



SUPERFUND SUPPORT TEAM

SAMPLING REPORT

**for the
LOOHN's DRY CLEANERS and
LAUNDERERS PROPERTY at
the OLEAN WELLFIELD**

in OLEAN, CATTARAUGUS COUNTY, NEW YORK

October 15-16, 2019

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REFERENCES

REFERENCE 1:	New York State Groundwater Classifications: https://www.epa.gov/wqs-tech/water-quality-standards-regulations-new-york
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1.0 SAMPLING EVENT SUMMARY

The Loohn's Dry Cleaners and Launderers property is one of four operable units (OUs) that make up the Olean Well Field Superfund Site. The Site is located in the City of Olean, Cattaraugus County, New York. The 1.5 square mile Olean Wellfield site is comprised of three public and 50 private wells which are contaminated with trichloroethene (TCE). The public wells were constructed in the 1970s but were closed after the city officials detected TCE in the groundwater. In 1990, the public wells were reactivated after two air strippers were constructed to treat the groundwater. Site-related contaminants have migrated from shallow groundwater to deeper levels. The groundwater located in the upper level flows toward and discharges into the Allegheny River.

Assessments were conducted in 1983 and 1985 by EPA. The New York State Department of Environmental Conservation (NYSDEC) and the EPA developed an interim cleanup action that provided for regular monitoring and the installation of additional carbon adsorption units, as necessary, until a permanent remedy was put in place. In separate remedial actions implemented in 1990, 2000 and 2003, several tons of contaminated soils were excavated and removed from several of the Olean Well Field facilities.

Groundwater sampling is required to assess post-removal groundwater conditions at the Loohn's Dry Cleaners and Launderers property. The primary volatile organic compounds (VOCs) of concern in the groundwater beneath and downgradient of the site are cis-1, 2-dichloroethene, trichloroethene (TCE), tetrachloroethene (PCE) and vinyl chloride.

The Laboratory Services & Applied Sciences Division (LSASD), Hazardous Waste Support Branch (HWSB), Superfund Support Team (SST) has been requested by the Superfund & Emergency Management Division (SEMD) to establish a post-removal sampling protocol for the Loohn's Cleaners and Launderers property facility which has a total of five groundwater monitoring wells.

Groundwater samples were collected from the 5 separate monitoring wells at the Loohn's Cleaners and Launderers site, Olean Well Field site, Olean, NY between October 15-16, 2019. The samples were denoted as follows: MW-01-OCT19, MW-02-OCT19, MW-03-OCT19, MW-04-OCT19, MW-44-OCT19 (Field Duplicate of MW-04-OCT19) and MW-05-OCT19. The trip blank was denoted as TB-01-OCT19 and the Rinse Blank as RB-01-OCT19. All samples were submitted to the U.S. EPA Region 2 LSASD Lab Branch for the analysis of trace level Volatile Organics on October 17, 2019. All monitoring wells were purged and the samples collected by the EPA Region 2 Low-Flow procedure as specified in the UFP QAPP.

2.0 LABORATORY RESULTS

The Laboratory results in this report consist only of the data provided by the EPA, Region 2, LSASD Laboratory located in Edison, New Jersey. Quality Control (QC) sample data can be found in Table 1. The Trip Blank was collected for quality control (QC) to determine if any extraneous contamination was introduced to the samples. Field duplicate, and matrix spike/matrix spike duplicate (MS/MSD) samples were collected for laboratory quality control. Field duplicate samples were compared to their respective pairs via Relative Percent Difference (RPD). The RPD is only calculated for analytes that are detected in both the sample and the associated duplicate. The RPD is used to assess the precision of sampling in the field. Although the overall decision lies with the data user, it is the opinion of this office that an RPD of less than or equal to 50% indicates acceptable comparability.

A summary of the results of the October 15-16, 2019 sampling are listed Attachment I. This table identifies the sample location, parameters detected and New York State H(WS) Class GA groundwater exceedances shaded in red. The laboratory report can be found in Appendix C. The suffix “-OCT19” at the end of each sample identification string expresses the sampling month and year of October 2019.

3.0 CONCLUSION:

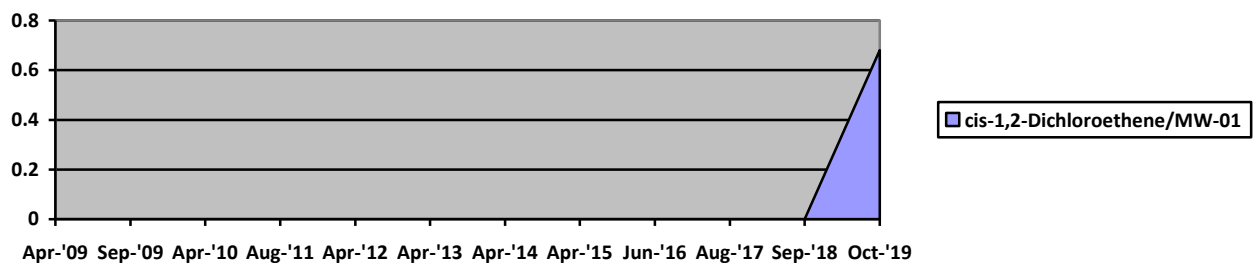
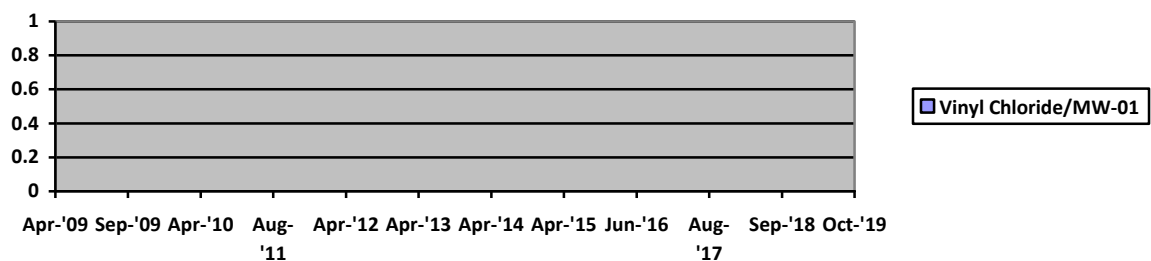
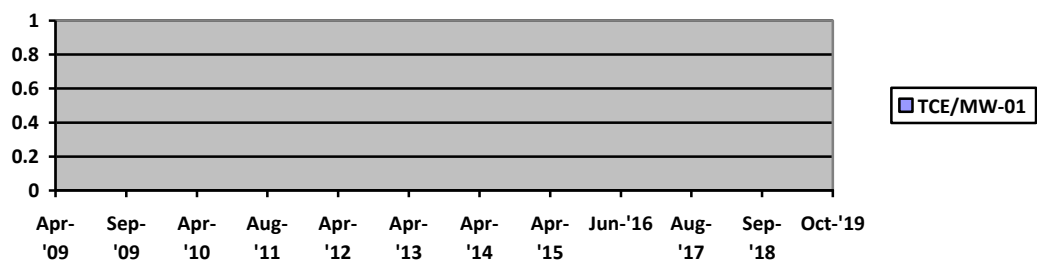
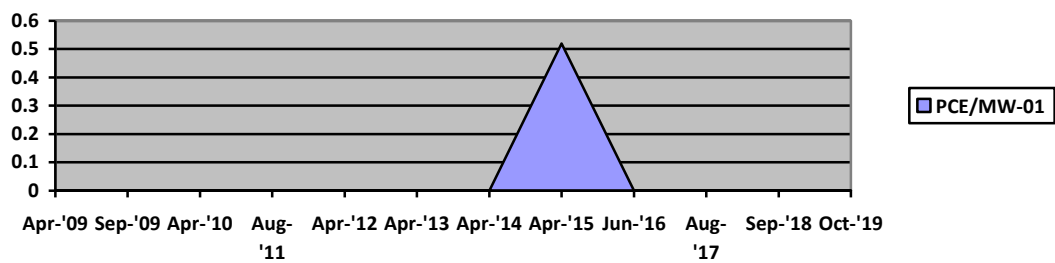
The following compounds exceeded the New York State H(WS) Class GA groundwater criteria in the samples listed below:

Well	Compound
MW-02, MW-03, MW-04	Tetrachloroethene Trichloroethene Cis-1,2-Dichloroethene
MW-02	Vinyl Chloride

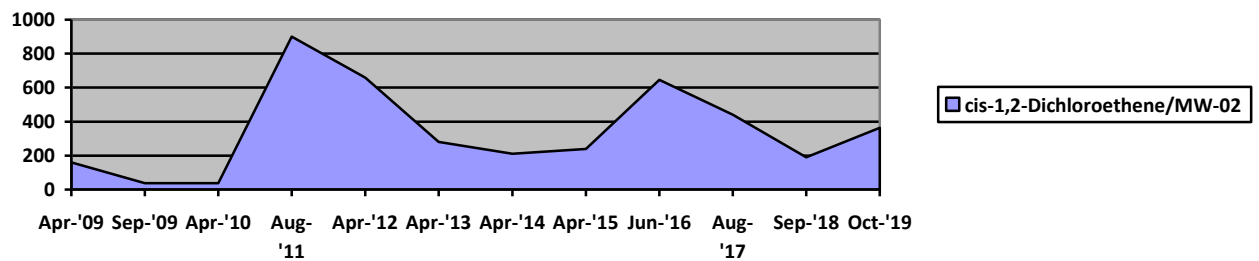
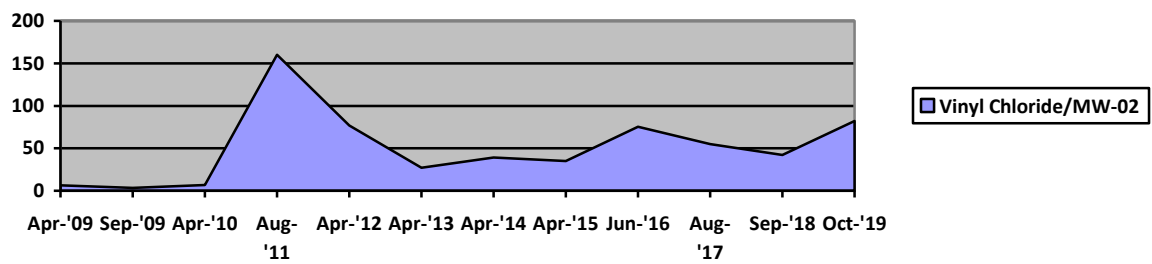
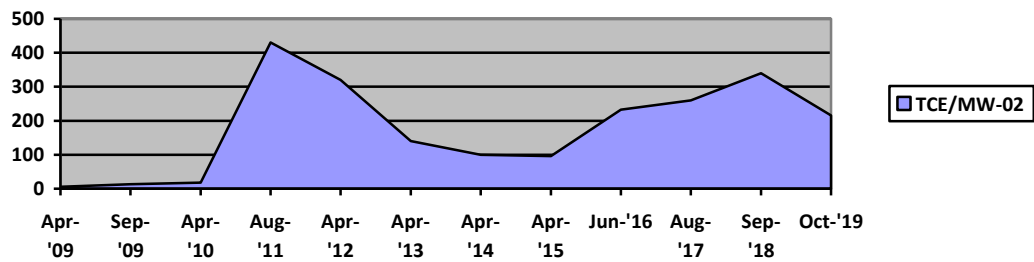
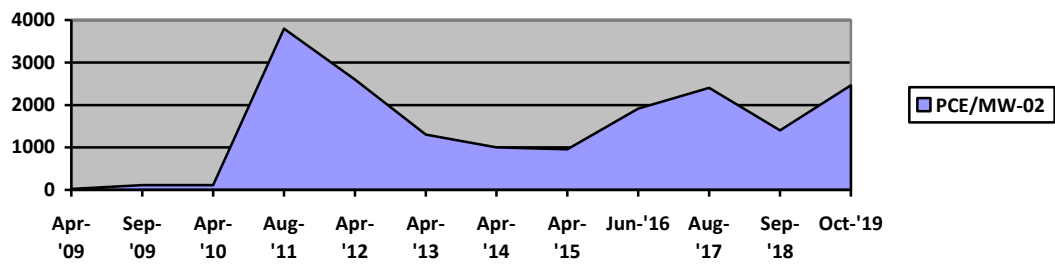
There were no New York State H(WS) Class GA groundwater VOC exceedances in the samples collected from Monitoring Wells MW-01 or MW-05. In terms of data usability, it is the position of this office that, based on the acceptability of the relevant quality controls implemented during sampling and analysis, the data be deemed usable for making environmental decisions.

TABLE 1 LOOHN’S CLEANERS AND LAUNDERERS MONITORING WELL SAMPLING QA/QC FIELD DUPLICATE SAMPLE DATA (µg/L) October 2019			
ANALYTE NAME	MW-04-OCT19 RESULT	MW-44-OCT19 RESULT	RPD
cis-1,2-Dichloroethene	9.04	8.42	7.10
Trichloroethene	14.9	14.3	4.10
Tetrachloroethene	89.4	92.2	3.10
QC FIELD RINSATE BLANK SAMPLE DATA (µg/L)			
ANALYTE NAME	RB-01-OCT19 RESULT		
Toluene	0.56		-
QC FIELD TRIP BLANK SAMPLE DATA (µg/L)			
ANALYTE NAME	TB-01-OCT19 RESULT		
NON-DETECTED	NON-DETECTED		-

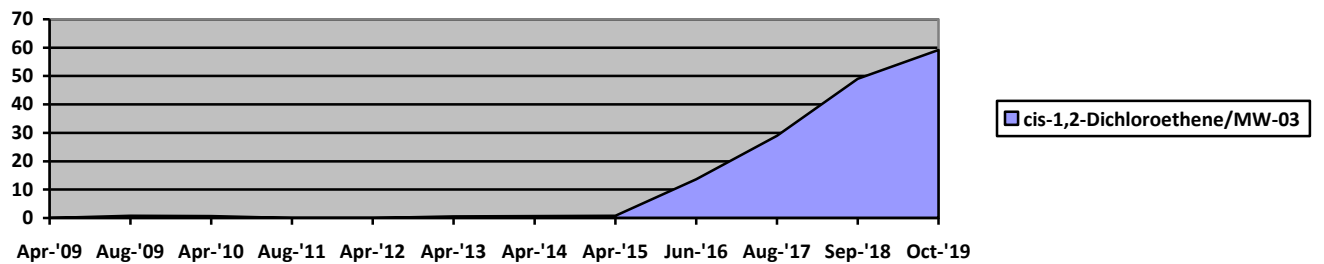
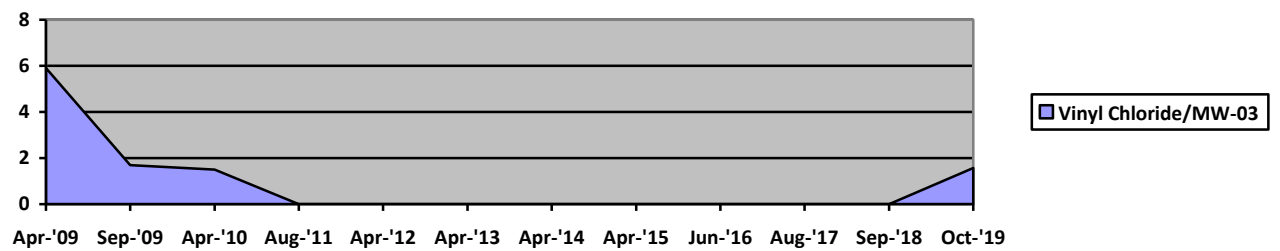
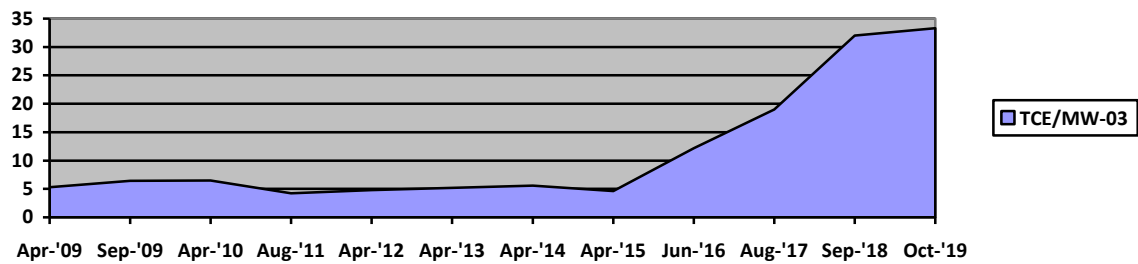
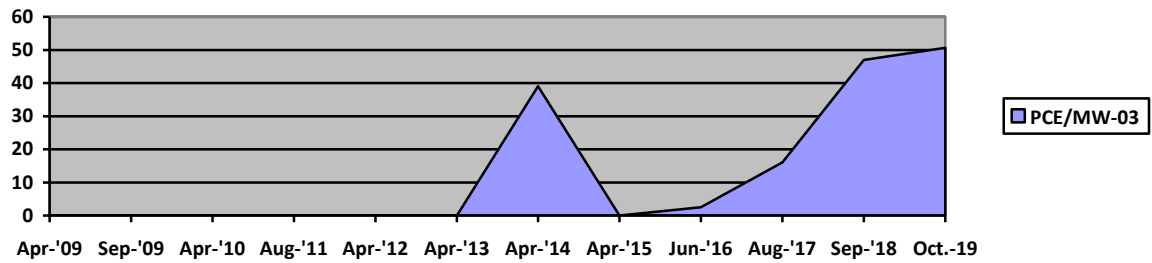
4.0 HISTORIC DATA MW-01 (2009-2019)



MW-02 (2009-2019)

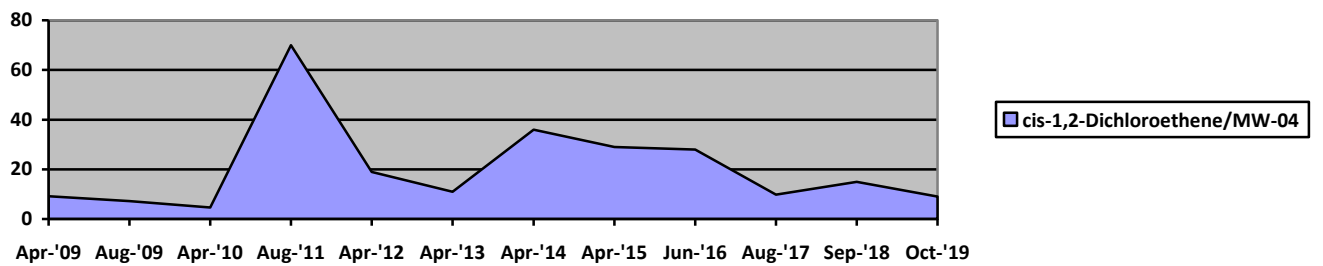
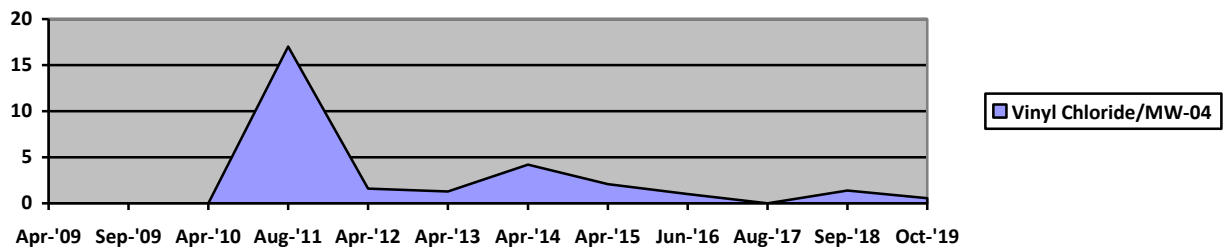
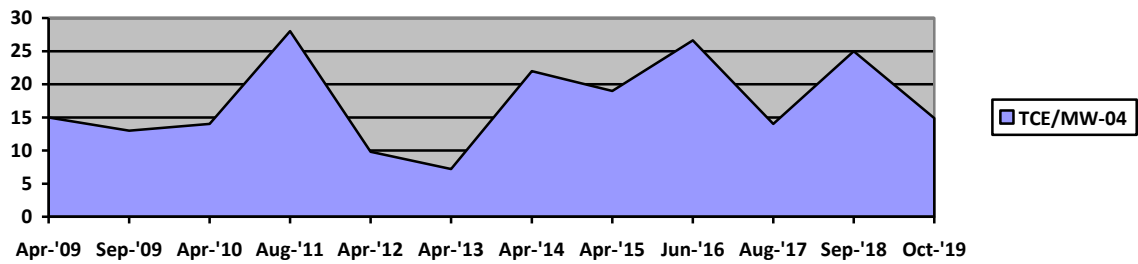
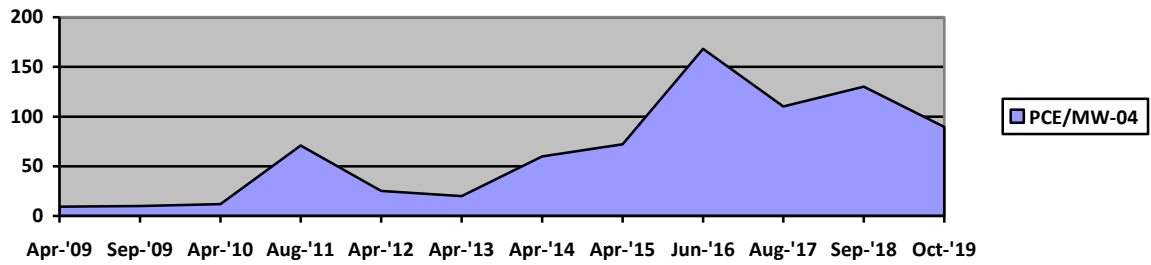


4.0 HISTORIC DATA MW-03 (2009-2019)

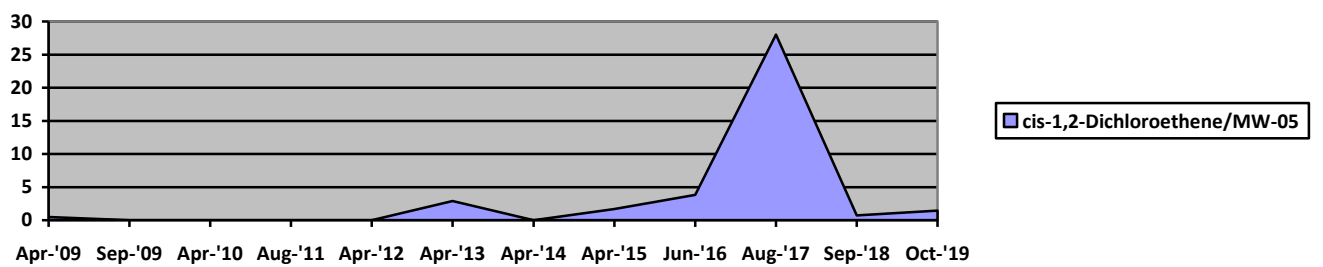
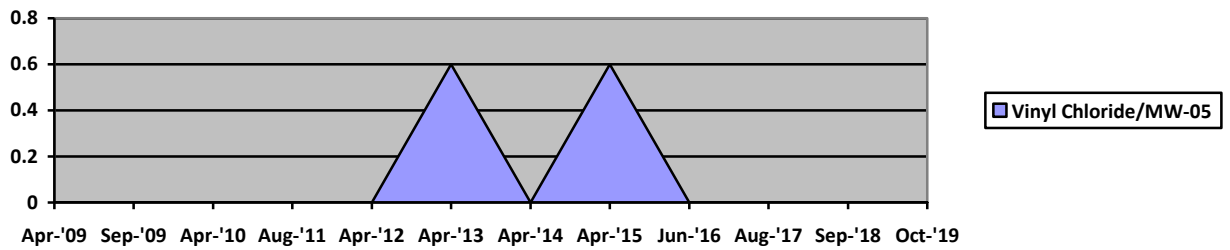
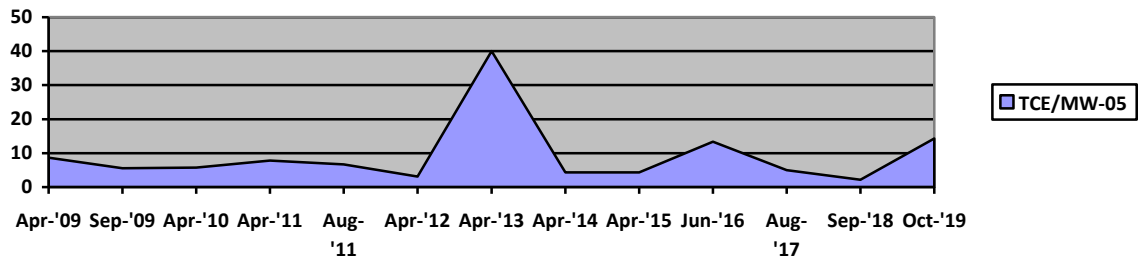
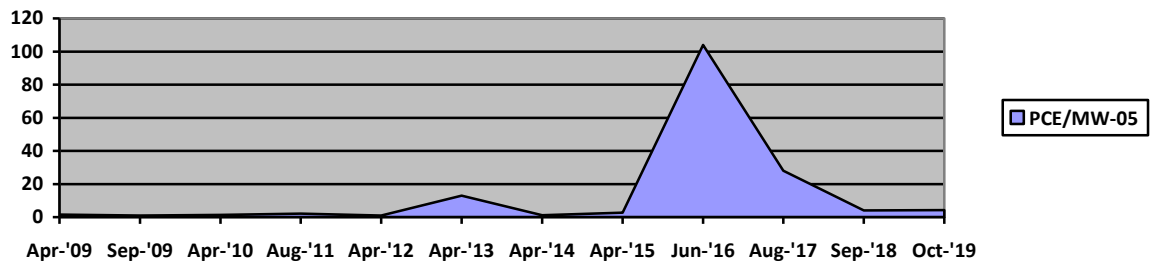


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4.0 HISTORIC DATA MW-04 (2009-2019)



4.0 HISTORIC DATA MW-05 (2009-2019)



ATTACHMENT I

SAMPLE DATA SUMMARY TABLES

APPENDIX A

Site Map

APPENDIX B

The Loohn's Dry Cleaners and Launderers Property Superfund Site Quality Assurance Project Plan

APPENDIX C

U.S. EPA, Region 2 LSASD Laboratory Data Package

APPENDIX D

Trip Report