

**POLREP # 9**  
**Chem-Fab Site**  
**Doylestown, PA 18901**

**Event: CERCLA Response Activities**

**ATTN: Region III RRC**

**I. Situation (October 1, 2015 – December 31, 2015)**

- A. On November 8, 2012, using authority provided under EPA Delegation 14-2, the On-Scene Coordinator (“OSC”) authorized the expenditure of funds in an amount not to exceed \$50,000 to initiate a removal action intended to reduce VOCs in suites inside an office building located 300-360 North Broad Street (“Property”), which Property is included within the Site. To accomplish this, the OSC installed portable air purifiers into selected suites within the impacted building. The OSC subsequently collected additional data to evaluate the efficacy of such units combined with the existing building vapor mitigation system in reducing VOCs levels within the building.
- B. In January 2012, the Remedial Program completed a Focused Feasibility Study intended to evaluate alternatives to address threats presented by soils located at the Property. In December 2012, the Remedial Program issued a Record of Decision (ROD) selecting remedial action consisting of, among other things, the removal and off-site disposal of certain contaminated soils on the Property outside the footprint of the three commercial buildings on the Property.
- C. Based on the data collected (see Section III of the Original Action Memo), potential future conditions at the Site, the extent of contamination and other reasons (e.g., lack of Remedial and State funding to do the work), the OSC determined that continued Removal Action was necessary to mitigate or prevent a threat to public health and that a change of scope, additional funding, and an exemption to the 12-month limit were required to perform such action.
- D. On September 19, 2013, EPA issued an Action Memorandum approving a scope change, the expenditure of additional funds, and an exemption to the statutory funding and time limits on the Removal Action. The selected Removal Action consisted primarily of the excavation and off-site disposal of certain contaminated soils presently located at the Property.
- E. On May 28, 2014, a Change of Scope was approved to additionally address the threat to public health from groundwater impacted by the contaminated soils on the Property. Hazardous substances in soils at the Property have been determined to be responsible for groundwater contamination that has impacted two private supply wells down gradient from the Property. Under this Change of Scope, bottled water will be provided to one private property where such impacts are significant. The need to connect such property to public water will be decided in

the near future; however, based on the results of the sampling, there is an immediate need to provide the occupants of this property with bottled water.

- F. On January 20, 2015, EPA issued an Action Memorandum approving a scope change on the Removal Action (“Action Memo III”). This change of scope was to install a permanent connection to the affected residence to the Doylestown Township Municipal Authority water supply.
- G. On September 30, 2015, EPA issued an Action Memorandum approving a scope change on the Removal Action (“Action Memo III”). This change of scope was to install a permanent depressurization system to reduce indoor TCE levels in Building A to  $8 \mu\text{g}/\text{m}^3$  or below, which level has been determined in this situation to pose no unacceptable risk to the tenants and their patrons.
- H. As of October 02, 2015, we have spent approximately \$905,051, that figure is only materials and contractors hours, it does not include EPA personnel.
- I. For more information, see previous POLREPs.

## **II. Action Taken**

- A. Week of October 12<sup>th</sup>: Installed a depressurization system at the main building at the site. Eight suction fans and associated piping were strategically placed in and around the building foundation, based on the finding from the study of how the air was moving under the building. The existing sub-slab ventilation system was removed during the installation of the new system. The new fans were wired by an electrical contractor, and then the system efficiency was fine tuned to obtain negative sub-slab pressure. All pipe roof penetrations were flashed by a roofing contractor. Magnehelic gauges were installed so the building owner and tenants can confirm the systems operation. The systems produced a noticeable sound while in operation, so a muffler system was added to the exhausts of some of the systems to reduce noise.

A section of North West Street was milled and repaved in the area disturbed from the recent water main installation. Traffic lines and a crosswalk were also repainted.

- B. After a significant rainfall, a greenish water was observed in the bypass tube of suction fan #8. An attempt was made to collect a water sample on 11/05/15, but there was no water to be sampled. A water sample was collected from a nearby sump pump and analyzed for VOCs, metals and Hexavalent Chromium. The results showed the water was non-hazardous.
- C. On November 21<sup>st</sup>, a ninth suction fan was installed at space 330 due to readings taken after the first eight suction fans were installed.

- D. December 2<sup>nd</sup>: during a significant rainfall event, a water sample from suction fan #8 was collected and analyzed for VOCs, metals and Hexavalent Chromium. The results showed the water was hazardous and because of it, it was decided to move the suction point.
- E. On December 11<sup>th</sup> the suction point of fan #8 was moved. After a significant rain event, no water was observed.

### **III. Future Actions**

- A. Conduct additional indoor air and sub-slab air sampling to confirm effective operation of vapor extraction system.
- B. Adjust, if necessary, the depressurization system, based on the air samples results.

---

Eduardo Rovira, OSC  
EPA Region III  
Philadelphia, Pennsylvania, 19103