05/18/15	100	2140	650	100	
	06/02/15	100	1760	460	100	
	06/15/15	100	1720	700	100	
	07/08/15	100	1340	480	100	
	07/22/15	100	900	450	100	
	08/03/15	100	2060	400	100	
	08/20/15	100	1300	400	100	end pilot test

Table 3B
PID and Velocity Readings
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Flow Rate (ft ³ /min)	Valve position % open upon departure	Comments
SVE-7	10/30/14	100	NA	NA	100	begin pilot test 2
	11/07/14	100	740	110	100	
	11/12/14	100	618	150	100	
	11/20/14	100	684	160	100	
	12/03/14	100	530	180	100	
	12/09/14	100	525	170	100	
	12/16/14	100	680	220	100	
	01/07/15	100	350	220	100.0	
	01/14/15	100	260	360	100	
	01/22/15	100	320	280	100	
	01/29/15	100	345	400	100	
	02/25/15	100	220	580	100	
	03/16/15	100	260	600	100	
	03/30/15	100	300	400	100	
	04/08/15	100	214	520	100	
	04/16/15	100	340	470	100	
	05/01/15	100	403	550	100	
	05/18/15	100	1150	470	100	
	06/02/15	100	800	380	100	
	06/15/15	100	840	460	100	
	07/08/15	100	1750	270	100	
	07/22/15	100	1730	360	100	
	08/03/15	100	1780	300	100	
	08/20/15	100	1300	300	100	end pilot test

Table 3B
PID and Velocity Readings
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Flow Rate (ft ³ /min)	Valve position % open upon departure	Comments
VOW-1	10/30/14	NA	NA	NA	NA	begin pilot test 2
	11/07/14	NA	7	NA	NA	
	11/12/14	NA	0	NA	NA	
	11/20/14	NA	0.9	NA	NA	
	12/03/14	NA	0	NA	NA	
	12/09/14	NA	0	NA	NA	
	12/16/14	NA	0	NA	NA	
	01/07/15	NA	0	NA	NA	
	01/14/15	NA	0	NA	NA	
	01/22/15	NA	0	NA	NA	
	01/29/15	NA	0	NA	NA	
	02/25/15	NA	0	NA	NA	
	03/16/15	NA	0	NA	NA	
	03/30/15	NA	0	NA	NA	
	04/08/15	NA	0	NA	NA	
	04/16/15	NA	0	NA	NA	
	05/01/15	NA	0	NA	NA	
	05/18/15	NA	0	NA	NA	
	06/02/15	NA	0	NA	NA	
	06/15/15	NA	0	NA	NA	
	07/08/15	NA	0	NA	NA	
	07/22/15	NA	0	NA	NA	
	08/03/15	NA	0	NA	NA	
	08/20/15	NA	0	NA	NA	end pilot test

Table 3B
PID and Velocity Readings
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Well ID	Date	Valve position % open upon arrival	PID (ppm)	Flow Rate (ft ³ /min)	Valve position % open upon departure	Comments
VOW-2	10/30/14	NA	NA	NA	NA	begin pilot test 2
	11/07/14	NA	0	NA	NA	
	11/12/14	NA	0	NA	NA	
	11/20/14	NA	2.1	NA	NA	
	12/03/14	NA	0	NA	NA	
	12/09/14	NA	0	NA	NA	
	12/16/14	NA	0	NA	NA	
	01/07/15	NA	0	NA	NA	
	01/14/15	NA	0	NA	NA	
	01/22/15	NA	0	NA	NA	
	01/29/15	NA	0	NA	NA	
	02/25/15	NA	0	NA	NA	
	03/16/15	NA	0	NA	NA	
	03/30/15	NA	0	NA	NA	
	04/08/15	NA	0	NA	NA	
	04/16/15	NA	0	NA	NA	
	05/01/15	NA	0	NA	NA	
	05/18/15	NA	0	NA	NA	
	06/02/15	NA	0	NA	NA	
	06/15/15	NA	0	NA	NA	
	07/08/15	NA	0	NA	NA	
	07/22/15	NA	0	NA	NA	
	08/03/15	NA	0	NA	NA	
	08/20/15	NA	0	NA	NA	end pilot test

Notes

NM: Not measured

NA: Not applicable

Table 4A
Air Analytical Data
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Sample ID	Date	PCE	TCE	Cis-1,2-DCE	VC	Units
SVE-1 INFLUENT	2/4/2014	*	*	*	*	ug/m ³
	2/11/2014	NS	NS	NS	NS	ug/m ³
	2/18/2014	110,000	1,200	1,400	9,100 U	ug/m ³
	2/25/2014	1,300,000	41,000	68,000	2,000 U	ug/m ³
	4/29/2014	2,500,000	49,000	39,000	2,000 U	ug/m ³
SVE-2 INFLUENT	09/03/13	19,000,000 D	440,000	160,000	7,300 U	ug/m ³
	09/10/13	6,800,000	140,000	74,000	10,000 U	ug/m ³
	09/17/13	5,600,000	110,000	57,000	7,500 U	ug/m ³
	09/26/13	5,400,000	100,000	61,000 J	10,000 U	ug/m ³
	10/02/13	5,500,000	86,000	46,000	6,000 U	ug/m ³
	10/08/13	5,700,000	93,000	54,000	6,000 U	ug/m ³
	10/15/13	5,700,000	93,000	60,000	6,000 U	ug/m ³
	10/22/13	4,700,000	75,000	49,000	6,000 U	ug/m ³
	11/05/13	4,000,000	62,000	46,000	5,000 U	ug/m ³
	11/19/13	4,000,000	57,000	47,000	4,300 U	ug/m ³
	12/03/13	3,800,000	54,000	44,000	5,000 U	ug/m ³
	12/18/13	2,400,000	43,000	37,000	5,000 U	ug/m ³
	12/31/13	2,100,000	32,000	29,000	3,000 U	ug/m ³
	01/14/14	2,800,000	43,000	33,000	3,000 U	ug/m ³
	01/28/14	2,600,000	40,000	30,000	3,000 U	ug/m ³
	02/04/14	NS	NS	NS	NS	ug/m ³
	02/11/14	2,000,000	27,000	22,000	3,000 U	ug/m ³
	02/18/14	1,400,000	20,000	18,000	1,600 U	ug/m ³
	02/25/14	1,400,000	21,000	19,000	2,000 U	ug/m ³
	03/04/14	1,200,000	19,000	16,000	2,000 U	ug/m ³
	03/20/14	1,300,000	20,000	14,000	1,200 U	ug/m ³
	04/01/14	1,000,000	17,000	13,000	1,500 U	ug/m ³
	04/22/14	1,300,000	21,000	13,000	1,800 U	ug/m ³
	04/29/14	1,200,000	15,000	7,000 J	2,000 U	ug/m ³

Table 4A
Air Analytical Data
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Sample ID	Date	PCE	TCE	Cis-1,2-DCE	VC	Units
SVE-3 INFLUENT	09/03/13	3,800,000	100,000	30,000	3,800 U	ug/m ³
	09/10/13	3,700,000	80,000	25,000 J	4,600 U	ug/m ³
	09/17/13	3,000,000	71,000	22,000 J	4,600 U	ug/m ³
	09/26/13	3,800,000	72,000	22,000 J	6,700 U	ug/m ³
	10/02/13	3,600,000	67,000	18,000 J	6,700 U	ug/m ³
	10/08/13	3,900,000	64,000	20,000 J	6,000 U	ug/m ³
	10/15/13	3,100,000	53,000	18,000 J	6,000 U	ug/m ³
	10/22/13	3,200,000	50,000	15,000 J	4,300 U	ug/m ³
	02/04/14	*	*	*	*	ug/m ³
	02/11/14	1,400,000	15,000	3,400 J	2,000 U	ug/m ³
	02/18/14	1,000,000	14,000	3,700	1,500 U	ug/m ³
	02/25/14	1,100,000	14,000	3,800 J	2,000 U	ug/m ³
	03/04/14	1,000,000	15,000	3,400 J	2,000 U	ug/m ³
	04/29/14	760,000	7,100	1,100 J	1,300 U	ug/m ³
SVE-4 INFLUENT	02/04/14	*	*	*	*	ug/m ³
	02/11/14	5,900,000	120,000	28,000 J	7,500 U	ug/m ³
	02/18/14	5,500,000	86,000	19,000	1,500 U	ug/m ³
	02/18/14	3300000 D	70000 D	19,000 DJ	6,700 U	ug/m ³
	02/25/14	3,300,000	66,000	19,000 J	6,000 U	ug/m ³
	03/04/14	2,900,000	58,000	15,000 J	3,000 U	ug/m ³
	04/29/14	2,200,000	27,000	5,400 J	3,500 U	ug/m ³
SVE-5 INFLUENT	02/04/14	*	*	*	*	ug/m ³
	02/11/14	2,200,000	10,000	3,500 J	4,300 U	ug/m ³
	02/18/14	1,400,000	6,900	2,200 J	2,000 U	ug/m ³
	02/25/14	1,500,000	7,100	2,300 J	2,000 U	ug/m ³
	03/04/14	1,600,000	7,800	2,600 J	2,000 U	ug/m ³
	04/29/14	1,500,000	4,400	18,000 U	2,400 U	ug/m ³
SVE-6 INFLUENT	02/04/14	*	*	*	*	ug/m ³
	02/11/14	3,300,000	76,000	47,000	4,300 U	ug/m ³
	02/18/14	1,800,000	47,000	33,000	2,600 U	ug/m ³
	02/25/14	2,400,000	70,000	42,000	4,300 U	ug/m ³
	03/04/14	1,800,000	47,000	30,000	3,000 U	ug/m ³
	04/29/14	2,800,000	58,000	51,000	3,500 U	ug/m ³
SVE-7 INFLUENT	02/04/14	*	*	*	*	ug/m ³
	02/11/14	NS	NS	NS	NS	ug/m ³
	02/18/14	190,000	7,700	20,000	260 U	ug/m ³
	02/25/14	940,000	45,000	120,000	1,100 U	ug/m ³
	04/29/14	1,000,000	33,000	77,000	1,700 U	ug/m ³

Table 4A
Air Analytical Data
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Sample ID	Date	PCE	TCE	Cis-1,2-DCE	VC	Units
Mid-GAC	09/26/16	1,100	17	7.0 J	1.5 U	ug/m ³
	10/02/13	3,200,000	55,000	21,000 J	6,000 U	ug/m ³
	10/08/13	2,900,000	53,000	21,000 J	4,000 U	ug/m ³
	10/15/13	12,000	98	30 J	14 U	ug/m ³
	10/22/13	1,900,000	29,000	14,000 J	3,300 U	ug/m ³
	11/05/13	600,000	11,000	7,800	900 U	ug/m ³
	11/19/13	790,000	8,100	6400 J	1,300 U	ug/m ³
	12/03/13	640,000	6,800	5300 J	1,100 U	ug/m ³
	12/18/13	580,000	6,100	4600 J	1,000 U	ug/m ³
	12/31/13	340,000	4,000	3,000 J	550 U	ug/m ³
	01/14/14	700,000	6,500	4,700 J	860 U	ug/m ³
	01/28/14	330	1.1	0.46 J	0.46 U	ug/m ³
	02/04/14	3,400,000	59,000	23,000 J	4,000 U	ug/m ³
	02/11/14	410	6.1	2.2 J	0.60 U	ug/m ³
	02/18/14	3,800,000	44,000	24,000 J	4,600 U	ug/m ³
	02/25/14	1,700,000	29,000	13,000 J	2,400 U	ug/m ³
	03/04/14	1,500,000	28,000	13,000 J	2,400 U	ug/m ³
	03/20/14	820,000	8,000	5,800 J	1,000 U	ug/m ³
	04/01/14	660,000	7,100	5,100 J	750 U	ug/m ³
	04/22/14	640,000	9,600	5,600 J	1,200 U	ug/m ³
	04/29/14	2,100,000	21,000	11,000 J	4,000 U	ug/m ³

Table 4A
Air Analytical Data
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Sample ID	Date	PCE	TCE	Cis-1,2-DCE	VC	Units
EFFLUENT	09/03/13	1,600,000	32,000	11,000	3,000 U	ug/m ³
	09/10/13	3,600,000	79,000	32,000 J	4,600 U	ug/m ³
	09/17/13	3,300,000	67,000	28,000 J	4,600 U	ug/m ³
	09/26/13	3800	27	12 J	5.0 U	ug/m ³
	10/02/13	3,800,000	58,000	21,000 J	6,000 U	ug/m ³
	10/08/13	3,300,000	52,000	20,000 J	4,000 U	ug/m ³
	10/15/13	6,800	41	12 J	8.2 U	ug/m ³
	10/22/13	3,200,000	33,000	13,000 J	4,000 U	ug/m ³
	11/05/13	29,000	200	99 J	30 U	ug/m ³
	11/19/13	590,000	9,400	7,400 J	1,300 U	ug/m ³
	12/03/13	720,000	7,000	5,000 J	1,000 U	ug/m ³
	12/18/13	5,000	24	11 J	8.6 U	ug/m ³
	12/31/13	160,000	15,000	10000	270 U	ug/m ³
	01/14/14	4,600	22	12 J	8 U	ug/m ³
	01/28/14	370	1.4	0.54 J	0.50 U	ug/m ³
	02/04/14	4,500,000	70,000	24,000 U	4,000 J	ug/m ³
	02/11/14	1,200	5.2	2.1 J	1.5 U	ug/m ³
	02/18/14	5,000,000	65,000	28,000 J	4,600 U	ug/m ³
	02/25/14	1,500,000	24,000	11,000 J	2,400 U	ug/m ³
	03/04/14	1,900,000	33,000	13,000 J	2,400 U	ug/m ³
	03/20/14	510,000	39,000	19,000	600 U	ug/m ³
	04/01/14	690,000	7,200	5,200 J	860 U	ug/m ³
	04/22/14	310,000	3,500	1,900 J	460 U	ug/m ³
	04/29/14	1,900,000	21,000	13,000 J	3,300 U	ug/m ³
* INFLUENT COMBINED	2/4/2014	3,100,000	52,000	20,000 J	3,300 U	ug/m ³

Notes:

U - Indicates that the compound was not detected at the indicated detection limit.

J - Indicates that compound is reported at an estimated concentration below the detection limit.

Table 4B
Air Analytical Data
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Sample ID	Date	PCE	TCE	Cis-1,2-DCE	VC	Units
SVE-1 INFLUENT	11/7/2014	1,600,000	120,000	160,000	1,100 U	ug/m ³
	11/12/2014	3,100,000	68,000	6,200	960 U	ug/m ³
	11/20/2014	3,700,000	58,000	44,000	2,400 U	ug/m ³
	12/3/2014	1,100,000	32,000	79 U	51 U	ug/m ³
	12/9/2014	2,400,000	46,000	34,000	510 U	ug/m ³
	12/16/2014	940,000	12,000	9,000	510 U	ug/m ³
	1/7/2015	680,000	9,100	6,000	510 U	ug/m ³
	1/14/2015	2,500,000	39,000	30,000	510 U	ug/m ³
	1/22/2015	1,500,000	21,000	16,000	510 U	ug/m ³
	1/29/2015	1,300,000	16,000	12,000	510 U	ug/m ³
	2/11/2015	880,000	10,000	6,900	510 U	ug/m ³
	2/25/2015	750,000	8,300	5,800	510 U	ug/m ³
	3/17/2015	1,500,000	19,000	17,000	510 U	ug/m ³
	3/30/2015	1,300,000	14,000	11,000	510 U	ug/m ³
	4/8/2015	1,900,000	20,000	14,000	510 U	ug/m ³
	5/1/2015	1,000,000	10,000	4,400	510 U	ug/m ³
	5/18/2015	2,000,000	17,000	6,800	510 U	ug/m ³
	6/2/2015	1,400,000	16,000	7,300	510 U	ug/m ³
	6/15/2015	1,500,000	14,000	5,500	510 U	ug/m ³
	7/8/2015	250,000	2,700	1,000	510 U	ug/m ³
	7/22/2015	1,100,000	8,300	3,100	510 U	ug/m ³
	8/3/2015	1,900,000	13,000	4,700	510 U	ug/m ³
	8/20/2015	1,100,000	8,100	3,600	510 U	ug/m ³

Table 4B
Air Analytical Data
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Sample ID	Date	PCE	TCE	Cis-1,2-DCE	VC	Units
SVE-2 INFLUENT	11/7/2014	1,600,000	99,000	100,000	1,100 U	ug/m ³
	11/12/2014	2,300,000	47,000	28,000	960 U	ug/m ³
	11/20/2014	1,800,000	25,000	12,000	2,400 U	ug/m ³
	12/3/2014	400,000	9,600	6,600	51 U	ug/m ³
	12/9/2014	690,000	12,000	6,500	510 U	ug/m ³
	12/16/2014	940,000	14,000	7,600	510 U	ug/m ³
	1/7/2015	510,000	8,400	4,400	510 U	ug/m ³
	1/14/2015	610,000	9,500	5,700	510 U	ug/m ³
	1/22/2015	540,000	9,400	5,400	510 U	ug/m ³
	1/29/2015	430,000	7,400	4,500	510 U	ug/m ³
	2/11/2015	110,000	1,800	940	510 U	ug/m ³
	2/25/2015	290,000	5,900	3,700	510 U	ug/m ³
	3/17/2015	320,000	6,700	4,400	510 U	ug/m ³
	3/30/2015	300,000	5,800	3,600	510 U	ug/m ³
	4/8/2015	270,000	6,500	3,500	510 U	ug/m ³
	5/1/2015	190,000	4,300	1,400	510 U	ug/m ³
	5/18/2015	220,000	4,900	1,500	510 U	ug/m ³
	6/2/2015	180,000	4,700	1,500	510 U	ug/m ³
	6/15/2015	200,000	5,100	1,400	510 U	ug/m ³
	7/8/2015	160,000	3,900	1,300	510 U	ug/m ³
	7/22/2015	260,000	5,100	1,500	510 U	ug/m ³
	8/3/2015	380,000	11,000	2,100	510 U	ug/m ³
	8/20/2015	260,000	6,000	2,200	510 U	ug/m ³

Table 4B
Air Analytical Data
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Sample ID	Date	PCE	TCE	Cis-1,2-DCE	VC	Units
SVE-3 INFLUENT	11/7/2014	2,000,000	68,000	57,000	570 U	ug/m ³
	11/12/2014	1,100,000	30,000	12,000	240 U	ug/m ³
	11/20/2014	1,200,000	30,000	9,500	240 U	ug/m ³
	12/3/2014	210,000	5,400	1,900	51 U	ug/m ³
	12/9/2014	450,000	7,000	1,600	510 U	ug/m ³
	12/16/2014	670,000	9,500	1,900	510 U	ug/m ³
	1/7/2015	420,000	6,100	890	510 U	ug/m ³
	1/14/2015	630,000	6,800	900	510 U	ug/m ³
	1/22/2015	250,000	2,700	790 U	510 U	ug/m ³
	1/29/2015	300,000	2,800	790 U	510 U	ug/m ³
	2/11/2015	460,000	4,500	790 U	510 U	ug/m ³
	2/25/2015	270,000	2,400	790 U	510 U	ug/m ³
	3/17/2015	340,000	4,000	980	510 U	ug/m ³
	3/30/2015	NS	NS	NS	NS	ug/m ³
	4/8/2015	350,000	2,000	790 U	510 U	ug/m ³
	5/1/2015	370,000	1,100	910 U	510 U	ug/m ³
	5/18/2015	430,000	1,200	790 U	510 U	ug/m ³
	6/2/2015	420,000	1,100	790 U	510 U	ug/m ³
	6/15/2015	330,000	1,100	790 U	510 U	ug/m ³
	7/8/2015	250,000	1,100 U	790 U	510 U	ug/m ³
	7/22/2015	460,000	1,200	790 U	510 U	ug/m ³
	8/3/2015	450,000	9,900	5,100	510 U	ug/m ³
	8/20/2015	470,000	1,800	790 U	510 U	ug/m ³

Table 4B
Air Analytical Data
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Sample ID	Date	PCE	TCE	Cis-1,2-DCE	VC	Units
SVE-4 INFLUENT	11/7/2014	2,000,000	220,000	62,000	1,100 U	ug/m ³
	11/12/2014	4,700,000	110,000	21,000	960 U	ug/m ³
	11/20/2014	4,700,000	73,000	13,000	2,300 U	ug/m ³
	12/3/2014	860,000	17,000	4,900	51 U	ug/m ³
	12/9/2014	2,100,000	33,000	6,800	510 U	ug/m ³
	12/16/2014	2,200,000	34,000	7,100	510 U	ug/m ³
	1/7/2015	1,400,000	25,000	5,500	510 U	ug/m ³
	1/14/2015	1,800,000	30,000	7,500	510 U	ug/m ³
	1/22/2015	1,400,000	22,000	6,000	510 U	ug/m ³
	1/29/2015	1,700,000	28,000	7,700	510 U	ug/m ³
	2/11/2015	1,600,000	24,000	6,200	510 U	ug/m ³
	2/25/2015	1,100,000	17,000	4,300	510 U	ug/m ³
	3/17/2015	680,000	11,000	2,800	510 U	ug/m ³
	3/30/2015	1,400,000	20,000	5,400	510 U	ug/m ³
	4/8/2015	1,600,000	23,000	5,600	510 U	ug/m ³
	5/1/2015	770,000	8,600	1,600	510 U	ug/m ³
	5/18/2015	280,000	3,000	790 U	510 U	ug/m ³
	6/2/2015	800,000	7,000	1,200	510 U	ug/m ³
	6/15/2015	860,000	7,000	1,200	510 U	ug/m ³
	7/8/2015	170,000	1,600	790 U	510 U	ug/m ³
	7/22/2015	1,500,000	8,600	1,600	510 U	ug/m ³
	8/3/2015	1,500,000	11,000	2,800	510 U	ug/m ³
	8/20/2015	1,800,000	10,000	2,300	510 U	ug/m ³

Table 4B
Air Analytical Data
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Sample ID	Date	PCE	TCE	Cis-1,2-DCE	VC	Units
SVE-5 INFLUENT	11/7/2014	2,400,000	25,000	15,000	570 U	ug/m ³
	11/12/2014	970,000	7,200	2,100	240 U	ug/m ³
	11/20/2014	380,000	5,100 U	1,300	240 U	ug/m ³
	12/3/2014	180,000	1,200	790 U	510 U	ug/m ³
	12/9/2014	270,000	1,700	790 U	510 U	ug/m ³
	12/16/2014	420,000	2,000	910 U	510 U	ug/m ³
	1/7/2015	250,000	1,400	790 U	510 U	ug/m ³
	1/14/2015	260,000	1,200	790 U	510 U	ug/m ³
	1/22/2015	190,000	1,100 U	790 U	510 U	ug/m ³
	1/29/2015	210,000	1,100 U	790 U	510 U	ug/m ³
	2/11/2015	130,000	1,100 U	790 U	510 U	ug/m ³
	2/25/2015	160,000	930	280	51 U	ug/m ³
	3/17/2015	210,000	1,300	460	51 U	ug/m ³
	3/30/2015	160,000	920	220	51 U	ug/m ³
	4/8/2015	120,000	640	93	510 U	ug/m ³
	5/1/2015	88,000	260	79 U	51 U	ug/m ³
	5/18/2015	71,000	210	79 U	51 U	ug/m ³
	6/2/2015	31,000	110 U	79 U	51 U	ug/m ³
	6/15/2015	40,000	140	79 U	51 U	ug/m ³
	7/8/2015	69,000	220	79 U	51 U	ug/m ³
	7/22/2015	250,000	700	94	51 U	ug/m ³
	8/3/2015	310,000	1,100 U	790 U	510 U	ug/m ³
	8/20/2015	170,000	1,100 U	790 U	510 U	ug/m ³

Table 4B
Air Analytical Data
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Sample ID	Date	PCE	TCE	Cis-1,2-DCE	VC	Units
SVE-6 INFLUENT	11/7/2014	3,700,000	98,000	100,000	1,300 U	ug/m ³
	11/12/2014	4,300,000	120,000	100,000	960 U	ug/m ³
	11/20/2014	4,200,000	92,000	69,000	2,400 U	ug/m ³
	12/3/2014	120,000	3,000	3,200	510 U	ug/m ³
	12/9/2014	1,400,000	29,000	21,000	510 U	ug/m ³
	12/16/2014	1,300,000	27,000	18,000	510 U	ug/m ³
	1/7/2015	880,000	21,000	14,000	510 U	ug/m ³
	1/14/2015	1,100,000	23,000	15,000	510 U	ug/m ³
	1/22/2015	1,000,000	22,000	15,000	510 U	ug/m ³
	1/29/2015	890,000	18,000	13,000	510 U	ug/m ³
	2/11/2015	890,000	17,000	12,000	510 U	ug/m ³
	2/25/2015	680,000	13,000	11,000	510 U	ug/m ³
	3/17/2015	660,000	10,000	9,700	510 U	ug/m ³
	3/30/2015	770,000	13,000	11,000	510 U	ug/m ³
	4/8/2015	930,000	16,000	13,000	510 U	ug/m ³
	5/1/2015	920,000	11,000	8,700	510 U	ug/m ³
	5/18/2015	1,300,000	14,000	11,000	510 U	ug/m ³
	6/2/2015	950,000	10,000	8,700	510 U	ug/m ³
	6/15/2015	1,100,000	12,000	9,600	510 U	ug/m ³
	7/8/2015	780,000	9,000	8,300	510 U	ug/m ³
	7/22/2015	1,200,000	11,000	9,900	510 U	ug/m ³
	8/3/2015	1,300,000	10,000	8,600	510 U	ug/m ³
	8/20/2015	1,100,000	13,000	10,000	510 U	ug/m ³

Table 4B
Air Analytical Data
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Sample ID	Date	PCE	TCE	Cis-1,2-DCE	VC	Units
SVE-7 INFLUENT	11/7/2014	2,300,000	140,000	1,500 U	960 U	ug/m ³
	11/12/2014	1,900,000	130,000	270,000	1,100 U	ug/m ³
	11/20/2014	1,700,000	85,000	200,000	2,400 U	ug/m ³
	12/3/2014	15,000	910	3,000	51 U	ug/m ³
	12/9/2014	850,000	37,000	21,000	510 U	ug/m ³
	12/16/2014	460,000	18,000	35,000	510 U	ug/m ³
	1/7/2015	220,000	9,400	17,000	510 U	ug/m ³
	1/14/2015	490,000	19,000	35,000	510 U	ug/m ³
	1/22/2015	630,000	24,000	48,000	510 U	ug/m ³
	1/29/2015	470,000	18,000	41,000	510 U	ug/m ³
	2/11/2015	440,000	16,000	34,000	510 U	ug/m ³
	2/25/2015	310,000	13,000	27,000	510 U	ug/m ³
	3/17/2015	490,000	16,000	35,000	510 U	ug/m ³
	3/30/2015	410,000	13,000	26,000	510 U	ug/m ³
	4/8/2015	590,000	18,000	35,000	510 U	ug/m ³
	5/1/2015	350,000	11,000	20,000	510 U	ug/m ³
	5/18/2015	340,000	9,500	16,000	510 U	ug/m ³
	6/2/2015	230,000	6,500	12,000	510 U	ug/m ³
	6/15/2015	320,000	9,500	16,000	510 U	ug/m ³
	7/8/2015	410,000	11,000	22,000	510 U	ug/m ³
	7/22/2015	690,000	17,000	32,000	510 U	ug/m ³
	8/3/2015	200,000	4,000	7,900	510 U	ug/m ³
	8/20/2015	660,000	17,000	33,000	510 U	ug/m ³

Table 4B
Air Analytical Data
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Sample ID	Date	PCE	TCE	Cis-1,2-DCE	VC	Units
CAT OX INFLUENT	11/7/2014	1,200,000	31,000	13,000	270 U	ug/m ³
	11/12/2014	1,200,000	24,000	11,000	270 U	ug/m ³
	11/20/2014	1,300,000	18,000	7,000	2,400 U	ug/m ³
	12/3/2014	290,000	5,600	71,000	510 U	ug/m ³
	12/9/2014	810,000	12,000	4,900	510 U	ug/m ³
	12/16/2014	790,000	11,000	4,100	510 U	ug/m ³
	1/7/2015	510,000	9,000	3,100	510 U	ug/m ³
	1/14/2015	880,000	14,000	5,300	510 U	ug/m ³
	1/22/2015	930,000	13,000	5,300	510 U	ug/m ³
	1/29/2015	670,000	9,000	3,800	510 U	ug/m ³
	2/11/2015	800,000	11,000	4,500	510 U	ug/m ³
	2/25/2015	430,000	6,800	2,800	510 U	ug/m ³
	3/17/2015	510,000	8,000	3,500	510 U	ug/m ³
	3/30/2015	500,000	6,400	2,800	510 U	ug/m ³
	4/8/2015	700,000	8,500	3,500	510 U	ug/m ³
	5/1/2015	490,000	5,200	2,300	510 U	ug/m ³
	5/18/2015	520,000	4,500	1,900	510 U	ug/m ³
	6/2/2015	200,000	1,500	790 U	510 U	ug/m ³
	6/15/2015	2,900	1,100 U	790 U	510 U	ug/m ³
	7/8/2015	420,000	4,000	1,300	510 U	ug/m ³
	7/22/2015	420,000	3,000	1,500	510 U	ug/m ³
	8/3/2015	460,000	3,000	1,400	510 U	ug/m ³
	8/20/2015	470,000	3,600	1,800	510 U	ug/m ³

Table 4B
Air Analytical Data
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

Sample ID	Date	PCE	TCE	Cis-1,2-DCE	VC	Units
CAT OX EFFLUENT	11/7/2014	1,100	13	14	8.0 U	ug/m ³
	11/12/2014	53,000	180	57	10 U	ug/m ³
	11/20/2014	80	6 U	5 U	3 U	ug/m ³
	12/3/2014	15,000	110 U	79 U	51 U	ug/m ³
	12/9/2014	31,000	110 U	79 U	51 U	ug/m ³
	12/16/2014	350,000	130	79 U	51 U	ug/m ³
	1/7/2015	29,000	110 U	79 U	51 U	ug/m ³
	1/14/2015	36,000	130	79 U	51 U	ug/m ³
	1/22/2015	32,000	110 U	79 U	51 U	ug/m ³
	1/29/2015	26,000	110 U	79 U	51 U	ug/m ³
	2/11/2015	18,000	110 U	79 U	51 U	ug/m ³
	2/25/2015	1,800	110 U	79 U	51 U	ug/m ³
	3/17/2015	25,000	110 U	79 U	51 U	ug/m ³
	3/30/2015	29,000	120	79 U	51 U	ug/m ³
	4/8/2015	33,000	130	91 U	510 U	ug/m ³
	5/1/2015	7,700	110 U	79 U	51 U	ug/m ³
	5/18/2015	5,500	110 U	79 U	51 U	ug/m ³
	6/2/2015	2,300	110 U	79 U	51 U	ug/m ³
	6/15/2015	2,100	110 U	79 U	51 U	ug/m ³
	7/8/2015	3,900	110 U	79 U	51 U	ug/m ³
	7/22/2015	9,400	110 U	79 U	51 U	ug/m ³
	8/3/2015	11,000	110 U	79 U	51 U	ug/m ³
	8/20/2015	3,800	110 U	79 U	51 U	ug/m ³

Notes:

U - Indicates that the compound was not detected at the indicated detection limit.

SVE -3 not sampled on 3/30/15 - deflated tedlar bag

Table 5A
PCE Removal Estimate
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Date Of Visit		# Of Days Since Last Visit	Time of Operation (hr) since last visit	SVE Status		Comments	Total Flow (cfm)	Total Flow (m³/hr)	PID Influent (ppm)	PID Influent (mg/m3)	Removal Rates		
				Arrival	Departure						Pounds PCE removed per hour	Pounds PCE recovered per period	Gallons PCE recovered per period
08/22/13		0	0	Down	UP	System Startup	35	59	NM	NM	NM	NM	NM
08/28/13		7	168	UP	UP	System check No PID readings No samples	110	187	NM	NM	NM	NM	NM
09/03/13		6	144	UP	UP		92	156	1772	12018.44	4.13	595.14	44.55
09/10/13		7	168	UP	UP		150	255	1280	8681.49	4.87	817.74	61.22
09/17/13		7	168	UP	UP		90	153	2590	17566.45	5.91	992.78	74.32
09/26/13		9	216	UP	UP	Carbon changeout - added another carbon drum	82	139	1450	9834.50	3.01	651.09	48.74
10/02/13		6	144	UP	UP		84	143	1490	10105.80	3.17	456.91	34.21
10/08/13		6	144	UP	UP		70	119	1900	12886.58	3.37	485.53	36.35
10/15/13		7	168	UP	UP	Carbon changeout	64	109	1400	9495.38	2.27	381.61	28.57
10/22/13		7	168	UP	UP		56	95	1190	8071.07	1.69	283.82	21.25
10/25/13		3	72	UP	UP	SVE-2 now 30% open; SVE-3 closed	18	31	412	2794.35	0.19	13.54	1.01
11/05/13		16	384	UP	UP	SVE-2 now 30% open; SVE-3 closed	13	22	3488	23657.06	1.15	441.42	33.05
11/12/13		7	168	UP	UP	SVE-2 now 30% open; SVE-3 closed	19	32	420	2848.61	0.20	33.99	2.54
11/19/13		7	168	UP	UP	SVE-2 now 30% open; SVE-3 closed	19	32	360	2441.67	0.17	29.13	2.18
12/03/13		14	336	UP	UP	SVE-2 now 30% open; SVE-3 closed	18	31	324	2197.50	0.15	49.68	3.72
12/18/13		15	360	UP	UP	SVE-2 now 30% open; SVE-3 closed - changed out carbon	32	54	246	1668.47	0.20	71.84	5.38
12/31/13		13	312	UP	UP	SVE-2 now 30% open; SVE-3 closed	16	27	260	1763.43	0.11	32.90	2.46
01/14/14		14	336	UP	UP	SVE-2 now 30% open; SVE-3 closed; switched out carbons	21	36	4260.0	28893.08	2.27	762.03	57.05
01/28/14		14	336	UP	UP	SVE-2 now 30% open; SVE-3 closed; switched out carbons (both new) - closed fresh air mix valve and opened all SVE wells; changed air filter	218	370	3520.0	23874.09	19.45	6,536.44	489.34
02/04/14		7	168	UP	UP	All SVE wells open. SVE-1 and SVE-7 are frozen and there is no flow.	160	272	2680.0	18176.87	10.87	1,826.28	136.72
02/11/14		7	168	UP	UP	All SVE wells open. SVE-1 and SVE-7 are frozen and there is no flow. Carbon change out	92	156	2740.0	18583.81	6.39	1,073.62	80.37
02/18/14		7	168	UP	UP	ALL SVE wells open. Fresh air bleed valve 30% open. Carbon change out.	145	246	1345.0	9122.35	4.94	830.62	62.18
02/25/14		7	168	UP	UP	ALL SVE wells open. Fresh air bleed valve 30% open. Carbon change out.	112	190	960.0	6511.12	2.73	457.93	34.28
03/04/14		7	168	UP	UP	Closed all wells except SVE-2. Fresh air bleed valve open 30% Carbon change out	140	238	1010.0	6850.24	3.58	602.23	45.08
03/20/14		16	384	UP	UP	SVE - 2 open. Fresh air valve 30% open	36	61	548.0	3716.76	0.50	192.05	14.38
04/01/14		12	288	UP	UP	SVE - 2 open. Fresh air valve 30% open	36	61	390	2645.14	0.36	102.51	7.67
04/22/14		21	504	UP	UP		47	80	368	2495.93	0.44	220.99	16.54
04/29/14		7	168	UP	DOWN	end of Pilot test #1	162	275	1340	9088.43	5.50	924.55	69.22
									Approximate pounds of PCE recovered:		18,866		
									Approximate gallons PCE recovered:		1,343		

Table 5A
PCE Removal Estimate
Pilot Test #1
Former Staubs Textiles
SVE System
Rochester, New York

Notes:

System started August 22, 2013;

SVES - Soil vapor extraction system;

PID - Data collected using a hand held photoionization detector;

ppm - Parts per million;

cfm - Cubic feet per minute;

NM - Not measured;

NA - Not applicable;

NA - Not recorded;

Pounds PCE removed per hour =(PID INF*MW/R)*(1g/1,000mg)*(1cu m/35.31 cu ft)*(1lb/454.4g)*Total Flow*60 min/hr

where:

R = Gas Law Constant = 24.45

MW = Molecular weight of PCE at 77 degrees Fahrenheit = approximately 165.83 grams per mole

g = gram

mg = milligram

cu m = cubic meter

cu ft = cubic foot

min = minutes

hr = hour

Pounds PCE removed per period = pounds PCE removed per hour * # of days since last visit * 24 hours per day

Gallons PCE recovered per period = pounds PCE recovered per period/

Table 5B
PCE Removal Estimate
Pilot Test #2
Former Staubs Textiles
SVE System
Rochester, New York

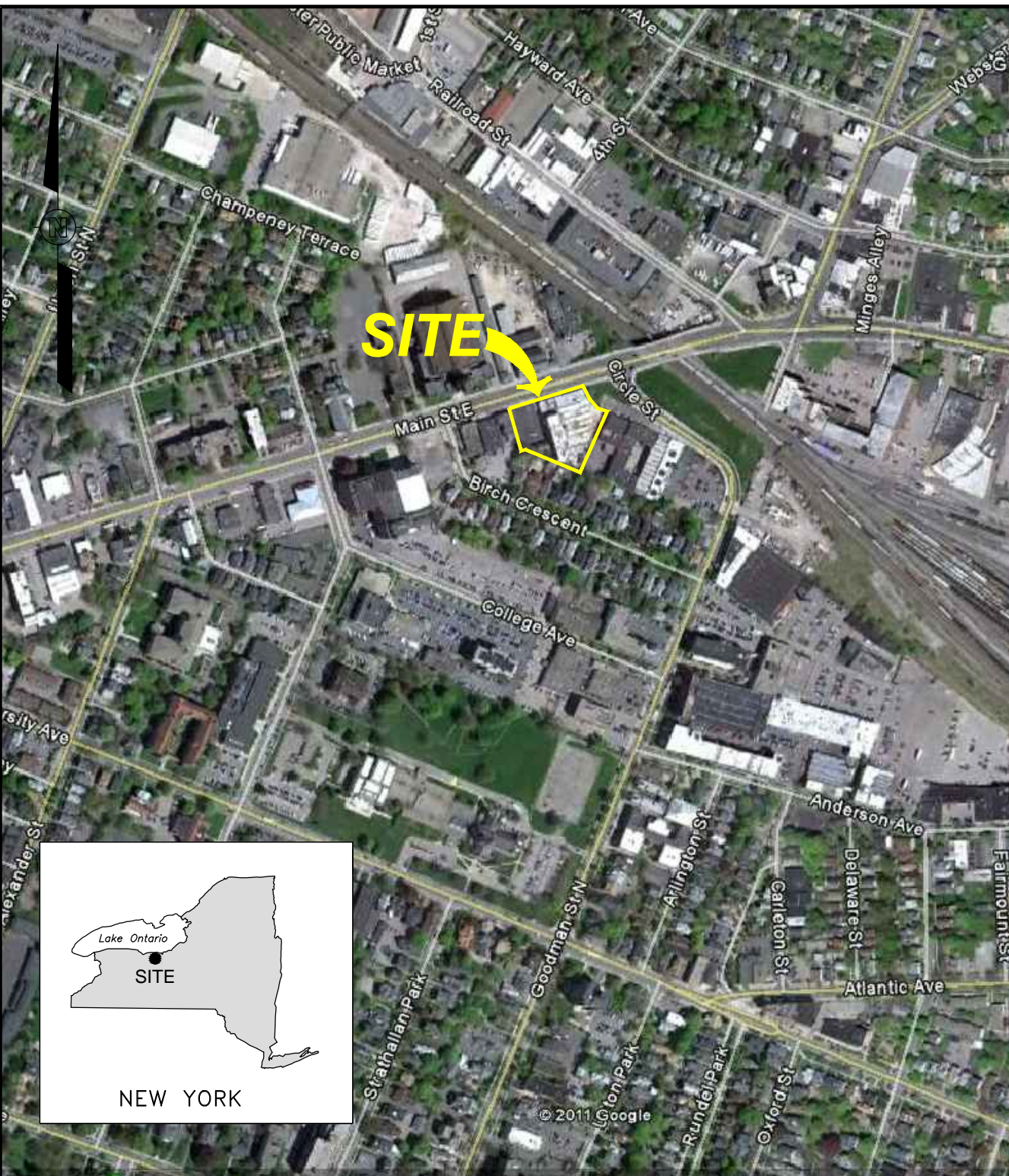
Date Of Visit		# Of Days Since Last Visit	Time of Operation (hr) since last visit	SVE Status		Comments	Total Flow (cfm)	Total Flow (m³/hr)	PID Influent (mg/m3)	Removal Rates		
				Arrival	Departure					Pounds PCE removed per hour	Pounds PCE recovered per period	Gallons PCE recovered per period
10/30/14		0	0	Down	UP	System Startup	0	0	61041.72	0.00	0.00	0.00
11/07/14		8	192	Up	Up		178	302	1200.00	0.80	153.29	11.48
11/12/14		5	120	up	Up		184	313	1200.00	0.83	99.04	7.41
11/20/14		8	192	UP	UP		190	323	1300.00	0.92	177.26	13.27
12/03/14		13	312	Up	Up		192	326	290.00	0.21	64.93	4.86
12/09/14		6	144	Up	Up		180	306	810.00	0.54	78.48	5.88
12/16/14		7	168	Up	Up		175	297	790.00	0.52	86.81	6.50
01/07/15		22	528	Up	Up		195	331	510.00	0.37	196.27	14.69
01/14/15		7	168	Up	Up		170	289	880.00	0.56	93.94	7.03
01/22/15		8	192	Up	Up		170	289	930.00	0.59	113.46	8.49
01/29/15		7	168	Up	Up		160	272	822.00	0.49	82.59	6.18
02/25/15		27	648	Up	Up		110	187	780.00	0.32	207.82	15.56
03/16/15		19	456	Up	Up		170	289	700.00	0.44	202.83	15.18
03/30/15		14	336	Up	Up		156	265	628.00	0.37	123.04	9.21
04/08/15		9	216	Up	Up		160	272	639.00	0.38	82.55	6.18
04/16/15		8	192	Up	Up		150	255	850.00	0.48	91.50	6.85
05/01/15		15	360	Up	Up		131	223	836.00	0.41	147.37	11.03
05/18/15		17	408	Up	Up		140	238	1674.00	0.88	357.41	26.76
06/02/15		15	360	Up	Up		160	272	1520.00	0.91	327.25	24.50
06/15/15		13	312	Up	Up		155	263	1050.00	0.61	189.80	14.21
07/08/15		23	552	Up	Up		180	306	992.00	0.67	368.42	27.58
07/22/15		14	336	Up	Up		162	275	980.00	0.59	199.39	14.93
08/03/15		12	288	Up	Up		155	263	947.00	0.55	158.01	11.83
08/20/15		17	408	Up	Down	System Shutdown	150	255	910.00	0.51	208.17	15.58
Notes: System started October 30, 2014;								Approximate pounds of PCE recovered:		3,810		
								Approximate gallons PCE recovered:		285		

SVES - Soil vapor extraction system;
PID - Data collected using a hand held photoionization detector;
ppm - Parts per million;
cfm - Cubic feet per minute;
NM - Not measured;
NA - Not applicable;
NA - Not recorded;
Pounds PCE removed per hour =(PID INF*MW/R)*(1g/1,000mg)*(1cu m/35.31 cu ft)*(1lb/454.4g)*Total Flow*60 min/hr
where:
R = Gas Law Constant = 24.45
MW = Molecular weight of PCE at 77 degrees Fahrenheit = approximately 165.83 grams per mole
g = gram
mg = milligram
cu m = cubic meter
cu ft = cubic foot
min = minutes
hr = hour
Pounds PCE removed per period = pounds PCE removed per hour * # of days since last visit * 24 hours per day
Gallons PCE recovered per period = pounds PCE recovered per period/

Figures

File: U:\Project\134685\24\134685-24A1.dwg
Plot Date/Time: Sep 29, 2015 - 11:38am
Plotted By: derrick.gardner

OFFICE	DATE	DESIGNED BY	DRAWN BY	CHECKED BY	APPROVED BY	DRAWING NUMBER
Pittsburgh, PA	02/19/13	N. Robertson	A. Smith	H. Fariello	C. Byers	134685-24A1



REFERENCE:

MAP FROM www.google.com

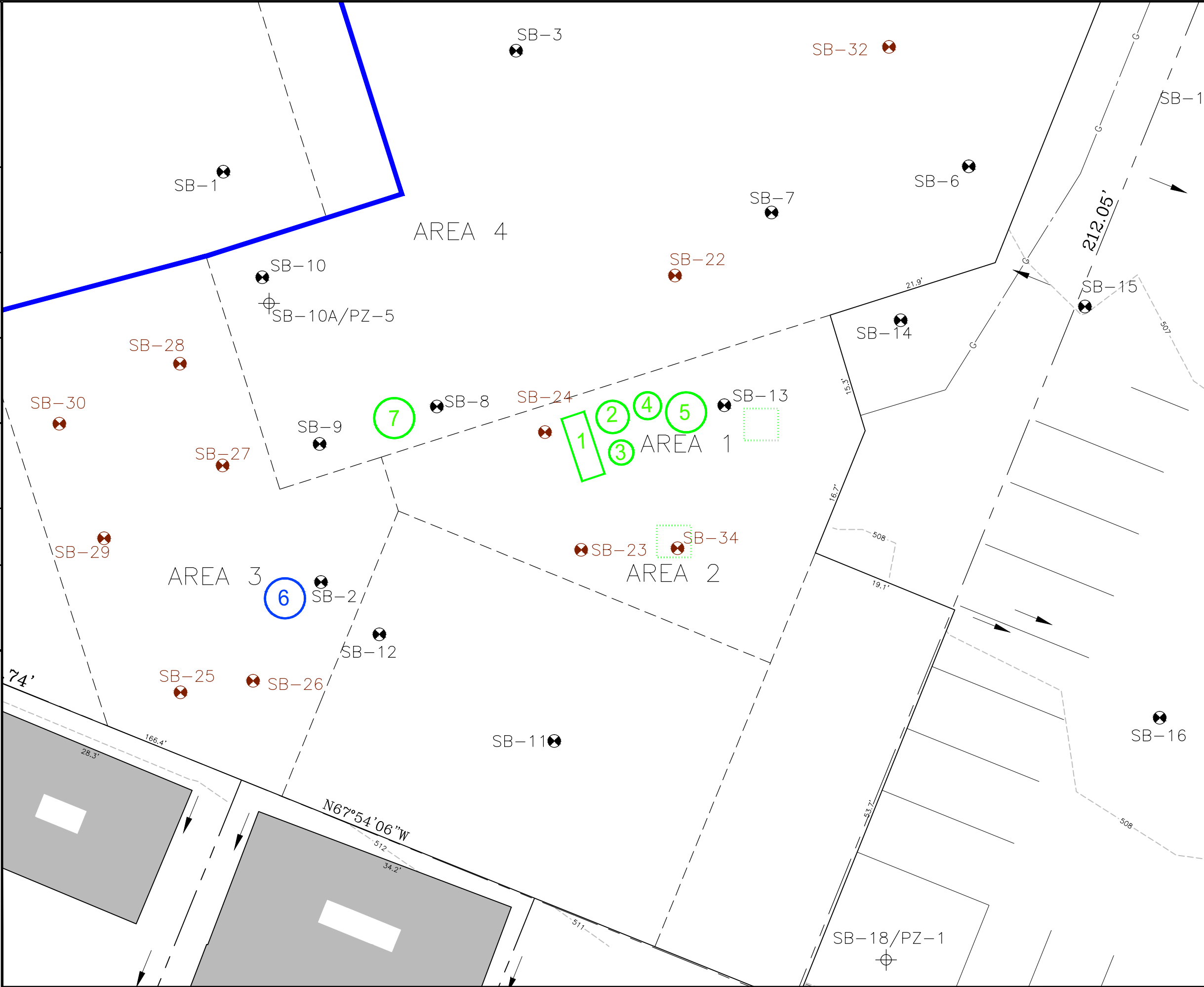
"DRAWING NOT TO SCALE"



Shaw E & I Engineering of New York, P.C.
13 British American Boulevard
Latham, New York 12110-1405

NEW YORK STATE DEPARTMENT OF
ENVIROMENTAL CONSERVATION

FIGURE 1
SITE LOCATION MAP
STAUBS TEXTILE SERVICE
935-951 EAST MAIN STREET
ROCHESTER, MONROE COUNTY, NEW YORK



LEGEND

SB-5

SB-18/PZ-1

SB-33

APPROXIMATE LOCATION OF BASEMENT

APPROXIMATE LOCATION OF HORIZONTAL UNDERGROUND STORAGE TANK (UST) - REMOVED

APPROXIMATE LOCATION OF VERTICAL UST - REMOVED

APPROXIMATE LOCATION OF VERTICAL UST - CLOSED IN PLACE

APPROXIMATE LOCATION OF FORMER UST (NOT LOCATED DURING SITE INVESTIGATION)

SB-5

SB-18/PZ-1

SB-33

APPROXIMATE LOCATION OF BASEMENT

APPROXIMATE LOCATION OF HORIZONTAL UNDERGROUND STORAGE TANK (UST) - REMOVED

APPROXIMATE LOCATION OF VERTICAL UST - REMOVED

APPROXIMATE LOCATION OF VERTICAL UST - CLOSED IN PLACE

APPROXIMATE LOCATION OF FORMER UST (NOT LOCATED DURING SITE INVESTIGATION)

Shaw

Shaw E & I Engineering of New York, P.C.

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

FIGURE 2
UST LOCATION MAP

STAUBS TEXTILE SERVICE
935 & 951 EAST MAIN STREET
MONROE CO., ROCHESTER, NEW YORK

Figure 3
Pilot Test 1 Pounds of PCE Removed vs Time

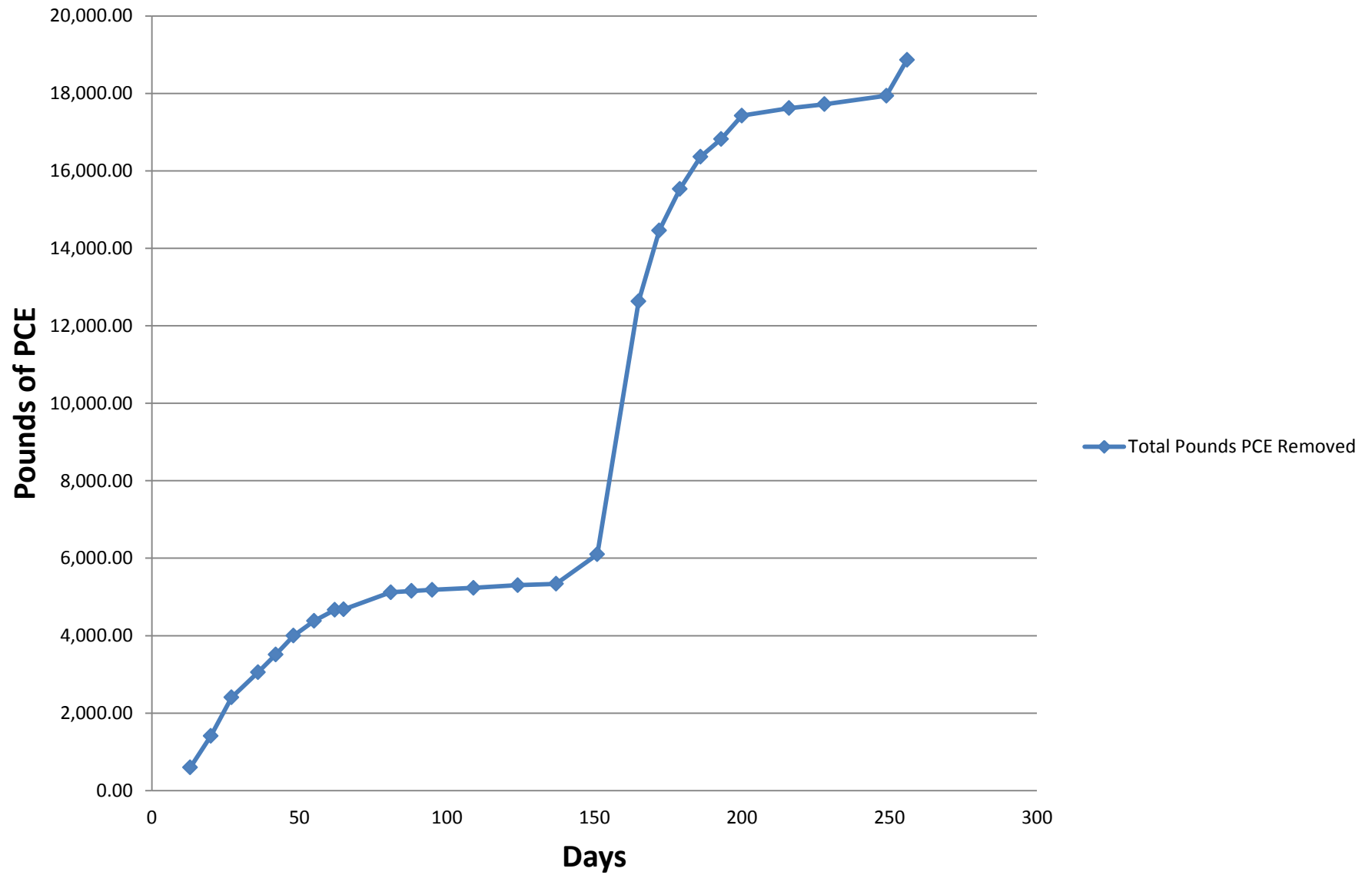


Figure 4
Pilot Test 1 SVE 2 CVOC Concentrations vs Time

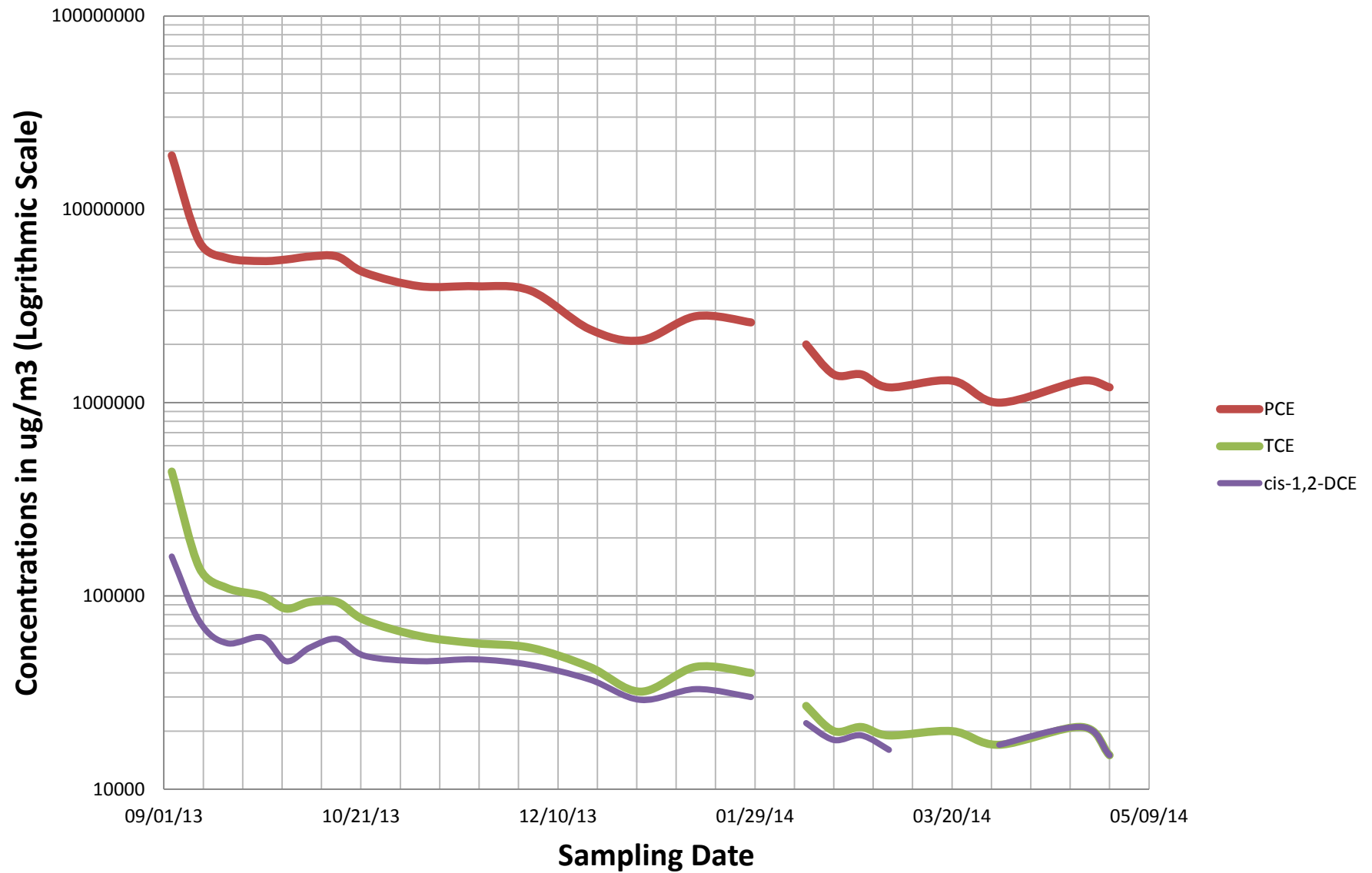


Figure 5
Pilot Test 1 PCE Concentrations vs Time

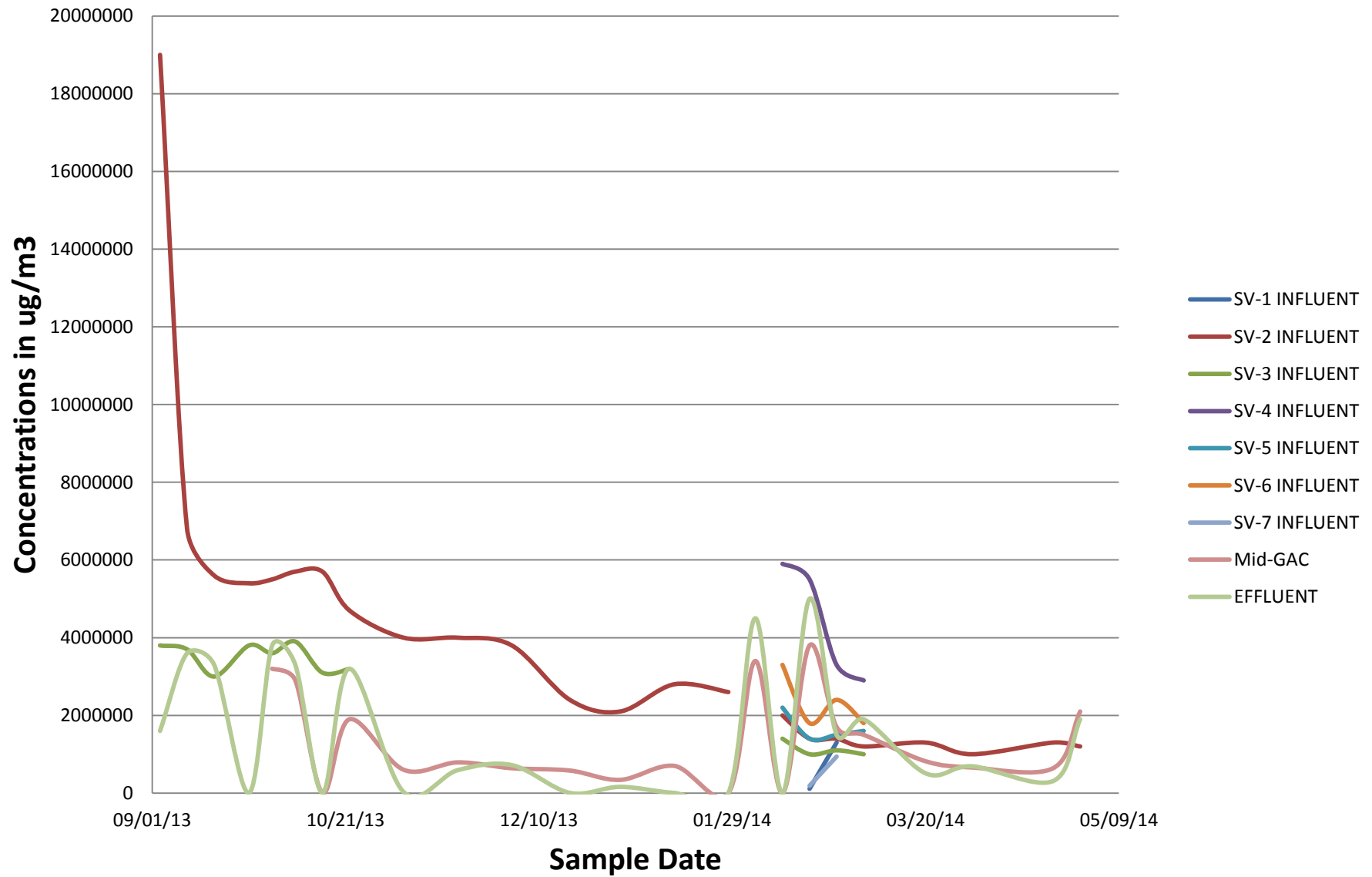


Figure 6
Pilot Test 2 Pounds PCE Removed vs Time

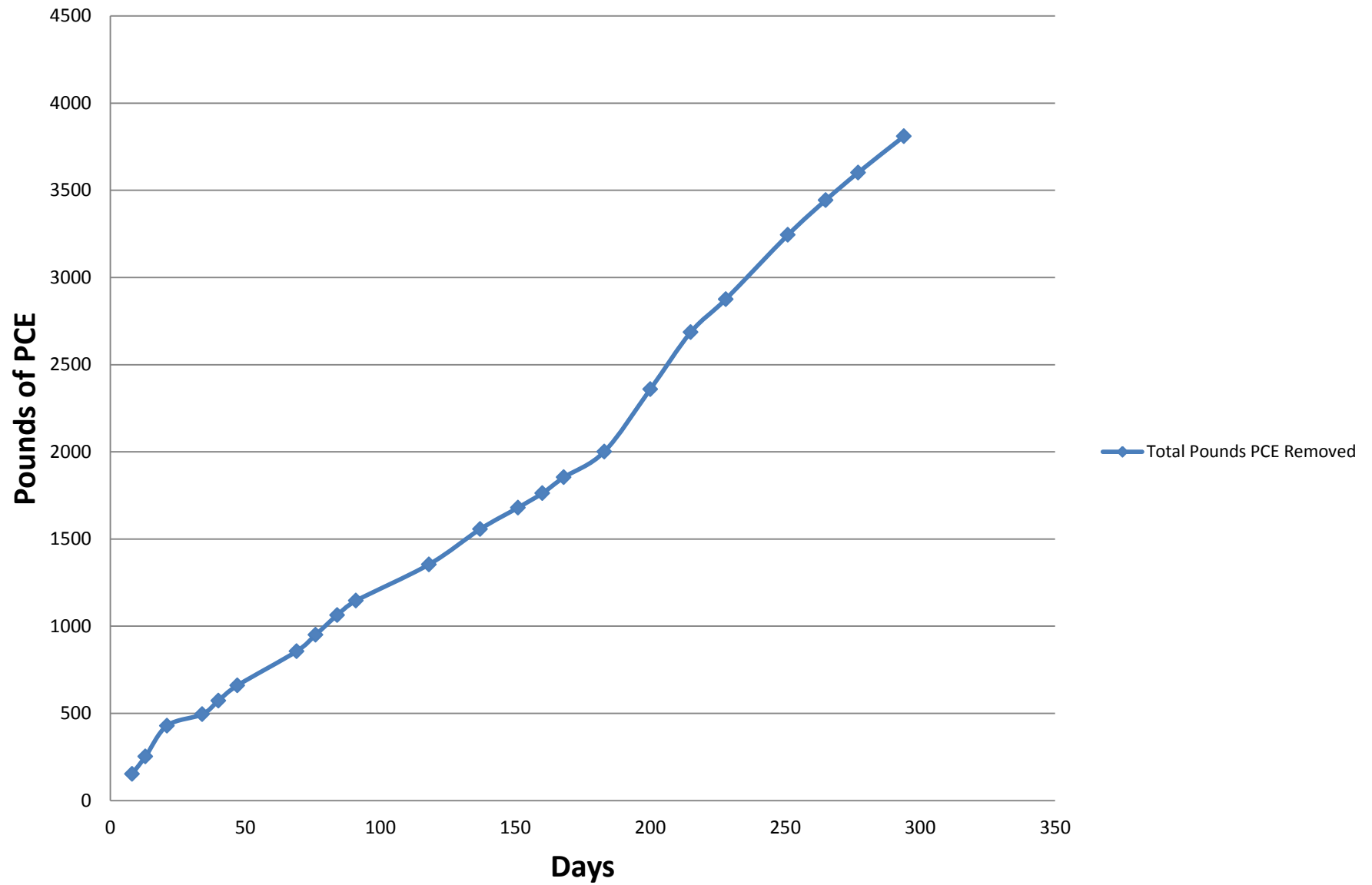


Figure 7
Pilot Test 2 Cat-Ox PCE Influent vs. Effluent Concentration

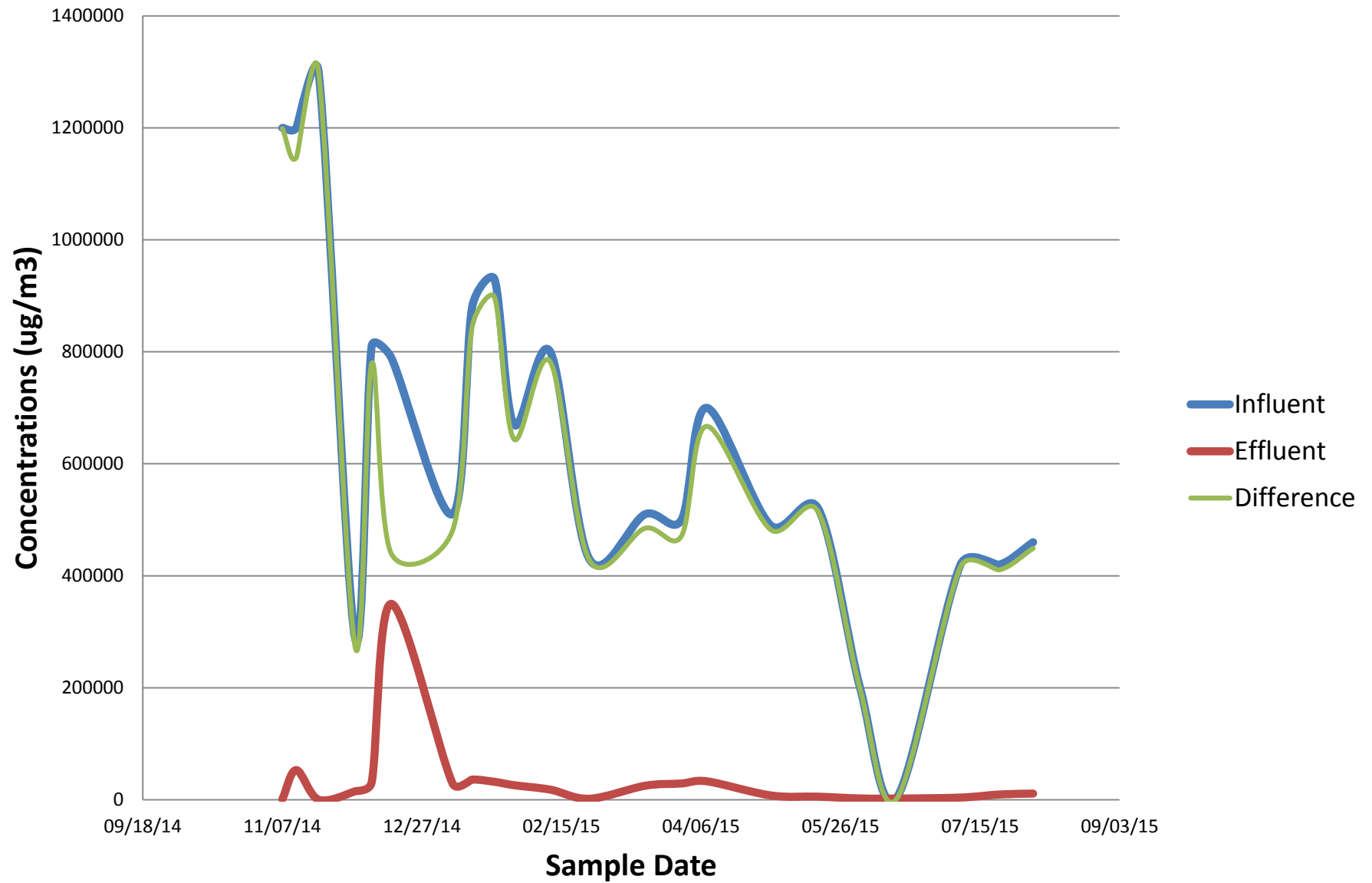
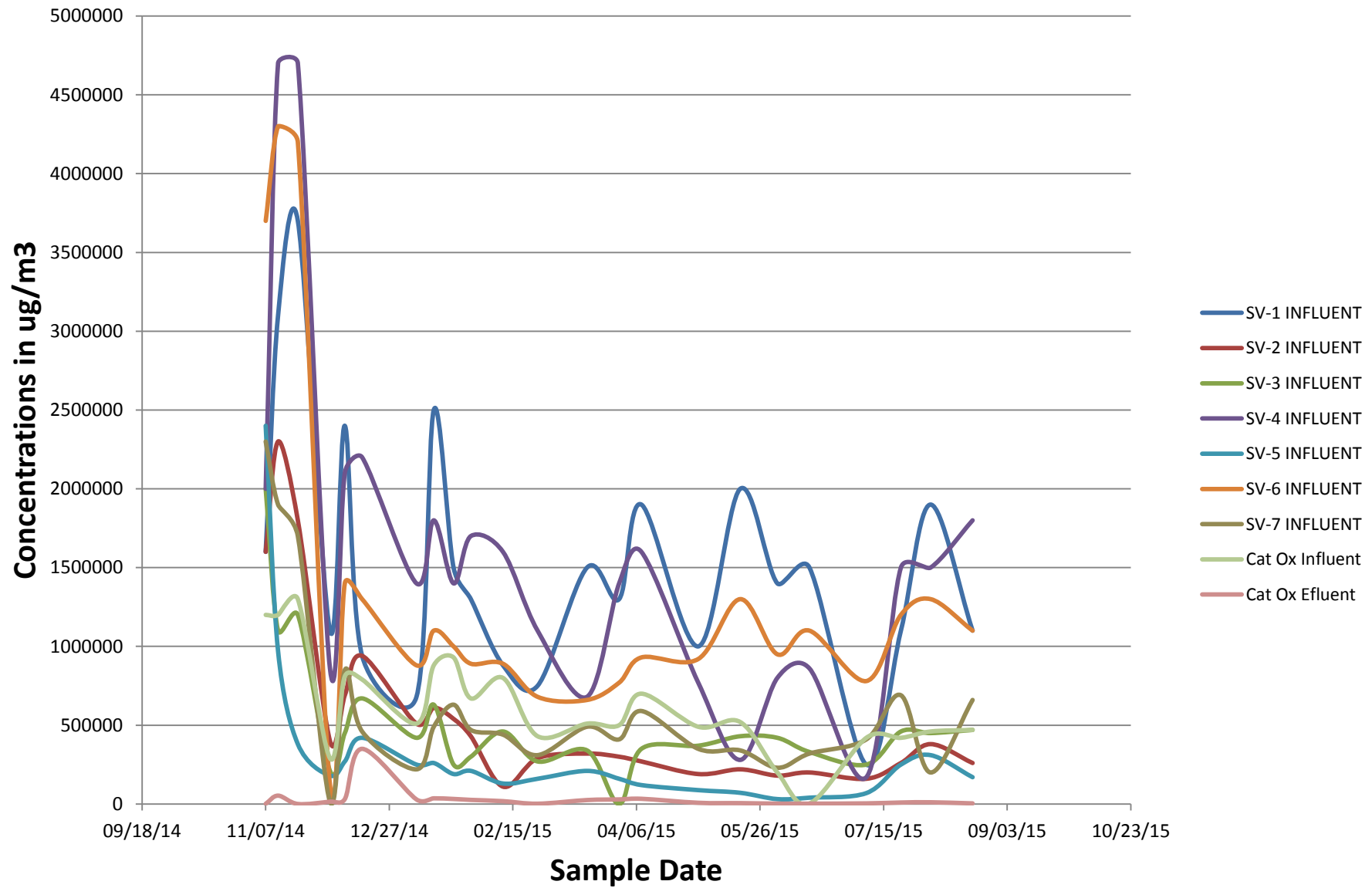


Figure 8
Pilot Test 2 PCE Concentrations verse Time



Appendix A

Boring Logs

Appendix B

Photographic Log

Appendix C

Field Notes

Appendix D

Analytical Data Packages

Appendix E

Data Usability Summary Reports – Data Validation Services

Appendix F

Waste Manifests and Contaminated Materials Disposal Forms

Figures

Appendix A

Boring Logs

Appendix B

Photographic Log

Appendix C

Field Notes

Appendix D

Analytical Data Packages

Appendix E

Data Usability Summary Reports – Data Validation Services

Appendix F

Waste Manifests and Contaminated Materials Disposal Forms

Figures

Appendix A

Boring Logs

Appendix B

Photographic Log

Appendix C

Field Notes

Appendix D

Analytical Data Packages

Appendix E

Data Usability Summary Reports – Data Validation Services

Appendix F

Waste Manifests and Contaminated Materials Disposal Forms
