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Date: March 29, 2022
Symbol: EPC-DO-22-093
LA-UR-22-22506

Mr. Rick Shean, Chief
Hazardous Waste Bureau
New Mexico Environment Department
2905 Rodeo Park Drive East, Building 1
Santa Fe, NM 87505-6313

Subject: Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report,
February 2022 (Quarter 18), Los Alamos National Laboratory, EPA ID# NM0890010515

Dear Mr. Shean:

Enclosed is the *Technical Area 63 (TA-63) Transuranic Waste Facility Soil Vapor Monitoring System Report, February 2022 (Quarter 18)* in accordance with the Los Alamos National Laboratory (LANL) Hazardous Waste Facility Permit (the Permit) Section 3.14.3.

The Permit requires that the soil vapor monitoring system at the LANL TA-63 Transuranic Waste Facility be sampled and evaluated for designated volatile organic compounds on a quarterly basis to ensure protection of environmental health and safety, including that of onsite workers. The enclosed report provides the results of sampling conducted on February 1, 2022 for the eighteenth quarter following the start of operations in October 2017. The sampling results indicate that vapor concentrations at the site do not exceed the soil gas screening levels established by the Permit.

In compliance with Permit Section 1.9.16, a report certification is included with this submittal. A compact disc with copies of the report and the analytical data in an Excel format is also included to facilitate the review of the monitoring results.

If you have any questions or comments concerning this report, please contact Karen E. Armijo, Department of Energy National Nuclear Security Administration Los Alamos Field Office, at (505) 665-7314 or by email at karen.armijo@nnsa.doe.gov or Patrick L. Padilla, Triad National Security, LLC, at (505) 412-0462 or by email at plpadilla@lanl.gov.

Sincerely,

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Los Alamos National Laboratory

Sincerely,

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Karen E. Armijo
Permitting and Compliance Program Manager
National Nuclear Security Administration
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U.S. Department of Energy

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Enclosure: Technical Area 63 (TA-63) Transuranic Waste Facility Soil Vapor Monitoring System Report, February 2022 (Quarter 18), Los Alamos National Laboratory, EPA ID# NM0890010515

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MAR 29 2022

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In compliance with Permit Section 1.9.16, a report certification is included with this submittal. A compact disc with copies of the report and the analytical data in an Excel format is also included to facilitate the review of the monitoring results.

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ENCLOSURE 1

*Technical Area 63 (TA-63) Transuranic Waste Facility
Soil Vapor Monitoring System Report February 2022
(Quarter 18)*

Date: March 29, 2022

EPC-DO-22-093

LA-UR-22-22506

Los Alamos National Laboratory
EPA ID# NM0890010515

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CERTIFICATION

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Certification

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision according to a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

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Jennifer E. Payne
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Los Alamos National Laboratory

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Karen E. Armijo
Permitting and Compliance Program Manager
National Nuclear Security Administration
Los Alamos Field Office
U.S. Department of Energy

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Technical Area 63 (TA-63) Transuranic Waste Facility Soil Vapor Monitoring System Report, February 2022 (Quarter 18) Los Alamos National Laboratory, EPA ID# NM0890010515

I Introduction

This report provides the February 2022 (Quarter 18) soil vapor sampling results from the Technical Area 63 (TA-63) Transuranic Waste Facility (TWF) soil vapor monitoring network at Los Alamos National Laboratory (LANL). Collection and analyses of samples from the TWF vapor monitoring wells evaluates vapor-phase contaminants that potentially migrate from TA-50 Material Disposal Area (MDA) C, Solid Waste Management Unit 50-009. MDA C is managed under the Compliance Order on Consent (Consent Order). The TWF is located southeast of MDA C. Quarterly sampling is required by the LANL Hazardous Waste Facility Permit (Permit) Section 3.14.3, *Subsurface Vapor Monitoring*, to prevent worker exposure to potentially harmful levels of volatile organic compounds (VOCs) at the site.

Sampling and laboratory analytical results for Quarter 18 confirm that VOC concentrations in the soil gas at the site are stable and do not exceed the screening levels established by the Permit. This report also presents a statistical analysis of the soil vapor data as part of an on-going review to determine the need for continued sampling on a quarterly basis.

II Background

On December 23, 2013, the New Mexico Environment Department-Hazardous Waste Bureau (NMED-HWB) approved a Permit modification for the construction of the TWF. Soil vapor monitoring wells were installed in August 2015 and baseline soil vapor monitoring samples were collected, as required by Permit Section 3.14.3, in September 2015. A corresponding report was submitted to the NMED-HWB on October 29, 2015 (LANL 2015). The September 2015 sampling event represents the first quarterly sampling event and coincides with commencement of waste activities at the site. Quarterly reports for the last seventeen quarters are listed in the reference section (LANL 2017 through LANL 2021d; LANL 2021f).

The TWF soil vapor monitoring network consists of five soil vapor monitoring wells located in or near the permitted storage area at the TWF. The vapor monitoring wells were installed as specified in Permit Section A.6.10, *Subsurface Vapor Monitoring*. Figure 1. Soil Vapor Monitoring Well Locations at TA-63 TWF, depicts the locations of the five soil vapor monitoring wells that comprise the TWF soil vapor monitoring network. Vapor monitoring well (VMW)-1 (LANL Structure Number 63-2009) and VMW-2 (63-2010) are located proximal to the TWF storage building foundations and adjacent to the unit boundary that faces the utility corridor on Puye Road and MDA C. A third vapor monitoring well, VMW-3 (63-2011), is located within the permitted unit at a point on the western edge of the unit and close to the utility corridor on Pajarito Road. The sampling ports for VMW-1, VMW-2, and VMW-3 are located at a 5-foot (ft) nominal depth below the concrete pad of the TWF permitted storage unit. Two vapor monitoring wells, VMW-4 (63-2012) and VMW-5 (63-2013), are located outside the permitted unit, across Puye Road to the north and closer to MDA C. There are two sampling ports in VMW-4 and VMW-5 at depths of 25 and 60 ft below the ground surface. Each vapor monitoring well and vapor monitoring port are sampled during quarterly sampling events, for a total of seven (7) vapor samples.

The Permit presents action levels within Permit Tables 3.14.3.1, 3.14.3.2, and 3.14.3.3 (Permit Tables) for VOC constituents of concern from the contaminant plume from MDA C. Each Permit Table presents soil gas screening levels (SGSLs) for each of the vapor monitoring well monitoring sample ports at 5 ft, 25 ft, and 60 ft. The SGSLs are based on U.S. Environmental Protection Agency (EPA) guidance. References to the guidance and an explanation of the calculations used to develop the SGSLs are presented in Permit Section 3.14.3, *Subsurface Vapor Monitoring*. All VOC laboratory analytical sampling results are compared with the SGSLs, where listed. The primary constituent of concern at the site is trichloroethylene (TCE).

III Soil Vapor

Field work for the Quarter 18 sampling event took place on February 1, 2022. Soil vapor gases were extracted from the monitoring well sample ports through stainless steel tubing into stainless steel SUMMA canisters and submitted for laboratory analysis of VOCs using the EPA TO-15 method. A total of nine (9) samples were collected, including one field duplicate from VMW-1 5-ft port and one field blank sample. The samples were analyzed for the constituents identified in the Permit Tables. There were no variances in the sampling procedures from the Permit requirements.

IV Analytical Results

A summary of the laboratory analytical results for the relevant VOCs detected in Quarter 18 is presented in Table 1, Detected Volatile Organic Compounds at TA-63 Transuranic Waste Facility – Quarter 18. The detected VOCs, both non-qualified and estimated or J-flagged detects are presented in the table. The data continue to demonstrate that detected concentrations of TCE and other VOCs do not exceed the relevant SGSLs in the Permit Tables. Laboratory analyses indicate that some constituents are detected above laboratory report detection limits. Each well port depth and constituent of concern have an associated SGSL, for comparison with the analytical results. The table also includes a calculated percentage of the analytical results compared with the relevant SGSL to demonstrate the relative constituent concentrations compared with the action levels.

Laboratory results are processed through LANL's Sample Management Office for quality assurance/quality control. Detected results for this quarter are presented in Table 2, VOC Analytical Results for Soil Vapor Monitoring Wells at TA-63 Transuranic Waste Facility – Quarter 18. The full data set, that also include non-detects, are presented as an Excel file which is included on the disc submitted with this report.

NMED-HWB correspondence dated May 23, 2018 (NMED 2018), requires reporting of current and previous sampling results. Table 3, Current and Previous Analytical Results for Constituents Listed in Permit Tables, presents the current and previous quarterly soil gas laboratory analytical results for comparison and tracking.

Overall, TCE consistently demonstrates the highest VOC concentration at the site. It is present in all five of the vapor sampling wells at all port depths. The detected concentrations are highest closer to MDA C. Vapor monitoring wells VMW-4 and VMW-5 are the closest vapor monitoring wells to MDA C. The TCE concentration measured in VMW-4, at the 25-ft port depth, is 2200 micrograms per cubic meter ($\mu\text{g}/\text{m}^3$), 1.4% of the SGSL, and $6400 \mu\text{g}/\text{m}^3$ at the 60-ft port depth, 6.9% of the SGSL. The TCE concentration measured in VMW-5, at the 25-ft port depth, is $350 \mu\text{g}/\text{m}^3$, 0.2% of the SGSL, and $1200 \mu\text{g}/\text{m}^3$, at the 60-ft port depth, 1.3% of the SGSL. The vapor monitoring wells closest to TWF (VMW-1, VMW-2, and VMW-3) demonstrate TCE

concentrations that are a fraction of a percent of the relevant SGSLs, ranging from 0.2% to 0.4%.

Chloroform is routinely present in soil gas samples collected from vapor monitoring wells VMW-4 and VMW-5. The results for VMW-4 are above the report detection limits, whereas the results for VMW-5 are estimated, J-flagged concentrations. The concentrations of chloroform in vapor monitoring well VMW-4 are 68 µg/m³, 0.3% of the SGSL, and 170 µg/m³, 0.4% of the SGSL, in the 25-ft and 60-ft sampling ports, respectively. The concentrations of chloroform in vapor monitoring well VMW-5 are 32 µg/m³, 0.2% of the SGSL, and 16 µg/m³, <0.1% of the SGSL, in the 25-ft and 60-ft sampling ports, respectively.

Vapor monitoring wells VMW-4 and VMW-5 also consistently demonstrate concentrations above the laboratory report detection limits for dichlorodifluoromethane, tetrachloroethylene, and carbon tetrachloride. The concentrations for these VOCs are very low, at 0.1% or less of the relevant SGSLs.

On December 16, 2021 notification of a newly detected constituent was made to NMED-HWB (LANL 2021e), as required by Permit Section 3.14.3. The analytical results for the sample collected from VMW-1 indicated the detection of a new constituent, xylene[1,3-]+xylene[1,4-] (m-xylene and p-xylene), below the laboratory report detection limit. Review of the analytical laboratory data did not indicate a data quality error. As stated in the LANL notification and in NMED-HWB's March 2, 2022 correspondence (NMED 2022), during the February 2022 sampling event, a field duplicate sample was collected from VMW-1, in addition to the regular sample, to check for the presence of xylene isomers. The laboratory analytical results for both of the samples do not indicate the presence of xylene isomers in Quarter 18. The xylene isomers will continue to be monitored for in future events.

Additional Analytic Results Discussion

A notification of additional constituents, as required by Permit Section 3.14.3, was submitted to NMED-HWB (LANL 2020b) regarding data anomalies in Quarter 10 (LANL 2020c) for the field duplicate sample collected at vapor monitoring well VMW-5, 60-ft port. The VOCs included tetrahydrofuran, ethanol, propanol[2-] (isopropyl alcohol), and 2-butanone. The Permit Tables list 2-butanone (methylethylketone) but do not list the other constituents. In Quarter 16, the field duplicate for VMW-5, 60-ft port, demonstrated a detection of ethanol at 30 µg/m³ (J-flagged). The note for this sample indicated that the laboratory control sample percent recovery was less than the lower acceptable limit but greater than or equal to the rejection limit. The Quarter 18 sampling results do not indicate the presence of tetrahydrofuran, ethanol, propanol[2-] (isopropyl alcohol), or 2-butanone.

Ethanol and propanol[2-] (isopropyl alcohol) have been detected at estimated, J-flagged concentrations in vapor monitoring well VMW-1 and VMW-4 in previous sampling events. Neither of these constituents are listed in the Permit Tables, so there are no associated Permit SGSLs for comparison. In Quarter 12 (LANL 2020e), vapor monitoring well VMW-1, 5-ft port, and VMW-4, 25-ft port, analytical results indicated the presence of ethanol and propanol[2-] (isopropyl alcohol). Quarter 14 (LANL 2021b) analytical results for vapor monitoring well VMW-4, 60-ft port, demonstrated the presence of propanol[2-] (isopropyl alcohol) at 19 µg/m³. The Quarter 18 sampling results detect the presence of propanol[2-] in the field duplicate sample for VWM-1 at 17 µg/m³.

Field blank sample analytical results starting in Quarter 6 through Quarter 14 (LANL 2019a through LANL 2021b) indicated the presence of ethylbenzene and xylene isomers. At the time, these constituents were not present in any samples collected directly from the five soil vapor monitoring wells. In correspondence dated March 26, 2021 (NMED 2021), the NMED-HWB required that the source of the field blank contamination be identified. Field blanks are collected onsite during sampling events to detect and identify contaminants from the sampling site. An ultra-high pure nitrogen tank is used as the vapor source for the field blank. The nitrogen tank is connected to a SUMMA canister, which is then sent to the analytical laboratory, along with the other samples, for analysis. Before the Quarter 15 sampling event, a new ultra-high pure nitrogen tank was purchased and used for field blank sample collection, which resulted in no detectable amounts of ethylbenzene or xylene isomers. The Quarter 18 sampling event field blank results continue to demonstrate no detectable amounts xylene isomers or ethylbenzene. It appears that the field blank issue is resolved.

V Statistics

Statistical analyses focusing on TCE, which is the primary soil vapor constituent detected during the TWF operating period, are computed to further analyze constituent concentrations and potential data trends. Table 4, Statistical Analyses, presents the mean and standard deviation for the quarterly TCE concentrations over time to determine whether the concentrations of TCE can be described statistically within a range of defined concentrations.

The detected concentrations of TCE to date remain within the limits of a two standard deviation interval of the sample above and below the statistical mean values, with a confidence probability of 95%. Two near-range exceptions are associated with the data from the 25-ft ports of vapor monitoring wells VMW-4 and VMW-5. A three standard deviation calculation for these wells, see Table 4, demonstrates that the concentrations for data exceptions fall within a range with a confidence probability of 99%. This result means that no significant deviations are observed for the average TCE concentrations for each well and sampling port to that approximate level of confidence.

Figures 2 and 3 present data plots of TCE in each well and port to evaluate whether any significant data trends over the sampling quarters are readily discernable. The trend line plots for each well and port depth are relatively flat. There also does not appear to be a relationship between well results that would indicate seasonal variations or indicate plume concentration changes within these wells.

The concentrations detected are also significantly below the permitted maximum SGSL constituent concentrations for TCE (by at least one order of magnitude). The TCE concentrations for the sampling quarters collected to date appear relatively stable.

The data suggest that the constituent concentrations are stable and that any increase in VOC concentrations, which are of concern according to the Permit conditions for reporting, will likely occur slowly over time and will be easily identified without approaching the SGSL action levels.

VI References

- LANL 2015. *TA-63 Transuranic Waste Facility Soil Vapor Monitoring System Report*, (ENV-DO-15-0305), October 29, 2015. Los Alamos National Laboratory, Los Alamos, New Mexico.
- LANL 2017. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 1*, Los Alamos National Laboratory EPA ID #NM0890010515, (EPC-DO:17-560), December 21, 2017. Los Alamos National Laboratory, Los Alamos, New Mexico.
- LANL 2018a. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 2*, Los Alamos National Laboratory EPA ID #NM0890010515, (EPC-DO:18-139) of March 30, 2018. Los Alamos National Laboratory, Los Alamos, New Mexico.
- LANL 2018b. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 3*, Los Alamos National Laboratory EPA ID #NM0890010515, (EPC-DO:18-245) of June 28, 2018. Los Alamos National Laboratory, Los Alamos, New Mexico.
- LANL 2018c. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 4*, Los Alamos National Laboratory EPA ID #NM0890010515, (EPC-DO:18-349) of September 26, 2018. Los Alamos National Laboratory, Los Alamos, New Mexico.
- LANL 2018d. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 5*, Los Alamos National Laboratory EPA ID #NM0890010515, (EPC-DO:18-448) of December 27, 2018. Los Alamos National Laboratory, Los Alamos, New Mexico.
- LANL 2019a. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 6*, Los Alamos National Laboratory EPA ID #NM0890010515, (EPC-DO:19-103) of April 4, 2019. Los Alamos National Laboratory, Los Alamos, New Mexico.
- LANL 2019b. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 7*, Los Alamos National Laboratory EPA ID #NM0890010515, (EPC-DO:19-203) of June 26, 2019. Los Alamos National Laboratory, Los Alamos, New Mexico.
- LANL 2019c. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 8*, Los Alamos National Laboratory EPA ID #NM0890010515, (EPC-DO:19-343) of September 30, 2019. Los Alamos National Laboratory, Los Alamos, New Mexico.
- LANL 2020a. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 9*, Los Alamos National Laboratory EPA ID #NM0890010515, (EPC-DO:19-467) of January 10, 2020. Los Alamos National Laboratory, Los Alamos, New Mexico.
- LANL 2020b. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Additional Information*, Los Alamos National Laboratory EPA ID #NM0890010515, (EPC-DO:20-121) of March 26, 2020. Los Alamos National Laboratory, Los Alamos, New Mexico.
- LANL 2020c. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 10*, Los Alamos National Laboratory EPA ID #NM0890010515, (EPC-DO:20-121) of March 30, 2020. Los Alamos National Laboratory, Los Alamos, New Mexico.

LANL 2020d. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 11*, Los Alamos National Laboratory EPA ID #NM0890010515, (EPC-DO:20-196) of June 30, 2020. Los Alamos National Laboratory, Los Alamos, New Mexico.

LANL 2020e. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 12*, Los Alamos National Laboratory EPA ID #NM0890010515, (EPC-DO:20-302) of October 2, 2020. Los Alamos National Laboratory, Los Alamos, New Mexico.

LANL 2021a. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 13*, Los Alamos National Laboratory EPA ID #NM0890010515, (EPC-DO:20-417) of January 11, 2021. Los Alamos National Laboratory, Los Alamos, New Mexico.

LANL 2021b. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 14*, Los Alamos National Laboratory EPA ID #NM0890010515, (EPC-DO:21-135) of May 3, 2021. Los Alamos National Laboratory, Los Alamos, New Mexico.

LANL 2021c. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 15*, Los Alamos National Laboratory EPA ID #NM0890010515, (EPC-DO:21-181) of June 28, 2021. Los Alamos National Laboratory, Los Alamos, New Mexico.

LANL 2021d. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, November 2021 (Quarter 16)* Los Alamos National Laboratory, EPA ID# NM0890010515, (EPC-DO-21-295) of October 4, 2021. Los Alamos National Laboratory, Los Alamos, New Mexico.

LANL 2021e. *15-Day Notification of Newly Detected Constituent in Vapor Monitoring Well, Technical Area 63, Transuranic Waste Facility, Los Alamos National Laboratory, EPA ID #0890010515*, (EPC-DO-21-394) of December 16, 2021. Los Alamos National Laboratory, Los Alamos, New Mexico.

LANL 2021f. *Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, November 2021 (Quarter 17)* Los Alamos National Laboratory, EPA ID# NM0890010515, (EPC-DO-21-404) of January 3, 2021. Los Alamos National Laboratory, Los Alamos, New Mexico.

NMED 2010. *Los Alamos National Laboratory Hazardous Waste Facility Permit*, issued by New Mexico Environment Department, Hazardous Waste Bureau, November 30, 2010 and subsequent revisions.

NMED 2018. Letter: “*Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 2*, Los Alamos National Laboratory EPA ID#NM0890010515, HWB-LANL-18-016,” dated May 23, 2018. New Mexico Environment Department, Hazardous Waste Bureau, Santa Fe, New Mexico.

NMED 2021. Letter: “*Review Technical Area 63 Transuranic Waste Facility Soil Vapor Monitoring System Report, Quarter 13*, Los Alamos National Laboratory EPA ID#NM0890010515, HWB-LANL-18-016,” dated March 26, 2021. New Mexico Environment Department, Hazardous Waste Bureau, Santa Fe, New Mexico.

NMED 2022. Letter: “*Review Technical Area (TA-63) Transuranic Waste Facility Soil Vapor Monitoring System Report, November 2021 (Quarter 17)*, Los Alamos National Laboratory EPA

ID#NM0890010515, HWB-LANL-22-001," dated March 2, 2022. New Mexico Environment Department, Hazardous Waste Bureau, Santa Fe, New Mexico.

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FIGURES AND TABLES

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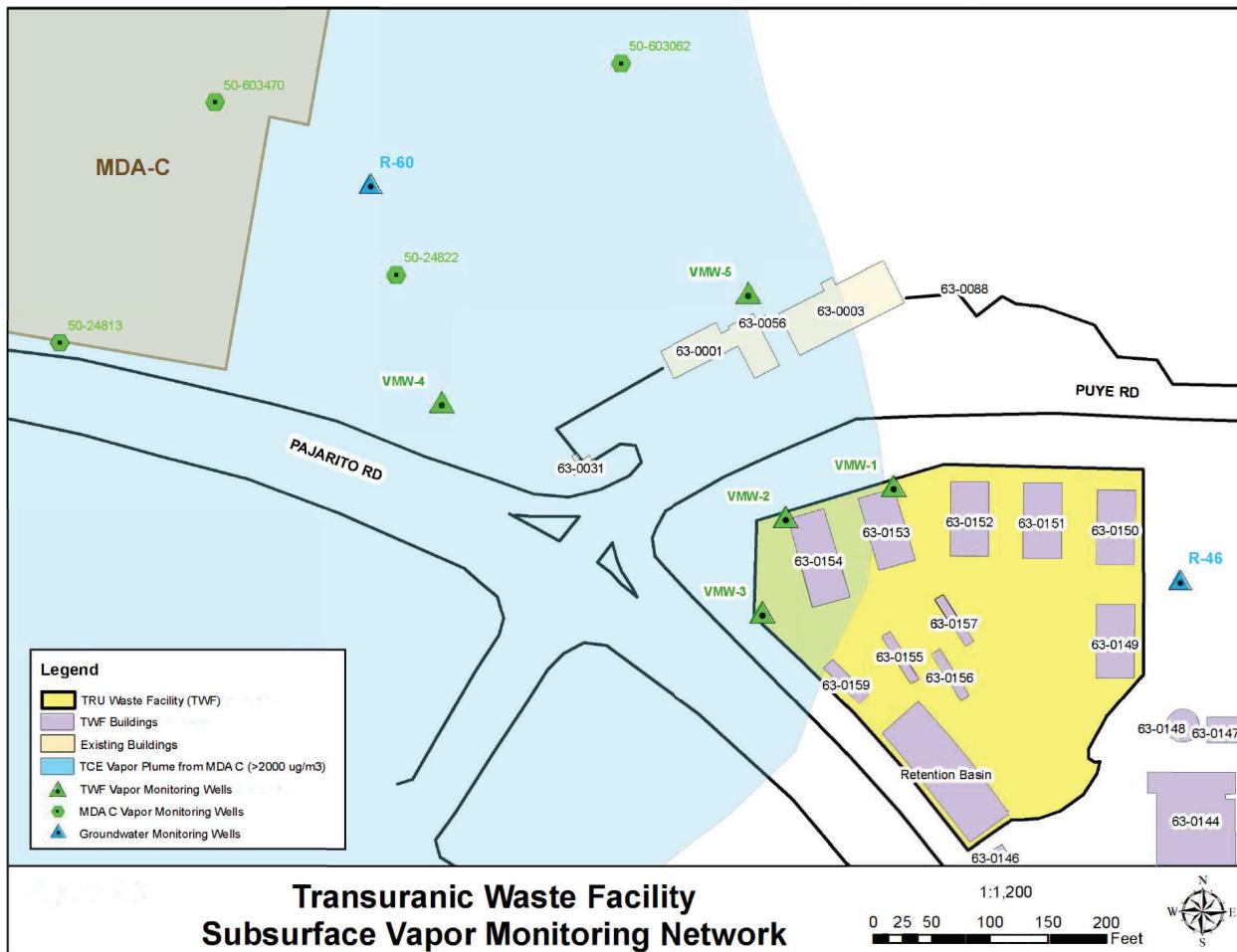


Figure 1. Soil Vapor Monitoring Well Locations at TA-63 TWF

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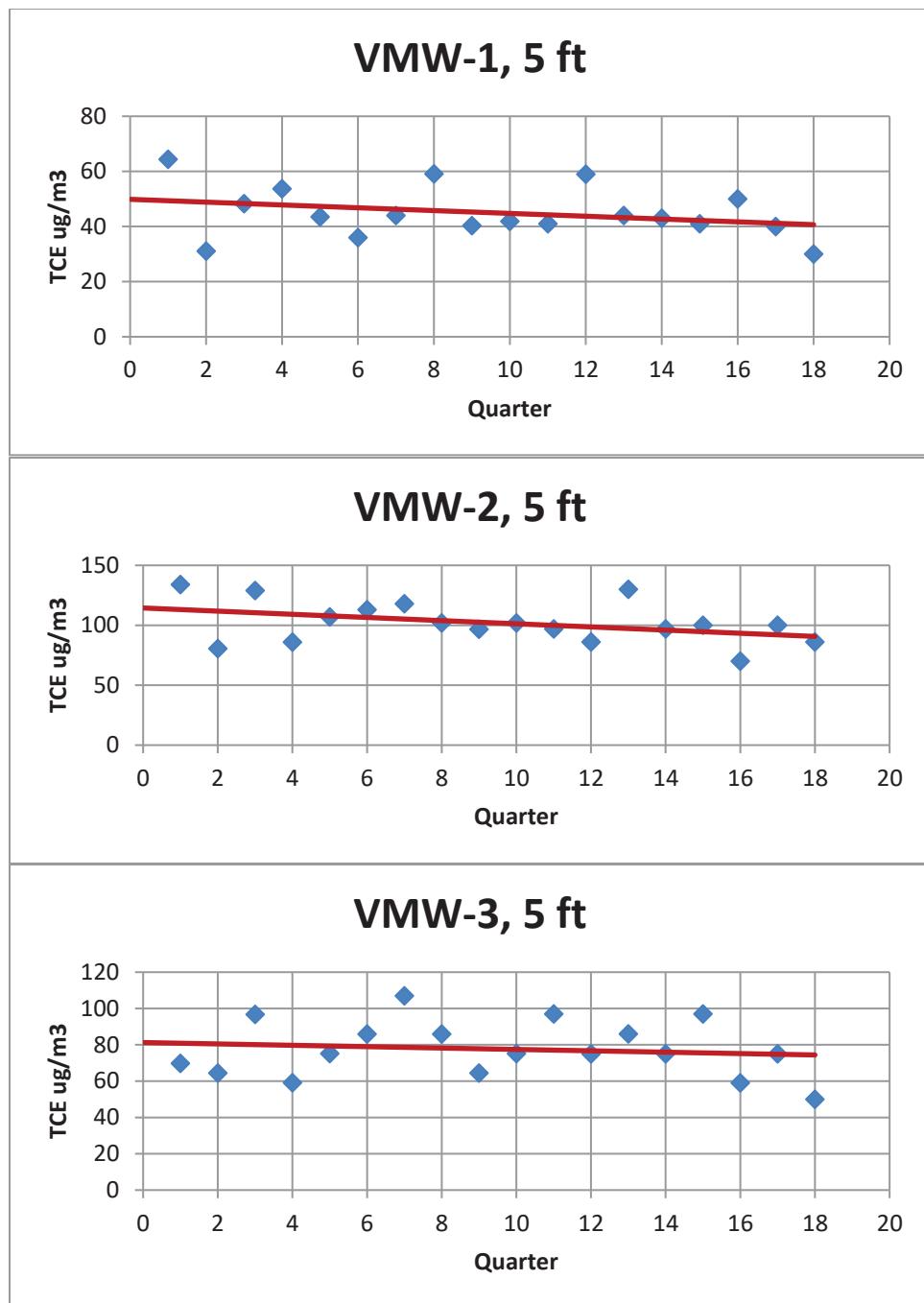


Figure 2. Data Plots for TA-63 TWF Soil Vapor Monitoring Wells Inside of the Permitted Unit

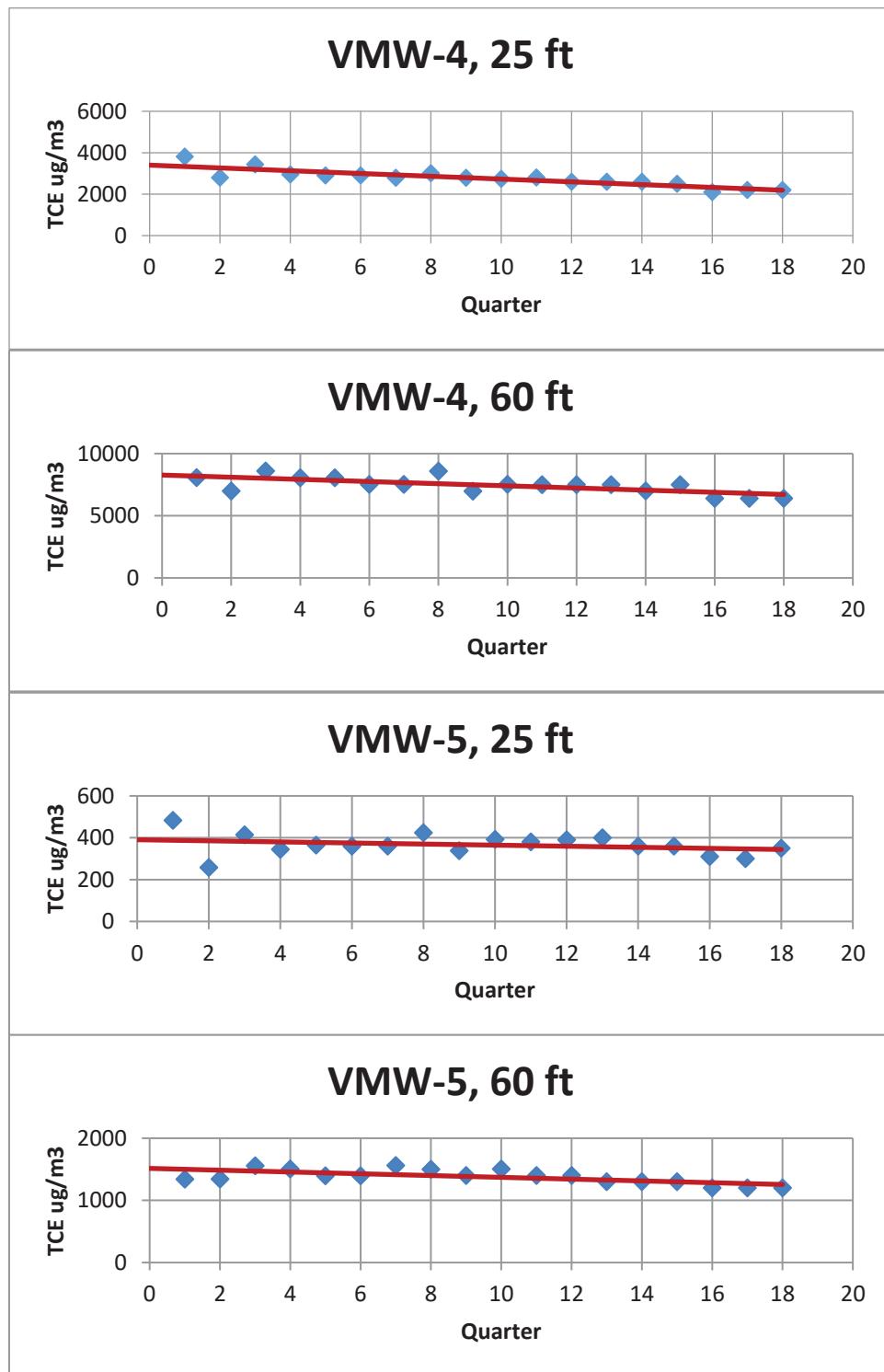


Figure 3. Data Plots for TA-63 TWF Soil Vapor Monitoring Wells Outside of the Permitted Unit

Table 1: Detected Volatile Organic Compounds at TA-63 Transuranic Waste Facility - Quarter 18

Well ID	Field Sample ID	Port Depth	Sample Purpose	Analyte Name	Analyte Listing in Permit	Report Result (ug/m3)	EPA Data Qualifier	Report Detection Limit (ug/m3)	SGSL (ug/m3)	% SGSL
VMW-1 (63-2009)	TWF63-22-239684	5	REG	Trichloroethene	Trichloroethylene	30	J	41	1.94E+04	0.2
Field Duplicate	TWF63-22-239691	5	FD	Propanol[2-]	N/A	17	J	96	N/A	N/A
VMW-1 (63-2009)	TWF63-22-239691	5	FD	Trichloroethene	Trichloroethylene	37	J	42	1.94E+04	0.2
VMW-2 (63-2010)	TWF63-22-239685	5	REG	Trichloroethene	Trichloroethylene	86	NQ	42	1.94E+04	0.4
VMW-3 (63-2011)	TWF63-22-239686	5	REG	Trichloroethene	Trichloroethylene	50	NQ	44	1.94E+04	0.3
VMW-4 (63-2012)	TWF63-22-239687	25	REG	Trichloroethene	Trichloroethylene	2200	NQ	42	1.57E+05	1.4
	TWF63-22-239687	25	REG	Dichlorodifluoromethane	Dichlorodifluoromethane	54	NQ	39	2.61E+06	<0.1
	TWF63-22-239687	25	REG	Tetrachloroethene	Tetrachloroethylene	30	J	54	2.63E+06	<0.1
	TWF63-22-239687	25	REG	Carbon Tetrachloride	Carbon Tetrachloride	40	J	50	1.06E+05	<0.1
	TWF63-22-239687	25	REG	Chloroform	Chloroform	68	NQ	39	2.30E+04	0.3
VMW-4 (63-2012)	TWF63-22-239688	60	REG	Dichlorodifluoromethane	Dichlorodifluoromethane	120	NQ	38	5.38E+06	<0.1
	TWF63-22-239688	60	REG	Trichloro-1,2,2-trifluoroethane[1,1,2-]	1,1,2-Trichloro-1,2,2-trifluoroethane	25	J	59	1.38E+09	<0.1
	TWF63-22-239688	60	REG	Trichloroethene	Trichloroethylene	6400	NQ	41	9.27E+04	6.9
	TWF63-22-239688	60	REG	Chloroform	Chloroform	170	NQ	38	4.44E+04	0.4
	TWF63-22-239688	60	REG	Tetrachloroethene	Tetrachloroethylene	70	NQ	52	2.05E+06	<0.1
	TWF63-22-239688	60	REG	Dichloroethene[cis-1,2-]	cis-1,2-Dichloroethylene	14	J	31	2.91E+06	<0.1
	TWF63-22-239688	60	REG	Carbon Tetrachloride	Carbon Tetrachloride	100	NQ	48	2.13E+05	<0.1
VMW-5 (63-2013)	TWF63-22-239689	25	REG	Dichlorodifluoromethane	Dichlorodifluoromethane	34	J	40	2.61E+06	<0.1
	TWF63-22-239689	25	REG	Trichloroethene	Trichloroethylene	350	NQ	43	1.57E+05	0.2
	TWF63-22-239689	25	REG	Chloroform	Chloroform	32	J	39	2.30E+04	0.1
	TWF63-22-239689	25	REG	Trichloroethane[1,1,1-]	1,1,1-Trichloroethane	12	J	44	1.16E+08	<0.1
VMW-5 (63-2013)	TWF63-22-239690	60	REG	Carbon Tetrachloride	Carbon Tetrachloride	14	J	47	2.13E+05	<0.1
	TWF63-22-239690	60	REG	Dichlorodifluoromethane	Dichlorodifluoromethane	50	NQ	37	5.38E+06	<0.1
	TWF63-22-239690	60	REG	Trichloroethene	Trichloroethylene	1200	NQ	40	9.27E+04	1.3
	TWF63-22-239690	60	REG	Chloroform	Chloroform	16	J	37	4.44E+04	<0.1
	TWF63-22-239690	60	REG	Trichloroethane[1,1,1-]	1,1,1-Trichloroethane	35	J	41	2.34E+08	<0.1

Notes: EPA Data Qualifier "J" indicates analytes that are detected but results are estimated as less than the report detection limit

EPA Data Qualifier "NQ" indicates analytes that are detected above the report detection limit with no data qualifiers

REG = regular sample

FD = field duplicate

SGSL = Soil Gas Screening Level from Permit Tables 3.14.3.1 through 3.14.3.3

N/A = Not Applicable (Propanol[2-]/Ethanol is not listed in the Permit Tables)

Table 2: Volatile Organic Compound Analytical Results for Soil Vapor Monitoring Wells at TA-63 Transuranic Waste Facility - Quarter 18

Location ID	Port Depth (ft)	Field Sample ID	Sample Date	Analysis Date	Method Category	Lab Method	Sample Purpose	Sample Type	Parameter Code	Parameter Name	Report Result ($\mu\text{g}/\text{m}^3$)	Validation Qualifier	Report Method Detection Limit ($\mu\text{g}/\text{m}^3$)	Report Detection Limit ($\mu\text{g}/\text{m}^3$)	Detected
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-41-4	Ethylbenzene	33	U	12.0	33	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-42-5	Styrene	32	U	11.0	32	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-44-7	Benzyl Chloride	39.0	U	12.0	39	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	10061-01-5	Dichloropropene[cis-1,3-]	34	U	4	34	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	10061-02-6	Dichloropropene[trans-1,3-]	34	U	10.0	34	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	103-65-1	Propylbenzene[1-]	37	U	15	37	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-46-7	Dichlorobenzene[1,4-]	46	U	9.6	46	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	74-83-9	Bromomethane	100	U	50.0	100	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	74-87-3	Chloromethane	60	U	23	60	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-00-3	Chloroethane	80	U	30.0	80	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-01-4	Vinyl Chloride	19	U	8.7	19	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-09-2	Methylene Chloride	100	U	25.0	100	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-15-0	Carbon Disulfide	90	U	13	90	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-25-2	Bromoform	79	U	20	79	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-27-4	Bromodichloromethane	51	U	15	51	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	64-17-5	Ethanol	72	U	55.0	72	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-63-0	Propanol[2-]	93	U	16	93	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-64-1	Acetone	70	U	28.0	70	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-66-3	Chloroform	37	U	8.3	37	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	71-43-2	Benzene	24	U	3.5	24	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	71-55-6	Trichloroethane[1,1,1-]	41	U	10	41	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	156-60-5	Dichloroethene[trans-1,2-]	30	U	13	30	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	1634-04-4	Methyl tert-Butyl Ether	27	UJ	10	27	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	540-84-1	Isooctane	35	U	11	35	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	541-73-1	Dichlorobenzene[1,3-]	46	U	11	46	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	56-23-5	Carbon Tetrachloride	48	U	12	48	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	591-78-6	Hexanone[2-]	100	U	25.0	100	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	622-96-8	Ethyltoluene[4-]	37	U	15.0	37	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-34-3	Dichloroethane[1,1-]	31	U	6.5	31	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-35-4	Dichloroethene[1,1-]	30	U	6	30	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-69-4	Trichlorofluoromethane	43	U	17.0	43	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-71-8	Dichlorodifluoromethane	38	U	9	38	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	76-13-1	Trichloro-1,2,2-trifluoroethane[1,1,2-]	58	U	14.0	58	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	76-14-2	Dichloro-1,1,2,2-tetrafluoroethane[1,2-]	53	U	15.0	53	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	78-87-5	Dichloropropane[1,2-]	35	U	7.4	35	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	78-93-3	Butanone[2-]	90	U	32	90	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-00-5	Trichloroethane[1,1,2-]	41	U	8.2	41	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-01-6	Trichloroethene	30	J	17	41	Y
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-34-5	Tetrachloroethane[1,1,2,2-]	52	U	12	52	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	87-68-3	Hexachlorobutadiene	300	U	130.0	300	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-99-0	Butadiene[1,3-]	17	UJ	6.4	17	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	107-05-1	Chloro-1-propene[3-]	90	U	31	90	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	107-06-2	Dichloroethane[1,2-]	31	U	11.0	31	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-10-1	Methyl-2-pentanone[4-]	100	U	34	100	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-67-8	Trimethylbenzene[1,3,5-]	37	U	13.0		

Table 2: Volatile Organic Compound Analytical Results for Soil Vapor Monitoring Wells at TA-63 Transuranic Waste Facility - Quarter 18

Location ID	Port Depth (ft)	Field Sample ID	Sample Date	Analysis Date	Method Category	Lab Method	Sample Purpose	Sample Type	Parameter Code	Parameter Name	Report Result (µg/m³)	Validation Qualifier	Report Method Detection Limit (µg/m³)	Report Detection Limit (µg/m³)	Detected
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	120-82-1	Trichlorobenzene[1,2,4-]	200	U	120.0	200	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	123-91-1	Dioxane[1,4-]	100	U	26	100	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-93-4	Dibromoethane[1,2-]	58	U	14	58	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	156-59-2	Dichloroethene[cis-1,2-]	30.0	U	11.0	30	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	124-48-1	Chlorodibromomethane	65	U	17.0	65	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	127-18-4	Tetrachloroethene	52	U	15.0	52	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	142-82-5	n-Heptane	31	U	11.0	31	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-47-6	Xylene[1,2-]	33	U	8.2	33	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-50-1	Dichlorobenzene[1,2-]	46	U	13	46	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-63-6	Trimethylbenzene[1,2,4-]	37	U	9.3	37	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	98-82-8	Isopropylbenzene	37	U	7.9	37	N
63-2009	5	TWF63-22-239684	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	Xylene[m+p]	Xylene[1,3-]+Xylene[1,4-]	33	U	10	33	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	100-41-4	Ethylbenzene	34	U	12.0	34	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	100-42-5	Styrene	33	U	12.0	33	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	100-44-7	Benzyl Chloride	40	U	13.0	40	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	10061-01-5	Dichloropropene[cis-1,3-]	35	U	4.5	35	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	10061-02-6	Dichloropropene[trans-1,3-]	35	U	10.0	35	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	103-65-1	Propylbenzene[1-]	38	U	15	38	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	106-46-7	Dichlorobenzene[1,4-]	47	U	10.0	47	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	106-93-4	Dibromoethane[1,2-]	60	U	14.0	60	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	106-99-0	Butadiene[1,3-]	17	UJ	7	17	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	107-05-1	Chloro-1-propene[3-]	97	U	30.0	97	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	107-06-2	Dichloroethane[1,2-]	32	U	11	32	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	108-10-1	Methyl-2-pentanone[4-]	130	U	35.0	130	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	108-67-8	Trimethylbenzene[1,3,5-]	38	U	13.0	38	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	108-88-3	Toluene	29	U	3	29	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	108-90-7	Chlorobenzene	36	U	6.9	36	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	109-99-9	Tetrahydrofuran	23	U	8.0	23	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	110-54-3	Hexane	27	UJ	7.7	27	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	110-82-7	Cyclohexane	27	U	11	27	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	120-82-1	Trichlorobenzene[1,2,4-]	230	U	120.0	230	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	123-91-1	Dioxane[1,4-]	110	U	27.0	110	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	124-48-1	Chlorodibromomethane	66	U	17.0	66	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	127-18-4	Tetrachloroethene	53	U	16.0	53	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	142-82-5	n-Heptane	32	U	12.0	32	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	156-59-2	Dichloroethene[cis-1,2-]	31	U	11.0	31	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	156-60-5	Dichloroethene[trans-1,2-]	31	U	13	31	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	1634-04-4	Methyl tert-Butyl Ether	28	UJ	10.0	28	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	540-84-1	Isooctane	36	U	11	36	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	541-73-1	Dichlorobenzene[1,3-]	47	U	11.0	47	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	56-23-5	Carbon Tetrachloride	49	U	12	49	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	591-78-6	Hexanone[2-]	130	U	26	130	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	622-96-8	Ethyltoluene[4-]	38	U	15	38	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	64-17-5	Ethanol	73	U	60	73	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	67-63-0	Propanol[2-]	17	J	17	96	Y
63-2009	5	TWF63-22-239691	02/01/												

Table 2: Volatile Organic Compound Analytical Results for Soil Vapor Monitoring Wells at TA-63 Transuranic Waste Facility - Quarter 18

Location ID	Port Depth (ft)	Field Sample ID	Sample Date	Analysis Date	Method Category	Lab Method	Sample Purpose	Sample Type	Parameter Code	Parameter Name	Report Result ($\mu\text{g}/\text{m}^3$)	Validation Qualifier	Report Method Detection Limit ($\mu\text{g}/\text{m}^3$)	Report Detection Limit ($\mu\text{g}/\text{m}^3$)	Detected
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	74-87-3	Chloromethane	64	U	23	64	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	75-00-3	Chloroethane	82	U	29	82	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	75-01-4	Vinyl Chloride	20	U	9.2	20	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	75-09-2	Methylene Chloride	110	U	26.0	110	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	75-15-0	Carbon Disulfide	96	U	13	96	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	75-25-2	Bromoform	81	U	21	81	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	75-27-4	Bromodichloromethane	52	U	15.0	52	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	75-34-3	Dichloroethane[1,1-]	32	U	6.9	32	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	75-35-4	Dichloroethene[1,1-]	31	U	6.3	31	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	75-69-4	Trichlorofluoromethane	44	U	17	44	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	75-71-8	Dichlorodifluoromethane	39	U	9	39	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	76-13-1	Trichloro-1,2,2-trifluoroethane[1,1,2-]	60	U	14	60	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	76-14-2	Dichloro-1,1,2,2-tetrafluoroethane[1,2-]	54	U	15.0	54	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	78-87-5	Dichloropropane[1,2-]	36	U	7	36	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	78-93-3	Butanone[2-]	91	U	32.0	91	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	79-00-5	Trichloroethane[1,1,2-]	43	U	8	43	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	79-01-6	Trichloroethene	37	J	17.0	42	Y
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	79-34-5	Tetrachloroethane[1,1,2,2-]	54	U	12.0	54	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	87-68-3	Hexachlorobutadiene	330	U	130.0	330	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	95-47-6	Xylene[1,2-]	34	U	8.7	34	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	95-50-1	Dichlorobenzene[1,2-]	47	U	13.0	47	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	95-63-6	Trimethylbenzene[1,2,4-]	38	U	10	38	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	98-82-8	Isopropylbenzene	38	U	7.9	38	N
63-2009	5	TWF63-22-239691	02/01/2022	02/10/2022	VOC	EPA:TO15	FD	GAS	Xylene[m+p]	Xylene[1,3-]+Xylene[1,4-]	34	U	10	34	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-41-4	Ethylbenzene	34	U	12.0	34	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-42-5	Styrene	34	U	12.0	34	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-44-7	Benzyl Chloride	41	U	13.0	41	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	10061-01-5	Dichloropropene[cis-1,3-]	36	U	4.5	36	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	10061-02-6	Dichloropropene[trans-1,3-]	36	U	10	36	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	103-65-1	Propylbenzene[1-]	39	U	15.0	39	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-46-7	Dichlorobenzene[1,4-]	47	U	10.0	47	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-93-4	Dibromoethane[1,2-]	61	U	14	61	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-99-0	Butadiene[1,3-]	17	UJ	7	17	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	107-05-1	Chloro-1-propene[3-]	100	U	30.0	100	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	107-06-2	Dichloroethane[1,2-]	32	U	11	32	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-10-1	Methyl-2-pentanone[4-]	130	U	35.0	130	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-67-8	Trimethylbenzene[1,3,5-]	39	U	14.0	39	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-88-3	Toluene	30	U	3.2	30	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-90-7	Chlorobenzene	36	U	6.9	36	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	109-99-9	Tetrahydrofuran	23	U	8.0	23	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	110-54-3	Hexane	28	UJ	7.7	28	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	110-82-7	Cyclohexane	27	U	11.0	27	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	120-82-1	Trichlorobenzene[1,2,4-]	240	U	120	240	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	123-91-1	Dioxane[1,4-]	120	U	27.0	120	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	124-48-1	Chlorodib					

Table 2: Volatile Organic Compound Analytical Results for Soil Vapor Monitoring Wells at TA-63 Transuranic Waste Facility - Quarter 18

Location ID	Port Depth (ft)	Field Sample ID	Sample Date	Analysis Date	Method Category	Lab Method	Sample Purpose	Sample Type	Parameter Code	Parameter Name	Report Result ($\mu\text{g}/\text{m}^3$)	Validation Qualifier	Report Method Detection Limit ($\mu\text{g}/\text{m}^3$)	Report Detection Limit ($\mu\text{g}/\text{m}^3$)	Detected
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	540-84-1	Isooctane	37	U	11.0	37	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	541-73-1	Dichlorobenzene[1,3-]	47	U	11.0	47	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	56-23-5	Carbon Tetrachloride	50	U	13	50	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	591-78-6	Hexanone[2-]	130	U	26.0	130	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	622-96-8	Ethyltoluene[4-]	39	U	16.0	39	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	64-17-5	Ethanol	80	U	58.0	80	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-63-0	Propanol[2-]	100	U	17.0	100	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-64-1	Acetone	76	U	31.0	76	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-66-3	Chloroform	39	U	9	39	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	71-43-2	Benzene	25	U	4	25	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	71-55-6	Trichloroethane[1,1,1-]	43	U	10	43	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	74-83-9	Bromomethane	120	U	54	120	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	74-87-3	Chloromethane	66	U	23	66	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-00-3	Chloroethane	84	U	29.0	84	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-01-4	Vinyl Chloride	20	U	9.2	20	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-09-2	Methylene Chloride	110	U	27	110	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-15-0	Carbon Disulfide	100	U	13	100	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-25-2	Bromoform	82	U	21	82	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-27-4	Bromodichloromethane	53	U	15.0	53	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-34-3	Dichloroethane[1,1-]	32	U	7	32	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-35-4	Dichloroethene[1,1-]	31	U	6.3	31	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-69-4	Trichlorofluoromethane	44	U	18.0	44	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-71-8	Dichlorodifluoromethane	39	U	9.9	39	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	76-13-1	Trichloro-1,2,2-trifluoroethane[1,1,2-]	61	U	14.0	61	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	76-14-2	Dichloro-1,1,2,2-tetrafluoroethane[1,2-]	55	U	15.0	55	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	78-87-5	Dichloropropane[1,2-]	36	U	7.9	36	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	78-93-3	Butanone[2-]	94	U	32	94	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-00-5	Trichloroethane[1,1,2-]	43	U	9	43	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-01-6	Trichloroethene	86	NQ	18	42	Y
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-34-5	Tetrachloroethane[1,1,2,2-]	54	U	13	54	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	87-68-3	Hexachlorobutadiene	340	U	130.0	340	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-47-6	Xylene[1,2-]	34	U	8.7	34	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-50-1	Dichlorobenzene[1,2-]	47	U	14.0	47	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-63-6	Trimethylbenzene[1,2,4-]	39	U	10	39	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	98-82-8	Isopropylbenzene	39	U	8.4	39	N
63-2010	5	TWF63-22-239685	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	Xylene[m+p]	Xylene[1,3-]+Xylene[1,4-]	34	U	10	34	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	107-06-2	Dichloroethane[1,2-]	33	U	12	33	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-10-1	Methyl-2-pentanone[4-]	130	U	36	130	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-67-8	Trimethylbenzene[1,3,5-]	40	U	14	40	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-88-3	Toluene	31	U	3	31	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-90-7	Chlorobenzene	37	U	7	37	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	109-99-9	Tetrahydrofuran	24	U	8.3	24	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	110-54-3	Hexane	29	UJ	8.1	29	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	110-82-7	Cyclohexane	28	U	11.0	28	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	120-82-1	Trichlorobenzene[1,2,4-]	240	U	130.0	240	N
63-2011</															

Table 2: Volatile Organic Compound Analytical Results for Soil Vapor Monitoring Wells at TA-63 Transuranic Waste Facility - Quarter 18

Location ID	Port Depth (ft)	Field Sample ID	Sample Date	Analysis Date	Method Category	Lab Method	Sample Purpose	Sample Type	Parameter Code	Parameter Name	Report Result ($\mu\text{g}/\text{m}^3$)	Validation Qualifier	Report Method Detection Limit ($\mu\text{g}/\text{m}^3$)	Report Detection Limit ($\mu\text{g}/\text{m}^3$)	Detected
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	156-60-5	Dichloroethene[trans-1,2-]	32	U	14	32	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	1634-04-4	Methyl tert-Butyl Ether	29	UJ	10	29	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	540-84-1	Isooctane	38	U	11	38	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	541-73-1	Dichlorobenzene[1,3-]	49	U	11	49	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	56-23-5	Carbon Tetrachloride	51	U	13	51	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	591-78-6	Hexanone[2-]	130	U	27	130	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	622-96-8	Ethyltoluene[4-]	40	U	16.0	40	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	64-17-5	Ethanol	80	U	60.0	80	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-63-0	Propanol[2-]	100	U	17	100	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-64-1	Acetone	76	U	31	76	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-66-3	Chloroform	40	U	9	40	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	71-43-2	Benzene	26	U	4	26	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	71-55-6	Trichloroethane[1,1,1-]	44	U	10	44	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	74-83-9	Bromomethane	120	U	54	120	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	74-87-3	Chloromethane	66	U	25	66	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-00-3	Chloroethane	84	U	29	84	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-01-4	Vinyl Chloride	21	U	9.5	21	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-09-2	Methylene Chloride	110	U	27	110	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-15-0	Carbon Disulfide	100	U	14	100	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-25-2	Bromoform	84	U	22	84	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-27-4	Bromodichloromethane	54	U	15	54	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-34-3	Dichloroethane[1,1-]	33	U	6.9	33	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-35-4	Dichloroethene[1,1-]	32	U	7	32	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-69-4	Trichlorofluoromethane	45	U	18	45	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	98-82-8	Isopropylbenzene	40	U	8.4	40	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	Xylene[m+p]	Xylene[1,3-]+Xylene[1,4-]	35	U	11	35	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-41-4	Ethylbenzene	35	U	13	35	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-42-5	Styrene	34	U	12	34	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-44-7	Benzyl Chloride	42	U	13	42	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	10061-01-5	Dichloropropene[cis-1,3-]	37	U	5	37	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	10061-02-6	Dichloropropene[trans-1,3-]	37	U	10.0	37	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-71-8	Dichlorodifluoromethane	40	U	10	40	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	76-13-1	Trichloro-1,2,2-trifluoroethane[1,1,2-]	62	U	15.0	62	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	76-14-2	Dichloro-1,1,2,2-tetrafluoroethane[1,2-]	57	U	16.0	57	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	78-87-5	Dichloropropane[1,2-]	37	U	7.9	37	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	78-93-3	Butanone[2-]	94	U	32	94	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-00-5	Trichloroethane[1,1,2-]	44	U	9	44	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-01-6	Trichloroethene	50	NQ	18	44	Y
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-34-5	Tetrachloroethane[1,1,2,2-]	56	U	13	56	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	87-68-3	Hexachlorobutadiene	340	U	140	340	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-47-6	Xylene[1,2-]	35	U	9	35	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-50-1	Dichlorobenzene[1,2-]	49	U	14	49	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-63-6	Trimethylbenzene[1,2,4-]	40	U	10	40	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	103-65-1	Propylbenzene[1-]	40	U	16.0	40	N
63-2011	5	TWF63-22-239686	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-46-7	Dichlorobenzene[1,4-]	49	U	10	49	N
63-2011	5</td														

Table 2: Volatile Organic Compound Analytical Results for Soil Vapor Monitoring Wells at TA-63 Transuranic Waste Facility - Quarter 18

Location ID	Port Depth (ft)	Field Sample ID	Sample Date	Analysis Date	Method Category	Lab Method	Sample Purpose	Sample Type	Parameter Code	Parameter Name	Report Result (µg/m³)	Validation Qualifier	Report Method Detection Limit (µg/m³)	Report Detection Limit (µg/m³)	Detected
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-63-0	Propanol[2-]	100.0	U	17.0	100	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-64-1	Acetone	76	U	31	76	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-66-3	Chloroform	68	NQ	8.8	39	Y
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	71-43-2	Benzene	25	U	4	25	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	71-55-6	Trichloroethane[1,1,1-]	43	U	10	43	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	74-83-9	Bromomethane	120	U	54.0	120	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	74-87-3	Chloromethane	66	U	23.0	66	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-00-3	Chloroethane	84	U	29	84	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-01-4	Vinyl Chloride	20	U	9.2	20	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-09-2	Methylene Chloride	110	U	27	110	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-15-0	Carbon Disulfide	100	U	13.0	100	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-25-2	Bromoform	82	U	21.0	82	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-27-4	Bromodichloromethane	53	U	15.0	53	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-34-3	Dichloroethane[1,1-]	32	U	6.9	32	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-35-4	Dichloroethene[1,1-]	31	U	6	31	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-69-4	Trichlorofluoromethane	44	U	18.0	44	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-71-8	Dichlorodifluoromethane	54	NQ	10	39	Y
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	76-13-1	Trichloro-1,2,2-trifluoroethane[1,1,2-]	61	U	14.0	61	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	76-14-2	Dichloro-1,1,2,2-tetrafluoroethane[1,2-]	55	U	15.0	55	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	78-87-5	Dichloropropane[1,2-]	36	U	7.9	36	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	78-93-3	Butanone[2-]	94	U	32.0	94	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-00-5	Trichloroethane[1,1,2-]	43	U	9	43	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-01-6	Trichloroethene	2200	NQ	18.0	42	Y
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-34-5	Tetrachloroethane[1,1,2,2-]	54	U	13.0	54	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	87-68-3	Hexachlorobutadiene	340	U	130.0	340	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-47-6	Xylene[1,2-]	34	U	8.7	34	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-50-1	Dichlorobenzene[1,2-]	47	U	14	47	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-63-6	Trimethylbenzene[1,2,4-]	39	U	9.8	39	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	98-82-8	Isopropylbenzene	39	U	8	39	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	Xylene[m+p]	Xylene[1,3-]+Xylene[1,4-]	34	U	10.0	34	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-41-4	Ethylbenzene	34	U	12.0	34	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-42-5	Styrene	34	U	12.0	34	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-44-7	Benzyl Chloride	41	U	13	41	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	10061-01-5	Dichloropropene[cis-1,3-]	36	U	4.5	36	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	10061-02-6	Dichloropropene[trans-1,3-]	36	U	10	36	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	103-65-1	Propylbenzene[1-]	39	U	15	39	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-46-7	Dichlorobenzene[1,4-]	47	U	10	47	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-93-4	Dibromoethane[1,2-]	61	U	14.0	61	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-99-0	Butadiene[1,3-]	17	UJ	7	17	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	107-05-1	Chloro-1-propene[3-]	100	U	30	100	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	107-06-2	Dichloroethane[1,2-]	32	U	11	32	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-10-1	Methyl-2-pentanone[4-]	130	U	35.0	130	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-67-8	Trimethylbenzene[1,3,5-]	39	U	14	39	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-88-3	Toluene	30	U	3.2	30	N
63-2012	25	TWF63-22-239													

Table 2: Volatile Organic Compound Analytical Results for Soil Vapor Monitoring Wells at TA-63 Transuranic Waste Facility - Quarter 18

Location ID	Port Depth (ft)	Field Sample ID	Sample Date	Analysis Date	Method Category	Lab Method	Sample Purpose	Sample Type	Parameter Code	Parameter Name	Report Result (µg/m³)	Validation Qualifier	Report Method Detection Limit (µg/m³)	Report Detection Limit (µg/m³)	Detected
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	124-48-1	Chlorodibromomethane	67	U	17	67	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	127-18-4	Tetrachloroethene	30	J	16.0	54	Y
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	142-82-5	n-Heptane	32	U	12.0	32	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	156-59-2	Dichloroethene[cis-1,2-]	31	U	11.0	31	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	156-60-5	Dichloroethene[trans-1,2-]	31	U	14	31	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	1634-04-4	Methyl tert-Butyl Ether	28	UJ	10	28	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	540-84-1	Isooctane	37	U	11	37	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	541-73-1	Dichlorobenzene[1,3-]	47	U	11.0	47	N
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	56-23-5	Carbon Tetrachloride	40	J	13.0	50	Y
63-2012	25	TWF63-22-239687	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	591-78-6	Hexanone[2-]	130	U	26.0	130	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	541-73-1	Dichlorobenzene[1,3-]	46	U	11	46	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	56-23-5	Carbon Tetrachloride	100	NQ	12.0	48	Y
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	591-78-6	Hexanone[2-]	130	U	26.0	130	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	622-96-8	Ethyltoluene[4-]	38	U	15.0	38	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	64-17-5	Ethanol	72	U	60	72	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-63-0	Propanol[2-]	93	U	17	93	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-64-1	Acetone	74	U	28	74	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-66-3	Chloroform	170	NQ	8	38	Y
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	71-43-2	Benzene	25	U	3.8	25	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	71-55-6	Trichloroethane[1,1,1-]	42	U	9.8	42	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-71-8	Dichlorodifluoromethane	120	NQ	9	38	Y
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	76-13-1	Trichloro-1,2,2-trifluoroethane[1,1,2-]	25	J	14	59	Y
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	76-14-2	Dichloro-1,1,2,2-tetrafluoroethane[1,2-]	54	U	15	54	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	78-87-5	Dichloropropane[1,2-]	36	U	7.4	36	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	78-93-3	Butanone[2-]	91	U	32	91	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-00-5	Trichloroethane[1,1,2-]	42	U	8.2	42	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-01-6	Trichloroethene	6400	NQ	17.0	41	Y
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-34-5	Tetrachloroethane[1,1,2,2-]	53	U	12.0	53	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	87-68-3	Hexachlorobutadiene	330	U	130.0	330	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-47-6	Xylene[1,2-]	33	U	8.7	33	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-50-1	Dichlorobenzene[1,2-]	46	U	13.0	46	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-63-6	Trimethylbenzene[1,2,4-]	38	U	10	38	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	98-82-8	Isopropylbenzene	38	U	8	38	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	Xylene[m+p]	Xylene[1,3-]+Xylene[1,4-]	33	U	10	33	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-41-4	Ethylbenzene	33	U	12	33	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-42-5	Styrene	33	U	12.0	33	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-44-7	Benzyl Chloride	40	U	12	40	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	10061-01-5	Dichloropropene[cis-1,3-]	35	U	4.5	35	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	10061-02-6	Dichloropropene[trans-1,3-]	35	U	10	35	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	103-65-1	Propylbenzene[1-]	38	U	15.0	38	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-46-7	Dichlorobenzene[1,4-]	46	U	10.0	46	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-93-4	Dibromoethane[1,2-]	59	U	14.0	59	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15</td									

Table 2: Volatile Organic Compound Analytical Results for Soil Vapor Monitoring Wells at TA-63 Transuranic Waste Facility - Quarter 18

Location ID	Port Depth (ft)	Field Sample ID	Sample Date	Analysis Date	Method Category	Lab Method	Sample Purpose	Sample Type	Parameter Code	Parameter Name	Report Result ($\mu\text{g}/\text{m}^3$)	Validation Qualifier	Report Method Detection Limit ($\mu\text{g}/\text{m}^3$)	Report Detection Limit ($\mu\text{g}/\text{m}^3$)	Detected
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	110-54-3	Hexane	27	UJ	7.7	27	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	110-82-7	Cyclohexane	26	U	11.0	26	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	120-82-1	Trichlorobenzene[1,2,4-]	230	U	120.0	230	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	123-91-1	Dioxane[1,4-]	110	U	26.0	110	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	74-83-9	Bromomethane	120	U	54.0	120	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	74-87-3	Chloromethane	64	U	23.0	64	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-00-3	Chloroethane	82	U	29	82	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-01-4	Vinyl Chloride	20	U	8.9	20	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-09-2	Methylene Chloride	110	U	26.0	110	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-15-0	Carbon Disulfide	96	U	13.0	96	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-25-2	Bromoform	80	U	21.0	80	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-27-4	Bromodichloromethane	52	U	15.0	52	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-34-3	Dichloroethane[1,1-]	31	U	6.5	31	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-35-4	Dichloroethene[1,1-]	31	U	6	31	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-69-4	Trichlorofluoromethane	43	U	17.0	43	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	124-48-1	Chlorodibromomethane	66	U	17.0	66	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	127-18-4	Tetrachloroethene	70	NQ	15	52	Y
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	142-82-5	n-Heptane	32	U	11.0	32	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	156-59-2	Dichloroethene[cis-1,2-]	14	J	11	31	Y
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	156-60-5	Dichloroethene[trans-1,2-]	31	U	13.0	31	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	1634-04-4	Methyl tert-Butyl Ether	28	UJ	10.0	28	N
63-2012	60	TWF63-22-239688	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	540-84-1	Isooctane	36	U	11.0	36	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-41-4	Ethylbenzene	35	U	13.0	35	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-42-5	Styrene	34	U	12	34	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	100-44-7	Benzyl Chloride	41	U	13.0	41	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	10061-01-5	Dichloropropene[cis-1,3-]	36	U	4.5	36	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	10061-02-6	Dichloropropene[trans-1,3-]	36	U	10.0	36	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	103-65-1	Propylbenzene[1-]	39	U	16	39	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-46-7	Dichlorobenzene[1,4-]	48	U	10	48	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-93-4	Dibromoethane[1,2-]	61	U	15	61	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-99-0	Butadiene[1,3-]	18	UJ	6.9	18	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	107-05-1	Chloro-1-propene[3-]	100	U	30.0	100	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	107-06-2	Dichloroethane[1,2-]	32	U	12	32	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-10-1	Methyl-2-pentanone[4-]	130	U	36.0	130	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-67-8	Trimethylbenzene[1,3,5-]	39	U	14	39	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-88-3	Toluene	30	U	3.3	30	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-90-7	Chlorobenzene	37	U	7.4	37	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	109-99-9	Tetrahydrofuran	24	U	8	24	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	110-54-3	Hexane	28	UJ	8.1	28	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	110-82-7	Cyclohexane	28	U	11.0	28	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	120-82-1	Trichlorobenzene[1,2,4-]	240	U	130.0	240	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	123-91-1	Dioxane[1,4-]	120	U	27.0	120	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	124-48-1	Chlorodibromomethane	68	U	18.0	68	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	127-18-4	Tetrachloroethene	54	U	16	54	N
63-2013	25	TWF63-22-23968													

Table 2: Volatile Organic Compound Analytical Results for Soil Vapor Monitoring Wells at TA-63 Transuranic Waste Facility - Quarter 18

Location ID	Port Depth (ft)	Field Sample ID	Sample Date	Analysis Date	Method Category	Lab Method	Sample Purpose	Sample Type	Parameter Code	Parameter Name	Report Result ($\mu\text{g}/\text{m}^3$)	Validation Qualifier	Report Method Detection Limit ($\mu\text{g}/\text{m}^3$)	Report Detection Limit ($\mu\text{g}/\text{m}^3$)	Detected
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	56-23-5	Carbon Tetrachloride	50	U	13	50	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	591-78-6	Hexanone[2-]	130	U	27.0	130	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	622-96-8	Ethyltoluene[4-]	39	U	16.0	39	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	64-17-5	Ethanol	80	U	58.0	80	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-63-0	Propanol[2-]	100	U	17	100	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-64-1	Acetone	76	U	31.0	76	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-66-3	Chloroform	32	J	9	39	Y
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	71-43-2	Benzene	26	U	3.8	26	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	71-55-6	Trichloroethane[1,1,1-]	12	J	10.0	44	Y
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	74-83-9	Bromomethane	120	U	54.0	120	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	74-87-3	Chloromethane	66	U	25	66	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-00-3	Chloroethane	84	U	29.0	84	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-01-4	Vinyl Chloride	20	U	10	20	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-09-2	Methylene Chloride	110	U	27	110	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-15-0	Carbon Disulfide	100	U	14.0	100	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-25-2	Bromoform	83	U	22.0	83	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-27-4	Bromodichloromethane	54	U	15.0	54	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-34-3	Dichloroethane[1,1-]	32	U	7	32	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-35-4	Dichloroethene[1,1-]	32	U	7	32	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-69-4	Trichlorofluoromethane	45	U	18	45	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-71-8	Dichlorodifluoromethane	34	J	9.9	40	Y
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	76-13-1	Trichloro-1,2,2-trifluoroethane[1,1,2-]	61	U	15.0	61	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	76-14-2	Dichloro-1,1,2,2-tetrafluoroethane[1,2-]	56	U	16	56	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	78-87-5	Dichloropropane[1,2-]	37	U	7.9	37	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	78-93-3	Butanone[2-]	94	U	32	94	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-00-5	Trichloroethane[1,1,2-]	44	U	9	44	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-01-6	Trichloroethene	350	NQ	18	43	Y
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-34-5	Tetrachloroethane[1,1,2,2-]	55	U	13.0	55	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	87-68-3	Hexachlorobutadiene	340	U	140	340	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-47-6	Xylene[1,2-]	35	U	9	35	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-50-1	Dichlorobenzene[1,2-]	48	U	14.0	48	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-63-6	Trimethylbenzene[1,2,4-]	39	U	10.0	39	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	98-82-8	Isopropylbenzene	39	U	8.4	39	N
63-2013	25	TWF63-22-239689	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	Xylene[m+p]	Xylene[1,3-]+Xylene[1,4-]	35	U	10.0	35	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-00-5	Trichloroethane[1,1,2-]	41	U	8.2	41	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-01-6	Trichloroethene	1200	NQ	17	40	Y
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	79-34-5	Tetrachloroethane[1,1,2,2-]	51	U	12.0	51	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	87-68-3	Hexachlorobutadiene	300	U	130.0	300	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-47-6	Xylene[1,2-]	33	U	8.2	33	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-50-1	Dichlorobenzene[1,2-]	45	U	13.0	45	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	95-63-6	Trimethylbenzene[1,2,4-]	37	U	9.3	37	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	98-82-8	Isopropylbenzene	37	U	7.9	37	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	Xylene[m+p]	Xylene[1,3-]+Xylene[1,4-]	33	U	10.0	33</td	

Table 2: Volatile Organic Compound Analytical Results for Soil Vapor Monitoring Wells at TA-63 Transuranic Waste Facility - Quarter 18

Location ID	Port Depth (ft)	Field Sample ID	Sample Date	Analysis Date	Method Category	Lab Method	Sample Purpose	Sample Type	Parameter Code	Parameter Name	Report Result (µg/m³)	Validation Qualifier	Report Method Detection Limit (µg/m³)	Report Detection Limit (µg/m³)	Detected
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-93-4	Dibromoethane[1,2-]	58	U	13.0	58	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	106-99-0	Butadiene[1,3-]	17	UJ	6.4	17	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	107-05-1	Chloro-1-propene[3-]	90	U	31.0	90	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	107-06-2	Dichloroethane[1,2-]	30	U	11.0	30	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-10-1	Methyl-2-pentanone[4-]	100	U	34.0	100	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-67-8	Trimethylbenzene[1,3,5-]	37	U	13.0	37	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-88-3	Toluene	28	U	3	28	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	108-90-7	Chlorobenzene	35	U	6.4	35	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	109-99-9	Tetrahydrofuran	22	U	8	22	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	110-54-3	Hexane	26	UJ	7.4	26	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	110-82-7	Cyclohexane	26	U	10	26	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	120-82-1	Trichlorobenzene[1,2,4-]	200	U	120	200	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	123-91-1	Dioxane[1,4-]	100	U	26	100	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	124-48-1	Chlorodibromomethane	64	U	17	64	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	127-18-4	Tetrachloroethene	51	U	15	51	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	142-82-5	n-Heptane	31	U	11.0	31	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	156-59-2	Dichloroethene[cis-1,2-]	30	U	11.0	30	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	156-60-5	Dichloroethene[trans-1,2-]	30	U	13	30	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	1634-04-4	Methyl tert-Butyl Ether	27	UJ	10	27	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	540-84-1	Isooctane	35	U	11.0	35	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	541-73-1	Dichlorobenzene[1,3-]	45	U	11	45	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	56-23-5	Carbon Tetrachloride	14	J	12.0	47	Y
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	591-78-6	Hexanone[2-]	100	U	25.0	100	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	622-96-8	Ethyltoluene[4-]	37	U	15	37	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	64-17-5	Ethanol	72	U	55	72	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-63-0	Propanol[2-]	93	U	16.0	93	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-64-1	Acetone	70	U	28	70	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	67-66-3	Chloroform	16	J	8	37	Y
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	71-43-2	Benzene	24	U	4	24	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	71-55-6	Trichloroethane[1,1,1-]	35	J	9.3	41	Y
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	74-83-9	Bromomethane	100	U	50	100	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	74-87-3	Chloromethane	60	U	23.0	60	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-00-3	Chloroethane	80	U	30	80	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-01-4	Vinyl Chloride	19	U	8.7	19	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-09-2	Methylene Chloride	100	U	25.0	100	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-15-0	Carbon Disulfide	90	U	13.0	90	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-25-2	Bromoform	77	U	20.0	77	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-27-4	Bromodichloromethane	50	U	15.0	50	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-34-3	Dichloroethane[1,1-]	30	U	7	30	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-35-4	Dichloroethene[1,1-]	30	U	6.3	30	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-69-4	Trichlorofluoromethane	42	U	17	42	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	75-71-8	Dichlorodifluoromethane	50	NQ	9.4	37	Y
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	76-13-1	Trichloro-1,2,2-trifluoroethane[1,1,2-]	57	U	14.0	57	N
63-2013	60	TWF63-22-239690	02/01/2022	02/10/2022	VOC	EPA:TO15	REG	GAS	76-14-2	Dichloro-1,1,2,2-tetrafluoroethane[1,2-]	52	U	15.0	52	N
63-															

Table 2: Volatile Organic Compound Analytical Results for Soil Vapor Monitoring Wells at TA-63 Transuranic Waste Facility - Quarter 18

Location ID	Port Depth (ft)	Field Sample ID	Sample Date	Analysis Date	Method Category	Lab Method	Sample Purpose	Sample Type	Parameter Code	Parameter Name	Report Result (µg/m³)	Validation Qualifier	Report Method Detection Limit (µg/m³)	Report Detection Limit (µg/m³)	Detected
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	75-09-2	Methylene Chloride	200	U	49	200	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	75-15-0	Carbon Disulfide	180	U	25	180	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	75-25-2	Bromoform	140	U	38	140	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	75-27-4	Bromodichloromethane	94	U	28	94	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	75-34-3	Dichloroethane[1,1-]	57	U	13	57	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	100-41-4	Ethylbenzene	61	U	23	61	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	100-42-5	Styrene	60	U	22	60	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	100-44-7	Benzyl Chloride	72	U	24	72	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	10061-01-5	Dichloropropene[cis-1,3-]	64	U	8.2	64	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	10061-02-6	Dichloropropene[trans-1,3-]	64	U	19	64	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	103-65-1	Propylbenzene[1-]	69	U	28.0	69	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	106-46-7	Dichlorobenzene[1,4-]	84	U	19	84	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	106-93-4	Dibromoethane[1,2-]	110	U	26	110	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	106-99-0	Butadiene[1,3-]	31	UJ	12	31	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	107-05-1	Chloro-1-propene[3-]	180	U	59	180	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	107-06-2	Dichloroethane[1,2-]	57	U	21	57	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	108-10-1	Methyl-2-pentanone[4-]	240	U	66.0	240	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	108-67-8	Trimethylbenzene[1,3,5-]	69	U	25.0	69	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	108-88-3	Toluene	53	U	6	53	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	108-90-7	Chlorobenzene	64	U	13.0	64	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	109-99-9	Tetrahydrofuran	41	U	14	41	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	110-54-3	Hexane	49	UJ	14.0	49	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	110-82-7	Cyclohexane	48	U	20.0	48	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	120-82-1	Trichlorobenzene[1,2,4-]	430	U	200.0	430	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	123-91-1	Dioxane[1,4-]	210	U	50	210	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	64-17-5	Ethanol	140	U	110.0	140	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	67-63-0	Propanol[2-]	180	U	32	180	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	67-64-1	Acetone	140	U	57	140	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	67-66-3	Chloroform	68	U	16	68	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	71-43-2	Benzene	45	U	7	45	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	71-55-6	Trichloroethane[1,1,1-]	76	U	19	76	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	124-48-1	Chlorodibromomethane	120	U	32	120	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	127-18-4	Tetrachloroethene	95	U	28	95	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	142-82-5	n-Heptane	57	U	22	57	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	156-59-2	Dichloroethene[cis-1,2-]	55	U	21	55	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	156-60-5	Dichloroethene[trans-1,2-]	55	U	25.0	55	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	1634-04-4	Methyl tert-Butyl Ether	50	UJ	19	50	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	540-84-1	Isooctane	65	U	21	65	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	541-73-1	Dichlorobenzene[1,3-]	84	U	20	84	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	56-23-5	Carbon Tetrachloride	88	U	23.0	88	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	591-78-6	Hexanone[2-]	240	U	49	240	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	622-96-8	Ethyltoluene[4-]	69	U	28.0	69	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	75-35-4	Dichloroethene[1,1-]	55	U	12.0	55	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	75-69-4	Trichlorofluoromethane	79	U	33.0	79	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	75-71-8	Dichlorodifluoromethane	69	U	18.0	69	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	76-13-1	Trichloro-1,2,2-trifluoroethane[1,1,2-]	110	U	26	110	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15									

Table 2: Volatile Organic Compound Analytical Results for Soil Vapor Monitoring Wells at TA-63 Transuranic Waste Facility - Quarter 18

Location ID	Port Depth (ft)	Field Sample ID	Sample Date	Analysis Date	Method Category	Lab Method	Sample Purpose	Sample Type	Parameter Code	Parameter Name	Report Result ($\mu\text{g}/\text{m}^3$)	Validation Qualifier	Report Method Detection Limit ($\mu\text{g}/\text{m}^3$)	Report Detection Limit ($\mu\text{g}/\text{m}^3$)	Detected
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	79-01-6	Trichloroethene	75	U	32	75	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	79-34-5	Tetrachloroethane[1,1,2,2-]	96	U	23.0	96	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	87-68-3	Hexachlorobutadiene	620	U	250.0	620	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	95-47-6	Xylene[1,2-]	61	U	16	61	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	95-50-1	Dichlorobenzene[1,2-]	84	U	25	84	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	95-63-6	Trimethylbenzene[1,2,4-]	69	U	18	69	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	98-82-8	Isopropylbenzene	69	U	15	69	N
63-2013		TWF63-22-239692	02/01/2022	02/10/2022	VOC	EPA:TO15	FB	GAS	Xylene[m+p]	Xylene[1,3-]+Xylene[1,4-]	61	U	19	61	N

Notes: Rows in Bold font indicate the analyte is detected
FD= Field Duplicate
FB = Field Blank
U = Non-detect
J = Estimated Value
UJ = Estimated Undetected
NQ = no data qualifiers

Table 3: Current and Previous Analytical Results for Constituents Listed in Permit Tables

Well ID (Port/ft)	Constituent	Q1		Q2		Q3		Q4		Q5		Q6		Q7		Q8		Q9		Q10		Q11		Q12		Q13		Q14		Q15		Q16		Q17		Q18																	
		Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)																						
VMW-1 (5) 63-2009	Trichloroethylene	64.4	0.3	31.1	0.2	48.3	0.2	53.7	0.3	43.5	0.2	36	0.2	44	0.2	59.1	0.3	40.3	0.2	41.9	0.2	41	0.2	59	0.3	44	0.2	43	0.2	41	0.2	50	0.3	40	0.2	30	0.2																
	Toluene	12.4	<0.1																																																		
	Tetrachloroethylene	11.5	<0.1																																																		
	cis-1,2-Dichloroethylene	11.5	<0.1																																																		
	Acetone	16.1	<0.1																																																		
	1,1,1-Trichloroethane	142	<0.1			8.2	<0.1																												3.8	<0.1																	
	1,1-Dichloroethane	33.6	<0.1																																																		
	1,1-Dichloroethylene	10.3	<0.1																																																		
	Dichlorodifluoromethane	6.9	<0.1																																																		
	Methylene chloride																																																				
	Chloroform																																																				
	m-Xylene																																																				
	p-Xylene																																																				
VMW-2 (5) 63-2010	Trichloroethylene	134	0.7	80.6	0.4	129	0.7	85.9	0.4	107	0.6	113	0.6	118	0.6	102	0.5	96.7	0.5	102	0.5	97	0.5	86	0.4	130	0.7	97	0.5	100	0.5	70	0.4	100	0.5	86	0.4																
	Dichlorodifluoromethane	7.9	<0.1																																																		
	Acetone																																																				
	1,1,1-Trichloroethane																																																				
	Toluene																																																				
VMW-3 (5) 63-2011	Trichloroethylene	69.8	0.4	64.4	0.3	96.7	0.5	59.1	0.3	75.2	0.4	85.9	0.4	107	0.6	85.9	0.4	64.4	0.3	75.2	0.4	97	0.5	75	0.4	86	0.4	75	0.4	97	0.5	59	0.3	75	0.4	50	0.3																
	Toluene	8.3	<0.1																																																		
	Acetone																																																				
	Dichlorodifluoromethane																																																				
VMW-4 (25) 63-2012	Trichloroethylene	3810	2.4	2793	1.8	3437	2.2	2954	1.9	2900	1.8	2900	1.8	3010	1.9	2790	1.8	2740	1.7	2800	1.8	2600	1.7	2600	1.7	2500	1.6	2100	1.3	2200	1.4	2200	1.4	2200	1.4	2200	1.4	2200	1.4														
	Tetrachloroethylene	49.5	<0.1	34.6	<0.1	34.6	<0.1	36.6	<0.1	43.4	<0.1	39.3	<0.1	34.6	<0.1	35.9	<0.1	42.1	<0.1	50.9	<0.1	41.5	<0.1	47	<0.1	39	<0.1	43	<0.1	41	<0.1	35	<0.1	40	<0.1	36	<0.1	40	<0.1	37	<0.1	33	<0.1	30	<0.1								
	Carbon tetrachloride	49.7	<0.1	35.2	<0.1	48.4	<0.1	41.5	<0.1	35.2	<0.1	46.5	<0.1	42.1	<0.1	41.5	<0.1	41.5	<0.1	42.1	<0.1	41.5	<0.1	42.1	<0.1	41.5	<0.1	41.5	<0.1	41.5	<0.1	41.5	<0.1	41.5	<0.1	41.5	<0.1	41.5	<0.1	41.5	<0.1	41.5	<0.1	41.5	<0.1	41.5	<0.1	41.5	<0.1	41.5	<0.1	41.5	<0.1
	Chloroform	112	0.5	87.8	0.2	107	0.5	107	0.5	102	0.4	97.6	0.4																																								

Table 3: Current and Previous Analytical Results for Constituents Listed in Permit Tables

Well ID (Port(ft))	Constituent	Q1		Q2		Q3		Q4		Q5		Q6		Q7		Q8		Q9		Q10		Q11		Q12		Q13		Q14		Q15		Q16		Q17		Q18	
		Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)	Result ($\mu\text{g}/\text{m}^3$)	Percent of SGSL (%)				
Field Duplicates:																																					
VMW-1 (5) 63-2009(FD)	Trichloroethylene Dichlorodifluoromethane																																	37 0.2			
VMW-3 (5) 63-2011 (FD)	Trichloroethylene	45.6	0.2					80.6	0.4																												
VMW-4 (25) 63-2012(FD)	Trichloroethylene Tetrachloroethylene Carbon tetrachloride Chloroform 1,1,1-Trichloroethane Dichlorodifluoromethane					3276 32.5 56.6 112 12.5 74.1	2.1 <0.1 <0.1 0.5 <0.1 <0.1				2790 34.6 49.7 97.6 79.1	1.8 <0.1 <0.1 0.4 <0.1																									
VWM-4 (60) 23-2012(FD)	Trichloroethylene Tetrachloroethylene cis-1,2-Dichloroethylene Carbon tetrachloride Chloroform Dichlorodifluoromethane 1,1,2-Trichloro-1,2,2-trifluoroethane							8593	9.3																												
VMW-5 (25) 63-2013(FD)	Trichloroethylene Tetrachloroethylene Chloroform 1,1,1-Trichloroethane Dichlorodifluoromethane	451 8.8 30.7 32.7 59.3	0.3 <0.1 0.1 <0.1 <0.1																																		
VMW-5 (60) 63-2013(FD)	Trichloroethylene Carbon tetrachloride 1,1,1-Trichloroethane Dichlorodifluoromethane 1,1,2-Trichloro-1,2,2-trifluoroethane Chloroform Methylethyleketone (2-butanone) Tetrachloroethylene 1,2,4-Trimethylbenzene									1560 18.2 47.4 64.2 15.3 20.5 162 10.3	1.7 <0.1 <0.1 <0.1 <0.1 <0.1 <0.1 <0.1	1340 17.6 48.5 69.2 17.6 <0.1 <0.1 <0.1	1.4 46.3 <0.1 79.1 19.5 29 24 22	1500 19 47 79 29 <0.1 69 24 22	1.6 <0.1 38 <0.1 <0.1 <0.1 74 <0.1 40 18 59 22 19 14 14	1400 19 47 69 24 22 69 54 30 31 54 20 19 14 14	1.5 <0.1 <0.1 <0.1 <0.1 <0.1 74 <0.1 40 36 30 20 19 14 14	1400 19 47 69 24 22 69 54 30 31 54 20 19 14 14	1.5 <0.1 <0.1 <0.1 <0.1 <0.1 74 <0.1 40 36 30 20 19 14 14	1300 19 47 69 24 22 69 54 30 31 54 20 19 14 14	1.4 <0.1 <0.1 <0.1 <0.1 <0.1 74 <0.1 40 36 30 20 19 14 14	1300 19 47 69 24 22 69 54 30 31 54 20 19 14 14	1.4 <0.1 <0.1 <0.1 <0.1 <0.1 74 <0.1 40 36 30 20 19 14 14	1200 14 40 59 54 20 20 54 31 31 54 22 19 14 14	1.3 <0.1 <0.1 <0.1 <0.1 <0.1 74 <0.1 40 36 30 20 19 14 14	1200 14 40 59 54 20 20 54 31 31 54 22 19 14 14	1.3 <0.1 <0.1 <0.1 <0.1 <0.1 74 <0.1 40 36 30 20 19 14 14										

Table 4: Statistical Analysis

	VMW-1 5ft ($\mu\text{g}/\text{m}^3$)	VMW-2 5ft ($\mu\text{g}/\text{m}^3$)	VMW-3 5ft ($\mu\text{g}/\text{m}^3$)	VMW-4 25ft ($\mu\text{g}/\text{m}^3$)	VMW-4 60ft ($\mu\text{g}/\text{m}^3$)	VMW-5 25ft ($\mu\text{g}/\text{m}^3$)	VMW-5 60ft ($\mu\text{g}/\text{m}^3$)
Quarter 1	64.4	134	69.8	3810	8060	483	1340
Quarter 2	31.1	80.6	64.4	2793	6982	258	1343
Quarter 3	48.3	129	96.7	3437	8593	414	1557
Quarter 4	53.7	85.9	59.1	2954	8056	344	1504
Quarter 5	43.5	107	75.2	2900	8056	365	1396
Quarter 6	36	113	85.9	2900	7520	360	1400
Quarter 7	44	118	107	2790	7520	360	1560
Quarter 8	59.1	102	85.9	3010	8590	424	1500
Quarter 9	40.3	96.7	64.4	2790	6980	338	1400
Quarter 10	41.9	102	75.2	2740	7520	392	1500
Quarter 11	41	97	97	2800	7500	380	1400
Quarter 12	59	86	75	2600	7500	390	1400
Quarter 13	44	130	86	2600	7500	400	1300
Quarter 14	43	97	75	2600	7000	360	1300
Quarter 15	41	100	97	2500	7500	360	1300
Quarter 16	50	70	59	2100	6400	310	1200
Quarter 17	40	100	75	2200	6400	300	1200
Quarter 18	30	86	50	2200	6400	350	1200
Mean (M)	45.0	101.9	77.6	2762.4	7448.7	366.0	1377.8
Standard Deviation (SD)[n-1]	9.3	17.6	15.5	413.9	672.5	50.2	116.1
Lower Limit (95%= $M-2\times SD$)	26.4	66.7	46.7	1934.7	6103.8	265.7	1145.6
Upper Limit (95%= $M+2\times SD$)	63.7	137.1	108.6	3590.2	8793.6	466.3	1609.9
Lower Limit (99%= $M-3\times SD$)				1520.8		215.5	
Upper Limit (99%= $M+3\times SD$)				4004.1		516.5	

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SAMPLE COLLECTION LOGS

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Air Toxic LTD Folsom CA		Chain of Custody/Analysis Request						COCL/Lab Request #: 2022-290 Page 1 of 1		
Client Contact:		Lab Agreement 648313		Site Name: Los Alamos National Laboratory						
Project Number: LANL		Analysis Turnaround								
24 Hour - <input type="checkbox"/> Other - <input checked="" type="checkbox"/>		7 Days - <input type="checkbox"/>		14 Days - <input type="checkbox"/>		21 Days - <input type="checkbox"/>		28 Days - <input checked="" type="checkbox"/>		
Field Sample ID		Sample Date	Sample Time	Sample Matrix	TO15					
TWF63-22-239684		02/01/2022	09:45	GAS	1					
TWF63-22-239685		02/01/2022	10:09	GAS	1					
TWF63-22-239686		02/01/2022	10:28	GAS	1					
TWF63-22-239687		02/01/2022	11:06	GAS	1					
TWF63-22-239688		02/01/2022	11:22	GAS	1					
TWF63-22-239689		02/01/2022	11:45	GAS	1					
TWF63-22-239690		02/01/2022	12:01	GAS	1					
TWF63-22-239691		02/01/2022	09:46	GAS	1					
TWF63-22-239692		02/01/2022	12:24	GAS	1					
Special Instructions: Bill to ARS # 648313										
Relinquished by: <i>[Signature]</i>	Print Name: <i>[Signature]</i>	Date/Time: 2/1/22 3:00	Received by:	Print Name:	Date/Time:	Received by:	Print Name:	Date/Time:	Received by:	
Relinquished by:	Print Name:	Date/Time:	Received by:	Print Name:	Date/Time:	Received by:	Print Name:	Date/Time:	Received by:	
Relinquished by:	Print Name:	Date/Time:	Received by:	Print Name:	Date/Time:	Received by:	Print Name:	Date/Time:	Received by:	

SAMPLE COLLECTION LOG/FIELD CHAIN OF CUSTODY

EVENT ID: 14172

EVENT NAME: CY 2022 - 4th Qtr. Poregas Sampling - TA-63 - TWF - February

SAMPLE ID: TWF63-22-239684

WORK ORDER:

	<u>AS PLANNED</u>	<u>AS COLLECTED</u>		<u>AS PLANNED</u>	<u>AS COLLECTED</u>
Date Collected (MM/DD/YYYY):	01/01/2022	OK	FIELD MATRIX:	GAS	OK
TIME COLLECTED (HH:MM):	0945	OK	MEDIA:	BH	
SWMU/AOC:	NA		SAMPLE TECH CODE:	VOST	
LOCATION ID:	63-2009		FIELD PREP:	NA	
LOCATION TYPE:	AMS		FIELD QC TYPE:	REG	
TOP DEPTH:	6.5 ft		SAMPLE USAGE:	INV	
BOTTOM DEPTH:	7.5 ft		EXCAVATED:		YES / NO / NA

PRIORITY	ORDER	CONTAINER	#	PRESERVATIVE	COLLECTED Y/N	SPECIAL INSTRUCTIONS
M	TO15	6 Liter Summa Canister	1	NONE	Y	6 Liter Summa

SAMPLE COMMENTS: Port 1

LOCATION COMMENTS: Summa # 12953

FIELD PARAMETERS:

Sample Time _____ HH:MM

CH₄ 0 % CO₂ 8200 ppm O₂ 20.0 % VOC 0.0 ppm

COLLECTED BY (PRINT): m. Slender

RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time

SAMPLE COLLECTION LOG/FIELD CHAIN OF CUSTODY

EVENT ID: 14172

EVENT NAME: CY 2022 - 4th Qtr. Poregas Sampling - TA-63 - TWF - February

SAMPLE ID: TWF63-22-239691

WORK ORDER:

	<u>AS PLANNED</u>	<u>AS COLLECTED</u>		<u>AS PLANNED</u>	<u>AS COLLECTED</u>
Date Collected (MM/DD/YYYY):	<u>6/21/2022</u>	<u>✓</u>	FIELD MATRIX:	GAS	<u>✓</u>
TIME COLLECTED (HH:MM):	<u>0946</u>	<u>✓</u>	MEDIA:	BH	
SWMU/AOC:	<u>LA</u>		SAMPLE TECH CODE:	VOST	
LOCATION ID:	<u>UNK</u>	<u>63-2004</u>	FIELD PREP:	NA	
LOCATION TYPE:	<u>BHover10ft</u>		FIELD QC TYPE:	FD	
TOP DEPTH:	<u>6.5</u>		SAMPLE USAGE:	QC	
BOTTOM DEPTH:	<u>7.5</u>		EXCAVATED:		YES / NO / <u>N/A</u>

PRIORITY	ORDER	CONTAINER	#	PRESERVATIVE	COLLECTED Y/N	SPECIAL INSTRUCTIONS
<u>LA</u>	TO15	6 Liter Summa Canister	1	NONE	<u>Y</u>	6 Liter Summa

SAMPLE COMMENTS: Port QC for TWF63-22-239694.

LOCATION COMMENTS: Summa #

FIELD PARAMETERS:

Sample Time 946 HH:MMCH₄ 0 % CO₂ 8.200 ppm O₂ 20.0 % VOC 0.0 ppmCOLLECTED BY (PRINT): M. Stender

RELINQUISHED BY (Printed Name) (Signature)	Date/Time <u>2/1/22 12:50</u>	RECEIVED BY (Printed Name) (Signature)	Date/Time <u>Melissa Muh 2/1/22 1:50</u>
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time

SAMPLE COLLECTION LOG/FIELD CHAIN OF CUSTODY

EVENT ID: 14172

EVENT NAME: CY 2022 - 4th Qtr. Poregas Sampling - TA-63 - TWF - February

SAMPLE ID: TWF63-22-239685

WORK ORDER:

	<u>AS PLANNED</u>	<u>AS COLLECTED</u>		<u>AS PLANNED</u>	<u>AS COLLECTED</u>
Date Collected (MM/DD/YYYY):	<u>02/11/2022</u>	<u>ok</u>	FIELD MATRIX:	GAS	<u>ok</u>
TIME COLLECTED (HH:MM):	<u>1009</u>	<u>ok</u>	MEDIA:	BH	
SWMU/AOC:	<u>W9</u>		SAMPLE TECH CODE:	VOST	
LOCATION ID:	<u>63-2010</u>		FIELD PREP:	NA	
LOCATION TYPE:	<u>AMS</u>		FIELD QC TYPE:	REG	
TOP DEPTH:	<u>6.5 ft</u>		SAMPLE USAGE:	INV	
BOTTOM DEPTH:	<u>7.5 ft</u>	↓	EXCAVATED:		YES / NO / <u>NA</u>

PRIORITY	ORDER	CONTAINER	#	PRESERVATIVE	COLLECTED Y/N	SPECIAL INSTRUCTIONS
<u>nt</u>	TO15	6 Liter Summa Canister	1	NONE	<u>y</u>	6 Liter Summa

SAMPLE COMMENTS: Port 1

LOCATION COMMENTS: Summa # 34216

FIELD PARAMETERS:

Sample Time 10:09 HH:MM

CH₄ 0 % CO₂ 5800 ppm O₂ 20.3 % VOC 0.0 ppm

COLLECTED BY (PRINT): K Reid

RELINQUISHED BY (Printed Name) (Signature)	Date/Time <u>2/11/22</u> <u>1250</u>	RECEIVED BY (Printed Name) (Signature)	Date/Time <u>2/11/22</u> <u>1250</u>
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time

SAMPLE COLLECTION LOG/FIELD CHAIN OF CUSTODY

EVENT ID: 14172

EVENT NAME: CY 2022 - 4th Qtr. Poregas Sampling - TA-63 - TWF - February

SAMPLE ID: TWF63-22-239686

WORK ORDER:

	<u>AS PLANNED</u>	<u>AS COLLECTED</u>		<u>AS PLANNED</u>	<u>AS COLLECTED</u>
Date Collected (MM/DD/YYYY):	<u>02/01/2022</u>	<u>OK</u>	FIELD MATRIX:	<u>GAS</u>	<u>OK</u>
TIME COLLECTED (HH:MM):	<u>1028</u>	<u>OK</u>	MEDIA:	<u>BH</u>	
SWMU/AOC:	<u>U1</u>		SAMPLE TECH CODE:	<u>VOST</u>	
LOCATION ID:	<u>63-2011</u>		FIELD PREP:	<u>NA</u>	
LOCATION TYPE:	<u>AMS</u>		FIELD QC TYPE:	<u>REG</u>	
TOP DEPTH:	<u>6.5 ft</u>		SAMPLE USAGE:	<u>INV</u>	
BOTTOM DEPTH:	<u>7.5 ft</u>		EXCAVATED:		YES / NO / NA

PRIORITY	ORDER	CONTAINER	#	PRESERVATIVE	COLLECTED Y/N	SPECIAL INSTRUCTIONS
<u>A</u>	TO15	6 Liter Summa Canister	1	NONE	<u>Y</u>	6 Liter Summa

SAMPLE COMMENTS: Port 1

LOCATION COMMENTS: Summa # 33962

FIELD PARAMETERS:

Sample Time 1028 HH:MM

CH₄ 0 % CO₂ 3200 ppm O₂ 20.5 % VOC 0.0 ppm

COLLECTED BY (PRINT): M. Shonka

RELINQUISHED BY (Printed Name) (Signature)	Date/Time <u>2/1/22</u> <u>1250</u>	RECEIVED BY (Printed Name) (Signature)	Date/Time <u>2/1/22</u> <u>1250</u>
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time

SAMPLE COLLECTION LOG/FIELD CHAIN OF CUSTODY

EVENT ID: 14172

EVENT NAME: CY 2022 - 4th Qtr. Poregas Sampling - TA-63 - TWF - February

SAMPLE ID: TWF63-22-239687

WORK ORDER:

	<u>AS PLANNED</u>	<u>AS COLLECTED</u>		<u>AS PLANNED</u>	<u>AS COLLECTED</u>
Date Collected (MM/DD/YYYY):	02/01/2022	✓	FIELD MATRIX:	GAS	✓
TIME COLLECTED (HH:MM):	11:06	✓	MEDIA:	BH	
SWMU/AOC:	M		SAMPLE TECH CODE:	VOST	
LOCATION ID:	63-2012		FIELD PREP:	NA	
LOCATION TYPE:	AMS		FIELD QC TYPE:	REG	
TOP DEPTH:	24 ft		SAMPLE USAGE:	INV	
BOTTOM DEPTH:	25 ft		EXCAVATED:		YES / NO ✓/NA

PRIORITY	ORDER	CONTAINER	#	PRESERVATIVE	COLLECTED Y/N	SPECIAL INSTRUCTIONS
WA	TO15	6 Liter Summa Canister	1	NONE	✓	6 Liter Summa

SAMPLE COMMENTS: Port 1

LOCATION COMMENTS: Summa #35267

FIELD PARAMETERS:

Sample Time 11:06 HH:MMCH₄ 0 % CO₂ 10.600 ppm O₂ 19.4 % VOC 0.0 ppm

COLLECTED BY (PRINT): M Shendo

RELINQUISHED BY (Printed Name) (Signature)	Date/Time 2/1/22 1250	RECEIVED BY (Printed Name) (Signature)	Date/Time 2/1/22 1250
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time

SAMPLE COLLECTION LOG/FIELD CHAIN OF CUSTODY

EVENT ID: 14172

EVENT NAME: CY 2022 - 4th Qtr. Poregas Sampling - TA-63 - TWF - February

SAMPLE ID: TWF63-22-239688

WORK ORDER:

	<u>AS PLANNED</u>	<u>AS COLLECTED</u>		<u>AS PLANNED</u>	<u>AS COLLECTED</u>
Date Collected (MM/DD/YYYY):	02/11/2022	OK	FIELD MATRIX:	GAS	OK
TIME COLLECTED (HH:MM):	1122	OK	MEDIA:	BH	
SWMU/AOC:	W1		SAMPLE TECH CODE:	VOST	
LOCATION ID:	63-2012		FIELD PREP:	NA	
LOCATION TYPE:	AMS		FIELD QC TYPE:	REG	
TOP DEPTH:	59 ft		SAMPLE USAGE:	INV	
BOTTOM DEPTH:	60 ft		EXCAVATED:		YES / NO / <u>NA</u>

PRIORITY	ORDER	CONTAINER	#	PRESERVATIVE	COLLECTED Y/N	SPECIAL INSTRUCTIONS
<u>M</u>	TO15	6 Liter Summa Canister	1	NONE	<u>Y</u>	6 Liter Summa

SAMPLE COMMENTS: Port 2

LOCATION COMMENTS: Summa # 33872

FIELD PARAMETERS:

Sample Time 1122 HH:MM

CH₄ 0 % CO₂ 13800 ppm O₂ 18.8 % VOC 0.0 ppm

COLLECTED BY (PRINT): m. shendo

RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time

Los Alamos National Laboratory

SAMPLE COLLECTION LOG/FIELD CHAIN OF CUSTODY

EVENT ID: 14172

EVENT NAME: CY 2022 - 4th Qtr. Poregas Sampling - TA-63 - TWF - February

SAMPLE ID: TWF63-22-239689

WORK ORDER:

	<u>AS PLANNED</u>	<u>AS COLLECTED</u>	<u>AS PLANNED</u>	<u>AS COLLECTED</u>
Date Collected (MM/DD/YYYY):	02/01/2022	✓	FIELD MATRIX:	GAS ✓
TIME COLLECTED (HH:MM):	1145	✓	MEDIA:	BH
SWMU/AOC:	WA	✓	SAMPLE TECH CODE:	VOST
LOCATION ID:	63-2013	✓	FIELD PREP:	NA
LOCATION TYPE:	AMS	✓	FIELD QC TYPE:	REG
TOP DEPTH:	24 ft	✓	SAMPLE USAGE:	INV
BOTTOM DEPTH:	25 ft	✓	EXCAVATED:	YES / NO (NA)

PRIORITY	ORDER	CONTAINER	#	PRESERVATIVE	COLLECTED Y/N	SPECIAL INSTRUCTIONS
W	TO15	6 Liter Summa Canister	1	NONE	✓	6 Liter Summa

SAMPLE COMMENTS: Port 1

LOCATION COMMENTS: Summa #00520

FIELD PARAMETERS:

Sample Time 1145 HH:MM

CH₄ 2 % CO₂ 29400 ppm O₂ 17.8 % VOC 0.0 ppm

COLLECTED BY (PRINT): M. Slenda

RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time

SAMPLE COLLECTION LOG/FIELD CHAIN OF CUSTODY

EVENT ID: 14172

EVENT NAME: CY 2022 - 4th Qtr. Poregas Sampling - TA-63 - TWF - February

SAMPLE ID: TWF63-22-239690

WORK ORDER:

	<u>AS PLANNED</u>	<u>AS COLLECTED</u>		<u>AS PLANNED</u>	<u>AS COLLECTED</u>
Date Collected (MM/DD/YYYY):	02/01/2022	dk	FIELD MATRIX:	GAS	ok
TIME COLLECTED (HH:MM):	1201	ok	MEDIA:	BH	
SWMU/AOC:	IV A		SAMPLE TECH CODE:	VOST	
LOCATION ID:	63-2013		FIELD PREP:	NA	
LOCATION TYPE:	AMS		FIELD QC TYPE:	REG	
TOP DEPTH:	59 ft		SAMPLE USAGE:	INV	
BOTTOM DEPTH:	60 ft		EXCAVATED:		YES / NO (NA)

PRIORITY	ORDER	CONTAINER	#	PRESERVATIVE	COLLECTED Y/N	SPECIAL INSTRUCTIONS
wf	TO15	6 Liter Summa Canister	1	NONE	✓	6 Liter Summa

SAMPLE COMMENTS: Port 2

LOCATION COMMENTS: Summa # 35274

FIELD PARAMETERS:

Sample Time 1201 HH:MM

CH₄ 0 % CO₂ 21.84 ppm O₂ 18.3 % VOC 0.7 ppm

COLLECTED BY (PRINT): M. Slenda

RELINQUISHED BY (Printed Name) (Signature)	Date/Time 21/12 12:50	RECEIVED BY (Printed Name) (Signature)	Date/Time 21/12 12:50
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time

Los Alamos National Laboratory

SAMPLE COLLECTION LOG/FIELD CHAIN OF CUSTODY

EVENT ID: 14172

EVENT NAME: CY 2022 - 4th Qtr. Poregas Sampling - TA-63 - TWF - February

SAMPLE ID: TWF63-22-239692

WORK ORDER:

	<u>AS PLANNED</u>	<u>AS COLLECTED</u>		<u>AS PLANNED</u>	<u>AS COLLECTED</u>
Date Collected (MM/DD/YYYY):	02/11/2022	OK	FIELD MATRIX:	GAS	OK
TIME COLLECTED (HH:MM):	1224	ok	MEDIA:	BH	
SWMU/AOC:	IA		SAMPLE TECH CODE:	VOST	
LOCATION ID:	UNK		FIELD PREP:	NA	
LOCATION TYPE:	BHover10ft		FIELD QC TYPE:	FB	
TOP DEPTH:			SAMPLE USAGE:	QC	
BOTTOM DEPTH:			EXCAVATED:	YES / NO / NA	NA

PRIORITY	ORDER	CONTAINER	#	PRESERVATIVE	COLLECTED Y/N	SPECIAL INSTRUCTIONS
NA	TO15	6 Liter Summa Canister	1	NONE	Y	6 Liter Summa

SAMPLE COMMENTS:

QC of TWF63-22-239690

LOCATION COMMENTS:

Summa # 9247

FIELD PARAMETERS:

Sample Time

1224

HH:MM

COLLECTED BY (PRINT): m.s.lendo

RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time
RELINQUISHED BY (Printed Name) (Signature)	Date/Time	RECEIVED BY (Printed Name) (Signature)	Date/Time