

Application Type Renewal
Facility Type Sewage
Major / Minor Major

**NPDES PERMIT FACT SHEET
ADDENDUM**

Application No. PA0021148
APS ID 1064579
Authorization ID 1398267

Applicant and Facility Information

Applicant Name	<u>Municipal Authority of Westmoreland County (MAWC)</u>	Facility Name	<u>Mt Pleasant Borough STP</u>
Applicant Address	<u>124 Park & Pool Road</u> <u>New Stanton, PA 15672</u>	Facility Address	<u>360 Clay Avenue</u> <u>Mount Pleasant, PA 15666-1910</u>
Applicant Contact	<u>Norman Stout</u>	Facility Contact	<u>Same as Applicant</u>
Applicant Phone	<u>(724) 640-7403</u>	Facility Phone	<u>Same as Applicant</u>
Client ID	<u>64197</u>	Site ID	<u>271476</u>
SIC Code	<u>4952</u>	Municipality	<u>Mount Pleasant Borough</u>
SIC Description	<u>Trans. & Utilities - Sewerage Systems</u>	County	<u>Westmoreland</u>
Date Published in PA Bulletin	<u>August 26, 2023 (Attachment A)</u>	EPA Waived?	<u>No</u>
Comment Period End Date	<u>September 25, 2023</u>	If No, Reason	<u>Major Facility</u>
Purpose of Application	<u>Application for a renewal of an NPDES permit for discharge of treated Sewage</u>		

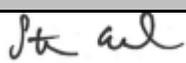
Internal Review and Recommendations

The Department of Environmental Protection (DEP) published notice of draft Authorization to discharge under the National Discharge Elimination System (NPDES) discharge requirements for treated sewage for Mt Pleasant Borough STP in the *Pennsylvania Bulletin* on August 26, 2023 [54 Pa.B. 5280]. A 30-day comment period was provided during which interested parties were directed to submit comments to DEP.

The purpose of this fact sheet is to document the comments received, the Department's formal response to said comments, and where applicable, the changes made to the draft permit.

Comments were received from the Environmental Protection Agency (EPA) as well as from the Municipal Authority of Westmoreland County (MAWC). As a result of the comments received from MAWC, the permit is being amended in the following ways:

- Monitoring frequency for Bis(2-Ethylhexyl)Phthalate and Indeno(1,2,3-cd)Pyrene in Part A. I.B. are changing from 1/week to 1/month.
- The weekly average concentration limits for summer and winter ammonia-nitrogen have been removed from Part A. I.E. of the permit.
- Part C. XI.A. was added to the permit which allows MAWC to apply to amend the permit and remove monitoring and limits for Bis(2-Ethylhexyl)Phthalate and Indeno(1,2,3-cd)Pyrene if after two years all 24 monitoring results for the parameters of concern are non-detect.
- The flow rate above which the facility cannot accept hauled in waste as defined in Part C.I.C. has been changed from 4.0 to 4.5 MGD.
- Average weekly concentration reporting requirements were added to Part A.I.E. for BOD₅ and TSS influent.
- The CSO performance standard in Part C.II.C.2. of the permit is changing from 94 percent to 85 percent capture requirement under presumption approach.

Approve	Return	Deny	Signatures	Date
X			 Stephanie Conrad / Environmental Engineering Specialist	December 8, 2023
x			 Mahbuba Iasmin, Ph.D., P.E. / Environmental Engineering Manager	December 8, 2023

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Two additional changes were made to the permit which were not due to comments received. These include:

- An instantaneous maximum limit of 2.82 mg/l for summer ammonia-nitrogen has been added to the Part A.I.E. of the permit.
- The due date for submittal of the Final WQBEL Compliance Report and completion of actions identified in the TRE which is documented in Part C.V.C.1. of the permit have changed to two years and three years following the permit effective date, respectively.

Due to the changes noted above, the Department has decided to redraft the permit to provide public an opportunity for comments on the changes proposed.

In response to the draft permit, US EPA Region III sent the email provided in Attachment B, making the following statement,

According to our Memorandum of Agreement, the Environmental Protection Agency (EPA) Region III has received the revised draft National Pollutant Discharge Elimination System (NPDES) permit for:

Mt. Pleasant Borough STP
Municipal Authority of Westmoreland County (MAWC)
NPDES Number: PA0021148
EPA Received Revised Date: 8/9/2023
30-day response date: 9/8/2023

This is a major permit that discharges to Shupe Run. The permit is being revised to incorporate the applicable CSO performance standard, the corrected CSO outfall information, and updated CSO LTCP implementation compliance schedule. The revised fact sheet also addresses EPA's previous comments regarding RP and WET. EPA has chosen to perform a limited review of the changes made to the CSO permit requirements, RP, and WETT. EPA has completed its review and has no comments.

In response to the second draft permit, Katelyn Warheit with MAWC, sent a formal letter dated August 28, 2023. The letter contained comments regarding effluent limits and monitoring frequency for Benzo(k)Fluoranthene, Bis(2-Ethylhexyl)Phthalate, and Indeno(1,2,3-cd)Pyrene, effluent limitations for TRC, weekly average effluent limitations for ammonia-nitrogen, wording in part C.I.C and Part C.II.B.1.d-e of the permit, inclusion of part C.IX of the permit, and inclusion of Benzo(k)Fluoranthene, Bis(2-Ethylhexyl)Phthalate, and Indeno(1,2,3-cd)Pyrene in the TRE requirements in Part C.V.B of the permit. The complete comment letter is provided in Attachment C.

1. MAWC believes that laboratory error is evident for Benzo(k)Fluoranthene, Bis(2-Ethylhexyl)Phthalate, and Indeno(1,2,3-cd)Pyrene and the values should therefore be discarded. The DEP SOP for *Establishing WQBELs and Permit Conditions for Toxic Pollutants in NPDES Permits* [SOP No. BCW-PMT-037] states that data cannot be discarded "unless there are extenuating circumstances such as laboratory or sampling error."

DEP's Response: The department is taking two separate actions in response to this comment.

Regarding Benzo(k)Fluoranthene, the analyte was detected in the sample taken on March 23, 2022 at a concentration greater than the method detection limit for method EPA 625.1. The laboratory qualifies the sample as J. According to the lab report (Attachment D), this qualification documents that "the analyte was detected above the method detection limit but below the method reporting limit; the reported result is an estimated value." The department considers a result above the detection level as a detection regardless of its relation to the reporting limit and does not agree that it is apparent that the laboratory was in error for this detection. There will be no changes in the third draft permit regarding Benzo(k)Fluoranthene.

Please note that the lab report documenting a flag of J is an amendment (Rev 4) to the original report made almost a year after the analysis was completed. The report was amended to include the J flag for Benzo(k)Fluoranthene, but there is no documentation provided in the report justifying the change.

The SOP quotation provided in the comment letter is misleading as the entire sentence is "For sample sizes less than 10, the application manager may not remove data perceived to be outliers unless there are extenuating

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circumstances such as laboratory or sampling error that are documented in the fact sheet.” The entirety of the sentence clearly defines that the policy of evaluating laboratory error is in regard to sample sizes less than 10. There are 13 data points for both Bis(2-Ethylhexyl)Phthalate and Indeno(1,2,3-cd)Pyrene. In accordance with Section I.B. of the Department’s SOP for *Establishing WQBELs and Permit Conditions for Toxic Pollutants in NPDES Permits* [SOP No. BCW-PMT-037], when an outlier are suspected in data sets greater than 10, then the median value should be used to evaluate reasonable potential rather than the AMEC. Using a median value of 1.48 µg/L and 0.362 µg/L for Bis(2-Ethylhexyl)Phthalate and Indeno(1,2,3-cd)Pyrene respectively have no effect on proposed effluent limitations.

Please note that the department did not complete the tests recommended in EPA’s *Guidance for Data Quality Assessment* (Data Quality Guidance) [EPA QA/G-9 QA00 Version] to confirm that outliers exist in either dataset. The department’s willingness to evaluate what the limits would be if outliers exist in the data sets should not be misconstrued in any way as confirmation that the sample results from March 9 and March 16, 2022 are outliers.

The department is in agreement that the Bis(2-Ethylhexyl)Phthalate and Indeno(1,2,3-cd)Pyrene detections in the samples taken March 9 through March 23, 2022 were all qualified as B. The lab report provided in Attachment D documents that this means “The target analyte was detected in the Method, Dilution Water, Instrument, or Extraction Blank or Sterility Check at or above the method reporting limit or applicable method, client, or regulatory requirement”. The department agrees that a qualification of B suggests that there is likely laboratory error, however, the percentage of results qualified in the initial sampling is concerning (100% and 66%, respectively). The ten additional samples being non-detect are beneficial, but the department is asking for a wider time range of data to be satisfied that there is no reasonable potential for the effluent to cause or contribute to impairment for Bis(2-Ethylhexyl)Phthalate and Indeno(1,2,3-cd)Pyrene. While no changes are being made to the permit limitations at this time, Part XI.A has been added to this permit which allows the authority to apply for an amendment to remove the monitoring requirement and limits if after two years, all of the monitoring results are non-detect.

Monitoring frequency for toxic parameters are assigned based on Table 6-3 of the Department’s *Technical Guidance for the Development and Specification of Effluent Limitations* [Doc. No. 362-04000-001]. Weekly monitoring frequency for Bis(2-Ethylhexyl)Phthalate and Indeno(1,2,3-cd)Pyrene would be in accordance with this policy. Section IV.E.5 of the Department’s SOP for *New and Reissuance of Sewage Individual NPDES Permit Applications* [SOP No. BCW-PMT-037] clarifies that when a new parameter is introduced into a renewal permit it verify reasonable potential, a monitoring frequency less than that required in Table 6-3 may be imposed. Considering the Authority has provided additional sampling documenting ten non-detect results for these two parameters, the Department is willing to consider the monitoring requirement imposed in the first three years of the permit as additional monitoring to verify reasonable potential. The sampling frequency for these parameters has been reduced to 1/month.

2. What are the criteria for resampling? These criteria are not explicitly stated on the Pre-Draft letter dated June 28, 2022.

DEP’s Response: The criteria for resampling as defined in the example pre-draft letter in Appendix B of DEP’s SOP for *Establishing Water Quality-Based Effluent Limitations (WBELs) and Permit Conditions for Toxic Pollutants in NPDES Permit for Existing Discharges* is to allow resampling for circumstances where the Department’s Target Quantitation Limits (QLs) were not met with the initial sampling. The resampling is required to meet the Department’s Target QLs.

3. As noted above, MAWC collected additional data because the original data included on the permit renewal application had qualifiers on the laboratory analysis results. MAWC’s understanding was that these qualified results needed to be discarded and that MAWC needed to provide valid, unqualified results to DEP.

DEP’s Response: MAWC’s understanding was incorrect. The Department did not state anything to insinuate this assumption in the pre-draft letter dated June 28, 2022.

4. MAWC still believes that a sample frequency of 1/week is excessive for non-conventional parameters that have been added to this permit for the first time. The fact sheet states that “For pollutants where only monitoring is required, DEP can decrease the sampling frequency from 1/week to 1/month.” The parameters listed on page 3 only require

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monitoring until the end of the 2nd year from the Permit Effective Date. Therefore, MAWC requests that the sample frequency be changed to 1/month until the end of the 2nd year from permit issuance.

DEP's Response: The wording in the fact sheet was misleading. Section IV. E.5. of DEP's SOP for *New and Reissuance Sewage Individual NPDES Permit Applications* [SOP No. BCW-PMT-002] specifically states "For new parameters introduced into renewed permits, in which the application manager desires for the permittee to collect data to verify reasonable potential for subsequent permit application review, the application manager may select any reasonable monitoring frequency that is greater than or equal to once per year."

Considering the Authority has provided additional sampling documenting non-detect results for Bis(2-Ethylhexyl)Phthalate and Indeno(1,2,3-cd)Pyrene, the Department is willing to consider the monitoring requirement imposed in the first two years of the permit as additional monitoring to verify reasonable potential. The sampling frequency for these parameters has been reduced to 1/month.

Regarding Total Copper, Free Cyanide, Dissolved Iron, Total Zinc, and Chloroform, monitoring for the first two years was established in accordance with section III.A.1. of DEP's SOP for *Establishing Water Quality-Based Effluent Limitations (WBELs) and Permit Conditions for Toxic Pollutants in NPDES Permit for Existing Discharges*. Reasonable potential for the effluent to cause or contribute to instream impairment for these five parameters was documented in the fact sheet issued February 24, 2023. These parameters do not meet the justification for which sampling frequency can be reduced.

- The effluent limitations for TRC were changed from 0.03 mg/L to 0.011 mg/L (Average Monthly) and from 0.10 mg/L to 0.035 mg/L (Instantaneous Maximum). The DEP SOP for *Establishing Effluent Limitations for Individual Sewage Permits* [SOP No. BCW-PMT-033] states "For existing discharges, where the existing TRC limit is at or below 0.1 mg/L the existing limit may remain in the reissued permit (no modeling required)."

DEP's Response: Section II. C.4. of DEP's SOP for *Establishing Effluent Limitations for Individual Sewage Permits* [SOP No. BCW-PMT-033] does state the existing limit **may** remain in the reissued permit. This language does not negate the application manager's discretion in choosing to remodel the TRC effluent limit.

Please note, the previous TRC model output file is included in Attachment E. Those limits were based on an in-stream chlorine demand of 0.8 mg/L. There is no site-specific justification documented to validate deviating from the in-stream chlorine demand of 0.3 mg/L, which is in accordance with Section II.C.2. of DEP's SOP for *Establishing Effluent Limitations for Individual Sewage Permits* [SOP No. BCW-PMT-033]. It is therefore not justifiable to continue imposing the previous TRC limits. Justification of the new, more restrictive, limits are based on the model output included in the fact sheet issued February 24, 2023 and provided in Attachment F. The new model does use an in-stream chlorine demand of 0.3 mg/L. Part C.VII. D.1. of the permit provides MAWC with the opportunity to conduct a Chlorine Demand Study in accordance with DEP's *Implementation Guidance Total Residual Chlorine (TRC) Regulation* [DEP ID 391-2000-015] if they believe that a site-specific in-stream chlorine demand is appropriate.

- The fact sheet states that the BOD influent and TSS influent monitoring requirement were changed to "Report Daily Max," but this change is not reflected in Part A Effluent Limitations table.

DEP's Response: This comment amends one provided in the March 24, 2023 comment letter. The original comment stated "The DEP Influent & Process Control Supplemental Report form does not calculate maximum weekly averages. It only calculates the maximum daily value. Therefore, MAWC requests that the BOD influent and TSS influent monitoring requirements remain as "Report Daily Max.""

Section IV.F.2. of DEP's SOP for *New and Reissuance Sewage Individual NPDES Permit Applications* [SOP No. BCW-PMT-002] states that for Publicly Owned Treatment Works (POTWs) with design flows greater than 2,000 GPD, influent BOD₅ and TSS monitoring will be imposed in the permit at a frequency equivalent to that imposed for the effluent parameters. Table 5-3 of DEP's *Technical Guidance for the Development and Specification of Effluent Limitations and Other Permit Conditions in NPDES Permits* [Doc. No. 362-0400-001] further documents that average weekly concentration and mass loading limits are required for CBOD₅ and TSS. Average weekly mass loading reporting requirements for influent BOD₅ and TSS will remain in the permit. Average weekly concentration reporting requirements were also added for BOD₅ and TSS.

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Please note that DEP's Influent and Process Controls Supplemental Report form is meant to serve as documentation of individual samples and not as a template for calculating influent sampling reporting results.

7. The average weekly concentration limits for ammonia-nitrogen remained in the permit, but the DEP Technical Guidance for the *Development and Specification of Effluent Limitations and Other Permit Conditions in NPDES Permits* [DOC No. 362-0400-001] Table 5-3: Methods of Expressing Effluent Limits for Sewage Dischargers (Chapter 5, page 18), the footnote for average weekly concentration states "Only CBOD and TSS limitation."

DEP's Response: The weekly average concentration limits for summer and winter ammonia-nitrogen have been removed from the permit in accordance with DEP's Technical Guidance for the *Development and Specification of Effluent Limitations and Other Permit Conditions in NPDES Permits* [DOC No. 362-0400-001].

8. The instantaneous flow for not accepting hauled-in wastes was changed from 3.0 MGD to 4.0 MGD instead of 4.5 MGD.

DEP's Response: The instantaneous flow for not accepting hauled-in wastes documented in Part C.I.C. of the permit should reflect the Chapter 94 hydraulic design capacity multiplied by a peaking factor of three. MAWC documents in its 2022 Chapter 94 report that the hydraulic design capacity for this facility is 1.5 MGD, therefore, the flow rate in Part C.I.C. has been changed to 4.5 MGD.

9. If the language in Part C.II.B.1.d-e remains in the permit, is MAWC going to be considered in violation of the permit if MAWC does not perform street cleaning and storm sewer inlet cleaning even though this work is the responsibility of the municipality.

DEP's Response: The enforcement section of DEP Clean Water reserves the right to execute enforcement discretion on any permit condition.

Please note that the language in Part C.II.B.1.d-e is directly quoted from page 28 of the 2004 Nine Minimum Controls (NMC) provided by MAWC to document what it is doing to comply with EPA's NMC guidance.

10. The percent capture requirement was changed from 85% to 94% based on comments received from the EPA. MAWC believes that EPA is misinterpreting the meaning of the 94% value in the LTCP.

DEP's Response: Section IV.B.2.c of the EPA's *Combined Sewer Overflow (CSO) Control Policy Notice* [Federal Register Vol. 59 No. 75 18688-18698] (CSO Policy) documents that a permit require compliance with the numeric performance standards for the selected controls by specifying one of three conditions. Section IV.B.2.c.ii. offers the condition of a minimum percent capture of combined sewage by volume for treatment under specified design conditions consistent with Section II.C.4.a.ii. Section II.C.4.a.ii specifies a percent capture of no less than 85%.

Section 4.6.2 of EPA's *CSO Guidance for Permit Writers* [EPA 832-B-95-008] documents that the performance standard for the presumptive approach should come directly from what is specified in the CSO Policy. Appendix A further clarifies by providing the example sample language, "The permittee shall eliminate or capture for treatment, or storage and subsequent treatment, at least 85 percent of the system-wide combined sewage volume collected in the combined sewer system..."

Please note that EPA Region Two Permits NY0031429 and NY00222403 both specify 85 percent as the numeric performance standard for the presumption approach.

For these reasons, the performance standard in Part C. II. C. 2. of the permit is changing from 94 percent to 85 percent.

11. MAWC does not believe that Benzo(k)Fluoranthene, Bis(2-Ethylhexyl)Phthalate, and Indeno(1,2,3-cd)Pyrene should be included in the WQBELs table and TRE requirement because all of the sample results for these parameters were non-detect during the 10 weeks of effluent sampling.

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DEP's Response: DEP has evaluated the complete data sets for each of these parameters in accordance with the In accordance with the Department's SOP for *Establishing WQBELs and Permit Conditions for Toxic Pollutants in NPDES Permits* [SOP No. BCW-PMT-037] and has justified why these parameters are assigned limits.

Section III.5.a of DEP's SOP for *Establishing WQBELs and Permit Conditions for Toxic Pollutants in NPDES Permits* [SOP No. BCW-PMT-037] states that if the permittee documents in the pre-draft survey that the source of the toxic pollutants of concern are unknown or suspected to be unknown, then the permittee will be required to conduct a TRE to investigate and control the source(s) of the pollutants subject to final WQBELs.

MAWC documented in their pre-draft survey response (Attachment G) that they are not aware of the sources for Benzo(k)Fluoranthene, Bis(2-Ethylhexyl)Phthalate, and Indeno(1,2,3-cd)Pyrene. Additionally, all three parameters of concern are subject to final WQBELs in Part A.I.C. of the permit. Benzo(k)Fluoranthene, Bis(2-Ethylhexyl)Phthalate, and Indeno(1,2,3-cd)Pyrene are therefore all privy to the requirement to conduct a TRE for the parameters

12. MAWC does not believe that a TRC Minimization Plan should be required.

DEP's Response: DEP justified the imposition of an average monthly limit of 0.01 mg/L for TRC in the Fact Sheet issued February 24, 2023 and has provided the modeling output file justifying the limit in Attachment F of this fact sheet. Part C.VIII. of the Permit is a standard condition for all permits receiving a new, more restrictive TRC limit which the facility as currently operating is not able to meet. Completion of a TRC Minimization Plan is included as part of the condition.

Several open violations by Client ID currently exist under the Safe Drinking Water (SDW) program. Concurrence have been received with the SDW program prior to issuance of this draft permit.

Draft permit issuance is recommended.

ATTACHMENT A
PA Bulletin Notice

NOTICES

DEPARTMENT OF ENVIRONMENTAL PROTECTION

Applications, Actions and Special Notices

APPLICATIONS

[53 Pa.B. 5280]
[Saturday, August 26, 2023]

THE PENNSYLVANIA CLEAN STREAMS LAW AND THE FEDERAL CLEAN WATER ACT

APPLICATIONS FOR NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES) PERMITS AND WATER QUALITY MANAGEMENT (WQM) PERMITS UNDER THE CLEAN STREAMS LAW AND FEDERAL CLEAN WATER ACT

This notice provides information about persons who have applied to the Department of Environmental Protection (DEP) for a new, renewed, or amended NPDES or WQM permit, or a permit waiver for certain stormwater discharges, or have submitted a Notice of Intent (NOI) for coverage under a General Permit. The applications and NOIs concern, but are not limited to, effluent discharges from sewage treatment facilities and industrial facilities to surface waters or groundwater; stormwater discharges associated with industrial activity (industrial stormwater), construction activity (construction stormwater), and municipal separate storm sewer systems (MS4s); the application of pesticides; the operation of Concentrated Animal Feeding Operations (CAFOs); and the construction of sewage, industrial waste, and manure storage, collection and treatment facilities. This notice is provided in accordance with 25 Pa. Code Chapters 91 and 92a and 40 CFR Part 122, implementing The Clean Streams Law (35 P.S. §§ 691.1—691.1001) and the Federal Clean Water Act (33 U.S.C.A. §§ 1251—1376). More information on the types of NPDES and WQM permits that are available can be found on DEP's website (visit www.dep.pa.gov and select Businesses, Water, Bureau of Clean Water, Wastewater Management, and NPDES and WQM Permitting Programs).

PA0021148, Sewage, SIC Code 4952, **Municipal Authority of Westmoreland County**, 124 Park & Pool Road, New Stanton, PA 15672. Facility Name: Mt Pleasant Borough STP. This existing facility is located in Mount Pleasant Borough, **Westmoreland County**.

Description of Existing Activity: The application is for a renewal of an NPDES permit for an existing discharge of treated sewage.

The receiving stream(s), Shupe Run (WWF), is located in State Water Plan watershed 19-D and is classified for Warm Water Fishes, aquatic life, water supply and recreation. The discharge is not expected to affect public water supplies.

The proposed effluent limits for Outfall 001 are based on a design flow of 1.5 MGD.—Interim Limits.

Parameters	<i>Mass Units (lbs/day)</i>			<i>Concentrations (mg/L)</i>		
	<i>Daily</i>		<i>Minimum</i>	<i>Daily</i>		<i>IMAX</i>
	<i>Average Monthly</i>	<i>Maximum</i>		<i>Average Monthly</i>	<i>Maximum</i>	
Copper, Total (ug/L)	Report	Report	XXX	Report	Report	XXX
Cyanide, Free (ug/L)	Report	Report	XXX	Report	Report	XXX
Benzo(k)Fluoranthene (ug/L)	Report	Report	XXX	Report	Report	XXX
Dichlorobromomethane (ug/L)	Report	Report	XXX	Report	Report	XXX
Bis(2-Ethylhexyl)Phthalate (ug/L)	Report	Report	XXX	Report	Report	XXX
Chloroform (ug/L)	Report	Report	XXX	Report	Report	XXX
Indeno(1,2,3-cd)Pyrene (ug/L)	Report	Report	XXX	Report	Report	XXX

The proposed effluent limits for Outfall 001 are based on a design flow of 1.5 MGD.—Interim Limits.

Parameters	<i>Mass Units (lbs/day)</i>			<i>Concentrations (mg/L)</i>		
	<i>Average Monthly</i>	<i>Average Weekly</i>	<i>Minimum</i>	<i>Average Monthly</i>	<i>Maximum</i>	<i>IMAX</i>
Total Residual Chlorine (TRC)	XXX	XXX	XXX	0.03	XXX	0.10

The proposed effluent limits for Outfall 001 are based on a design flow of 1.5 MGD.—Final Limits.

Parameters	<i>Mass Units (lbs/day)</i>			<i>Concentrations (mg/L)</i>		
	<i>Average Monthly</i>	<i>Average Weekly</i>	<i>Minimum</i>	<i>Average Monthly</i>	<i>Maximum</i>	<i>IMAX</i>
Total Residual Chlorine (TRC)	XXX	XXX	XXX	0.011	XXX	0.035

The proposed effluent limits for Outfall 001 are based on a design flow of 1.5 MGD.—Final Limits.

Parameters	<i>Mass Units (lbs/day)</i>		<i>Concentrations (mg/L)</i>			
	<i>Daily</i>		<i>Daily</i>			
	<i>Average Monthly</i>	<i>Maximum</i>	<i>Minimum</i>	<i>Average Monthly</i>	<i>Maximum</i>	<i>IMAX</i>
Copper, Total (ug/L)	0.12	0.18	XXX	9.46	14.2	14.2
Cyanide, Free (ug/L)	0.051	0.079	XXX	4.06	6.33	10.1
Benzo(k)Fluoranthene (ug/L)	0.0001	0.0002	XXX	0.012	0.018	0.029
Dichlorobromomethane (ug/L)	0.014	0.021	XXX	5.78	9.02	14.4
Bis(2-Ethylhexyl)Phthalate (ug/L)	0.005	0.007	XXX	0.37	0.58	0.93
Chloroform (ug/L)	0.072	0.11	XXX	5.78	9.02	14.4
Indeno(1,2,3-cd)Pyrene (ug/L)	0.00001	0.00002	XXX	0.001	0.002	0.003

The proposed effluent limits for Outfall 001 are based on a design flow of 1.5 MGD.—Limits.

Parameters	Mass Units (lbs/day)		Concentrations (mg/L)			
	Average Monthly	Weekly Average	Minimum	Average Monthly	Weekly Average	IMAX
Flow (MGD)	Report	Report	XXX	XXX	XXX	XXX
pH (S.U.)	XXX	XXX	6.0 Daily Min	XXX	9.0 Daily Max	XXX
Dissolved Oxygen	XXX	XXX	5.0 Daily Min	XXX	XXX	XXX
Carbonaceous Biochemical Oxygen Demand (CBOD ₅)	220.0	335.0	XXX	17.0	27.0	36
Nov 1 - Apr 30						
May 1 - Oct 31	125.0	185.0	XXX	10.0	15.0	20
Biochemical Oxygen Demand (BOD ₅)	Report	Report	XXX	Report	XXX	XXX
Raw Sewage Influent						
Total Suspended Solids	310.0	475.0	XXX	25.0	38.0	50
Total Suspended Solids	Report	Report	XXX	Report	XXX	XXX
Raw Sewage Influent						
Fecal Coliform (No./100 ml)	XXX	XXX	XXX	2,000 Geo Mean	XXX	10,000
Oct 1 - Apr 30						
May 1 - Sep 30	XXX	XXX	XXX	200 Geo Mean	XXX	1,000
E. Coli (No./100 ml)	XXX	XXX	XXX	XXX	XXX	Report
Ammonia-Nitrogen	40.0	XXX	XXX	3.2	4.8	6.4
Nov 1 - Apr 30						
May 1 - Oct 31	23.9	XXX	XXX	1.91	3.82	XXX
Iron, Dissolved (ug/L)	Report	Report	XXX	Report	Report	XXX
					Daily Max	
Zinc, Total (ug/L)	Report	Report	XXX	Report	Report	XXX
					Daily Max	

The proposed effluent limits for Outfall 001 are based on a design flow of 1.5 MGD.—Limits.

Parameters	<i>Mass Units (lbs/day)</i>		<i>Concentrations (mg/L)</i>			
	<i>Average Monthly</i>	<i>Average</i>	<i>Weekly</i>		<i>Weekly</i>	
			<i>Average</i>	<i>Minimum</i>	<i>Average</i>	<i>Maximum</i>
Total Nitrogen	XXX	XXX	XXX	XXX	Report	XXX
					Daily Max	
Total Phosphorus	XXX	XXX	XXX	XXX	Report	XXX
					Daily Max	

You may make an appointment to review the DEP files on this case by calling the File Review Coordinator at 412-442-4000.

The EPA Waiver is not in effect.

Southwest Regional Office

ATTACHMENT B
EPA Comment Email

Polakoski, Grace

From: Fulton, Jennifer <Fulton.Jennifer@epa.gov>
Sent: Monday, August 14, 2023 4:51 PM
To: Polakoski, Grace
Cc: Iasmin, Mahbuba; Furjanic, Sean; Schumack, Maria; Martinsen, Jessica; Hales, Dana; Shuart, Ryan
Subject: [External] Mt Pleasant Borough STP (PA0021148)

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Grace;

According to our Memorandum of Agreement, the Environmental Protection Agency (EPA) Region III has received the revised draft National Pollutant Discharge Elimination System (NPDES) permit for:

Mt Pleasant Borough STP
Municipal Authority of Westmoreland County (MAWC)
NPDES Number: PA0021148
EPA Received Revised Draft: 8/9/2023
30-day response date: 9/8/2023

This is a major permit that discharges to Shupe Run. This permit is being revised to incorporate the applicable CSO performance standard, the corrected CSO outfall information, an updated CSO LTCP implementation compliance schedule. The revised fact sheet also addresses EPA's previous comments regarding RP and WET. EPA has chosen to perform a limited review of the changes made to the CSO permit requirements, RP and WET. EPA has completed its review and has no comments.

Should you have any questions, please feel free to reach out to Ryan Shuart, copied on this email. If there are any additional changes to the permit documents, please be sure to reach out to EPA as additional review may be necessary.

Thank you,
Jen Fulton



Jennifer Fulton (she/her)
Acting Chief, Clean Water Branch
US EPA Mid-Atlantic Region
Phone 304-234-0248
Email fulton.jennifer@epa.gov



ATTACHMENT C

MAWC Response Letter

An Equal Opportunity Employer 124 Park and Pool Road
New Stanton, PA 15672
Phone: 724.756.5800
1.800.442.6828



Mailing Address
P.O. Box 730
Greensburg, PA 15601

www.mawc.org
mawc@mawc.org

August 28, 2023

Dr. Mahbuba Iasmin
PA DEP Clean Water Program
400 Waterfront Drive
Pittsburgh, PA 15222

Re: Mt. Pleasant Borough STP (PA0021148)
Second Draft NPDES Permit Comments

Dear Dr. Iasmin:

MAWC has reviewed the second draft ND PES permit for Mt. Pleasant Borough STP and would like to provide the following comments:

Pages 3, 4

- Original MAWC comment: Benzo(k)Fluoranthene, Bis(2-Ethylhexyl)Phthalate, and Indeno(1,2,3-cd)Pyrene were added to the effluent limitations even though all of the sample results for these parameters were non-detect during the 10 weeks of effluent resampling.

Fact Sheet: “The resampling data does not replace the data provided in the renewal application, it is considered additional information.”

MAWC response: The original data provided in the renewal application had qualifiers on the laboratory analysis results. Below is a table showing the original laboratory analysis results for these three parameters:

Parameter	Effluent (ug/L)		
	3/9/2022	3/16/2022	3/23/2022
Benzo(k)Fluoranthene	<0.0814	<0.0806	0.135 ^J
Bis(2-Ethylhexyl)Phthalate	0.843 ^{B,J}	2.69 ^{B,J}	2.70 ^{B,J}
Indeno(1,2,3-cd)Pyrene	<0.0569 ^B	0.0971 ^{B,J}	0.125 ^{B,J}

- The J qualifier is defined as follows: “The analyte was detected above the method detection limit but below the method reporting limit; the reported result is an estimated value.”
- The B qualifier is defined as follows: “The target analyte was detected in the Method, Dilution Water, Instrument, or Extraction Blank or Sterility Check at or above the method Reporting Limit or applicable method, client, or regulatory requirement.”

The DEP SOP for Establishing QBELs and Permit Conditions for Toxic Pollutants in NPDES Permits (BCW-PMT-037) states that data cannot be discarded “unless there are extenuating circumstances such as laboratory or sampling error...” MAWC believes that laboratory error is evident in the fact that all three samples for Bis(2-Ethylhexyl)Phthalate and Indeno(1,2,3-cd)Pyrene had a qualifier showing that these parameters were detected in the laboratory blanks. Furthermore, all of the “detected” results for these three parameters had qualifiers showing that they were estimated values below the laboratory’s method reporting limit. For the resampling, MAWC requested that the laboratory report results to their method reporting limit, which would meet the DEP’s Target QL and would provide reliable values within the range of known precision and accuracy rather than estimated values.

Fact Sheet: “It should be noted that the effluent data reported on the NPDES Renewal application did not meet DEP criteria for resampling, as reflected in the Pre-Draft Letter dated June 28, 2022.”

MAWC response: What are the DEP criteria for resampling? These criteria are not explicitly stated on the Pre-Draft Letter dated June 28, 2022.

Fact Sheet: “MAWC elected to collect additional data anyway.”

MAWC response: As noted above, MAWC collected additional data because the original data included on the permit renewal application had qualifiers on the laboratory analysis results. MAWC’s understanding was that these qualified results needed to be discarded and that MAWC needed to provide valid, unqualified results to DEP.

- MAWC still believes that a sample frequency of 1/week is excessive for non-conventional parameters that have been added to this permit for the first time. The Fact Sheet states that “For pollutants where only monitoring is required, DEP can decrease the sampling frequency from 1/week to 1/month.” The parameters listed on page 3 only require monitoring until the end of the 2nd year from the Permit Effective Date. Therefore, MAWC requests that the sample frequency be changed to 1/month until the end of the 2nd year from the Permit Effective Date.

Page 5

- The effluent limitations for TRC were changed from 0.03 mg/L to 0.011 mg/L (Average Monthly) and from 0.10 mg/L to 0.035 mg/L (Instantaneous Maximum). The DEP SOP for Establishing Effluent Limitations for Individual Sewage Permits (BCW-PMT-033) states that “For existing discharges, where the existing TRC limit is at or below 0.1 mg/L, the existing limit may remain in the reissued permit (no modeling required).”

Page 6

- The Fact Sheet states that the BOD influent and TSS influent monitoring requirements were changed to “Report Daily Max”, but this change is not reflected in the Part A Effluent Limitations table.

Page 7

- The Average Weekly concentration limits for ammonia nitrogen remained in the permit, but in the DEP Technical Guidance for the Development and Specification of Effluent Limitations and Other Permit Conditions in NPDES Permits (362-0400-001) Table 5-3: Methods of Expressing Effluent Limits for Sewage Discharges (Chapter 5, Page 18), the footnote for Average Weekly concentration states “Only CBOD and TSS limitation.”

Page 26

- The instantaneous flow for not accepting hauled-in wastes was changed from 3.0 MGD to 4.0 MGD instead of 4.5 MGD.
- If the language in Part C.II.B.1.d-e remains in the permit, is MAWC going to be considered in violation of the permit if MAWC does not perform street cleaning and storm sewer inlet cleaning even though this work is the responsibility of the municipality?

Page 27

- The percent capture requirement was changed from 85% to 94% based on comments received from the EPA. MAWC believes that the EPA is misinterpreting the meaning of the 94% value in the LTCP. See attached letter from Gibson-Thomas Engineering, who prepared the LTCP, for a more detailed explanation.

Page 33

- MAWC does not believe that Benzo(k)Fluoranthene, Bis(2-Ethylhexyl)Phthalate, and Indeno(1,2,3-cd)Pyrene should be included in the WQBELs table and TRE requirement because all of the sample results for these parameters were non-detect during the 10 weeks of effluent resampling. The full explanation is included in the first bullet point under “Pages 3, 4” above.

Pages 39 – 40

- MAWC does not believe that a TRC Minimization Plan should be required because the TRC limits should have remained the same in the reissued permit, as discussed in the bullet point under “Page 5” above.

If you have any questions or would like to discuss these comments, please contact me at kwarheit@mawc.org or 724-454-0233.

Sincerely,



Katelyn Warheit
Environmental Compliance Superintendent
Municipal Authority of Westmoreland County

cc: Dom Garofola, Gibson-Thomas Engineering



Latrobe Corporate Office
1004 Ligonier Street, PO Box 853
Latrobe, PA 15650
Phone: **724-539-8562**
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www.gibson-thomas.com

kwarheit@mawc.org

August 24, 2023

Katelyn Warheit
Municipal Authority of Westmoreland County
124 Park & Pool Road
New Stanton PA 15672

Subject: Mount Pleasant Borough WWTP (PA0021148)
NPDES Permit Comments

Dear Katie,

In response to the above noted, it is my recommendation that the Municipal Authority of Westmoreland County should object to the requirement that 94% of the combined sewer flows must be captured. Our objection should be based on the following:

The EPA CSO Control Policy lays out two alternative approaches to evaluate CSO controls: the presumption approach and the demonstration approach. Each approach has an overall objective to meet water quality standards and protect existing and designated uses. Mount Pleasant Borough (now Municipal Authority of Westmoreland County) selected the presumption approach in which Mount Pleasant presumed that if they met 85% capture then water quality guidelines were met based on EPA guidance.

The MAWC – Mount Pleasant LTCP evaluated various Options to fulfill the presumption approach, which requires (as one possible criterion) the elimination, or capture for treatment, of no less than 85% by volume, of the combined sewage collected in the CSS during precipitation events on a system-wide, annual average basis. The selected Alternative resulted in the modeling predicting that the percentage capture would be **approximately 94%**, which meets the EPA CSO Control Policy presumptive approach criterion of 85% by volume capture. Please note that the percent capture by volume calculations were done within the developed PCSWMM model. Overall, the model is an estimation based on average rainfall, not actual rainfall.

A similar situation occurs with the EPA's secondary treatment rule. The secondary treatment rule says that a plan must provide 85% removal of BOD and TSS on a monthly average basis. It is a condition in every NPDES permit.

A well operated plant can routinely achieve better than 85% removal. Just because a plant can achieve (say 94% removal), that does not mean that the permit requirement revises the removal threshold to 94%. The permit requirement stays at 85% removal in accordance with the secondary treatment rule.

The LTCP did not state that MAWC – Mount Pleasant needed to capture 94% by volume to meet water quality standards (demonstrative approach). The approximate 94% capture predicted by the model was strictly based on flow volumes and was not based on any stream sampling data evaluated with respect to meeting Water Quality Standards. Specifically, MAWC – Mount Pleasant selected the presumptive approach plan in which it is presumed that if they met 85% by volume capture rate then water quality guidelines were met based on EPA guidance.

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The developed model predicted MAWC – Mount Pleasant could capture 94% by volume which is greater than or equal to EPA guidance of 85% capture by volume; hence, fulfilling the presumption approach. This plan meets the "no less than 85%" criterion. In summary, based on the new draft amendment, it seems that the EPA and DEP are raising the percent based on the demonstrative approach. As a result, the permit should not utilize a threshold/requirement of 94%; it should be "no less than 85%" as required by PA DEP/DEP.

Please contact me should you have any questions or require any additional information.

Very truly yours,

GIBSON-THOMAS ENGINEERING CO., INC.



Daniel F. Schmitt, P.E.

DFS/dld

Cc: Municipal Authority of Westmoreland County – Mike Kukura
Municipal Authority of Westmoreland County – Norm Stout

ATTACHMENT D
Revision Four of the Laboratory Report for Effluent
Samples Collected March 23, 2022



Amended Results Report
Order ID: 2C05004

Request E-s...

Environmental Service Laboratories, Inc. 1803 Philadelphia Street Indiana, PA 15701	Project: NPDES Permit Renewals
Attn: Rebecca Erwin	Regulatory ID:

Sample Number: 2C05004-01	Site: 2032021-01	Sample ID: 2032021
Collector: Client	Collect Date: 03/23/2022 7:00 am	Sample Type: Composite

Department / Test / Parameter	Result	Units	Method	R.L.	DF	Prep Date	By	Analysis Date	By
<u>Inorganics</u>									
Chromium (VI)	< 0.10	µg/L	EPA 218.6	0.10	1	04/04/22	DSM	04/04/22 13:10	ZJH
<u>Metals</u>									
Antimony	< 0.2	µg/L	EPA 200.8	0.2	1	04/01/22	MKR	04/04/22 11:35	MKR
Arsenic	< 0.4	µg/L	EPA 200.8	0.4	1	04/01/22	MKR	04/04/22 11:35	MKR
Cadmium	< 0.1	µg/L	EPA 200.8	0.1	1	04/01/22	MKR	04/04/22 11:35	MKR
Cobalt	< 0.2	µg/L	EPA 200.8	0.2	1	04/01/22	RPV	04/04/22 11:35	RPV
Lead	< 0.3	µg/L	EPA 200.8	0.3	1	04/01/22	MKR	04/04/22 11:35	MKR
Selenium	< 0.5	µg/L	EPA 200.8	0.5	1	04/01/22	MKR	04/04/22 11:35	MKR
Silver	< 0.2	µg/L	EPA 200.8	0.2	1	04/01/22	MKR	04/04/22 11:35	MKR
Thallium	< 0.05	µg/L	EPA 200.8	0.05	1	04/01/22	MKR	04/04/22 11:35	MKR
Zinc	28	µg/L	EPA 200.8	4	1	04/01/22	MKR	04/04/22 11:35	MKR
<u>Semivolatiles</u>									
SVOA, 625, PPL									
Acenaphthene	< 0.0990	L1 µg/L	EPA 625.1	0.0990	1	03/29/22	AMAA	03/31/22 3:21	MAG
Acenaphthylene	< 0.0894	µg/L	EPA 625.1	0.0894	1	03/29/22	AMAA	03/31/22 3:21	MAG
Anthracene	< 0.0875	µg/L	EPA 625.1	0.0875	1	03/29/22	AMAA	03/31/22 3:21	MAG
Benzidine	< 4.81	µg/L	EPA 625.1	4.81	1	03/29/22	AMAA	03/31/22 3:21	MAG
Benzo(a)anthracene	< 0.0596	µg/L	EPA 625.1	0.0596	1	03/29/22	AMAA	03/31/22 3:21	MAG
Benzo(a)pyrene	< 0.0692	µg/L	EPA 625.1	0.0692	1	03/29/22	AMAA	03/31/22 3:21	MAG
Benzo(b)fluoranthene	< 0.0433	µg/L	EPA 625.1	0.0433	1	03/29/22	AMAA	03/31/22 3:21	MAG
Benzo(g,h,i)perylene	< 0.0788	B3 µg/L	EPA 625.1	0.0788	1	03/29/22	AMAA	03/31/22 3:21	MAG
Benzo(k)fluoranthene	0.135	J µg/L	EPA 625.1	0.0798	1	03/29/22	AMAA	03/31/22 3:21	MAG
4-Bromophenyl phenyl ether	< 0.104	L1 µg/L	EPA 625.1	0.104	1	03/29/22	AMAA	03/31/22 3:21	MAG
Butyl benzyl phthalate	< 0.0635	µg/L	EPA 625.1	0.0635	1	03/29/22	AMAA	03/31/22 3:21	MAG
4-Chloro-3-methylphenol	< 0.0952	µg/L	EPA 625.1	0.0952	1	03/29/22	AMAA	03/31/22 3:21	MAG
bis(2-Chloroethoxy) methane	< 0.0817	µg/L	EPA 625.1	0.0817	1	03/29/22	AMAA	03/31/22 3:21	MAG
bis(2-Chloroethyl) ether	< 0.0750	µg/L	EPA 625.1	0.0750	1	03/29/22	AMAA	03/31/22 3:21	MAG
bis(2-Chloroisopropyl) ether	< 0.0856	L1 µg/L	EPA 625.1	0.0856	1	03/29/22	AMAA	03/31/22 3:21	MAG
2-Chloronaphthalene	< 0.0875	L1 µg/L	EPA 625.1	0.0875	1	03/29/22	AMAA	03/31/22 3:21	MAG
2-Chlorophenol	< 0.0875	µg/L	EPA 625.1	0.0875	1	03/29/22	AMAA	03/31/22 3:21	MAG
4-Chlorophenyl phenyl ether	< 0.0913	µg/L	EPA 625.1	0.0913	1	03/29/22	AMAA	03/31/22 3:21	MAG
Chrysene	< 0.0702	µg/L	EPA 625.1	0.0702	1	03/29/22	AMAA	03/31/22 3:21	MAG
Dibenz(a,h)anthracene	< 0.0510	µg/L	EPA 625.1	0.0510	1	03/29/22	AMAA	03/31/22 3:21	MAG

Report Generated On: 03/13/2023 11:28 am 2C05004
STL_Results Revision #2.1 Effective: 09/01/2022





Sample Number: 2C05004-01	Site: 2032021-01	Sample ID: 2032021
Collector: Client	Collect Date: 03/23/2022 7:00 am	Sample Type: Composite

Department / Test / Parameter	Result	Units	Method	R.L.	DF	Prep Date	By	Analysis Date	By
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Semivolatiles (Continued)

SVOA, 625, PPL (Continued)

Di-n-butyl phthalate	0.423	B, J	µg/L	EPA 625.1	0.0817	1	03/29/22	AMAA	03/31/22	3:21	MAG
1,3-Dichlorobenzene	< 0.0750		µg/L	EPA 625.1	0.0750	1	03/29/22	AMAA	03/31/22	3:21	MAG
1,4-Dichlorobenzene	< 0.0846		µg/L	EPA 625.1	0.0846	1	03/29/22	AMAA	03/31/22	3:21	MAG
1,2-Dichlorobenzene	< 0.0875		µg/L	EPA 625.1	0.0875	1	03/29/22	AMAA	03/31/22	3:21	MAG
3,3'-Dichlorobenzidine	< 0.134		µg/L	EPA 625.1	0.134	1	03/29/22	AMAA	03/31/22	3:21	MAG
2,4-Dichlorophenol	< 0.0788	L1	µg/L	EPA 625.1	0.0788	1	03/29/22	AMAA	03/31/22	3:21	MAG
Diethyl phthalate	0.500	B, J	µg/L	EPA 625.1	0.112	1	03/29/22	AMAA	03/31/22	3:21	MAG
2,4-Dimethylphenol	< 0.420		µg/L	EPA 625.1	0.420	1	03/29/22	AMAA	03/31/22	3:21	MAG
Dimethyl phthalate	< 0.0875		µg/L	EPA 625.1	0.0875	1	03/29/22	AMAA	03/31/22	3:21	MAG
4,6-Dinitro-2-methylphenol	< 0.113	C4	µg/L	EPA 625.1	0.113	1	03/29/22	AMAA	03/31/22	3:21	MAG
2,4-Dinitrophenol	< 2.88	C4	µg/L	EPA 625.1	2.88	1	03/29/22	AMAA	03/31/22	3:21	MAG
2,6-Dinitrotoluene	< 0.106	L1	µg/L	EPA 625.1	0.106	1	03/29/22	AMAA	03/31/22	3:21	MAG
2,4-Dinitrotoluene	< 0.0808		µg/L	EPA 625.1	0.0808	1	03/29/22	AMAA	03/31/22	3:21	MAG
Di-n-octyl phthalate	< 0.0731		µg/L	EPA 625.1	0.0731	1	03/29/22	AMAA	03/31/22	3:21	MAG
1,2-Diphenylhydrazine	< 0.113		µg/L	EPA 625.1	0.113	1	03/29/22	AMAA	03/31/22	3:21	MAG
bis(2-Ethylhexyl) phthalate	2.70	B, J	µg/L	EPA 625.1	0.178	1	03/29/22	AMAA	03/31/22	3:21	MAG
Fluoranthene	< 0.0856	B3	µg/L	EPA 625.1	0.0856	1	03/29/22	AMAA	03/31/22	3:21	MAG
Fluorene	< 0.104	B3, L1	µg/L	EPA 625.1	0.104	1	03/29/22	AMAA	03/31/22	3:21	MAG
Hexachlorobenzene	< 0.0846		µg/L	EPA 625.1	0.0846	1	03/29/22	AMAA	03/31/22	3:21	MAG
Hexachlorobutadiene	< 0.0788		µg/L	EPA 625.1	0.0788	1	03/29/22	AMAA	03/31/22	3:21	MAG
Hexachlorocyclopentadiene	< 0.0433		µg/L	EPA 625.1	0.0433	1	03/29/22	AMAA	03/31/22	3:21	MAG
Hexachloroethane	< 0.0663	L1	µg/L	EPA 625.1	0.0663	1	03/29/22	AMAA	03/31/22	3:21	MAG
Indeno(1,2,3-cd)pyrene	0.125	B, J	µg/L	EPA 625.1	0.0558	1	03/29/22	AMAA	03/31/22	3:21	MAG
Isophorone	< 0.0942		µg/L	EPA 625.1	0.0942	1	03/29/22	AMAA	03/31/22	3:21	MAG
Naphthalene	< 0.0615		µg/L	EPA 625.1	0.0615	1	03/29/22	AMAA	03/31/22	3:21	MAG
Nitrobenzene	< 0.0596	L1	µg/L	EPA 625.1	0.0596	1	03/29/22	AMAA	03/31/22	3:21	MAG
4-Nitrophenol	< 0.0394		µg/L	EPA 625.1	0.0394	1	03/29/22	AMAA	03/31/22	3:21	MAG
2-Nitrophenol	< 0.0490		µg/L	EPA 625.1	0.0490	1	03/29/22	AMAA	03/31/22	3:21	MAG
N-Nitrosodimethylamine	< 0.0635		µg/L	EPA 625.1	0.0635	1	03/29/22	AMAA	03/31/22	3:21	MAG
n-Nitrosodiphenylamine	< 0.202		µg/L	EPA 625.1	0.202	1	03/29/22	AMAA	03/31/22	3:21	MAG
N-Nitrosodi-n-propylamine	< 0.0885		µg/L	EPA 625.1	0.0885	1	03/29/22	AMAA	03/31/22	3:21	MAG
Pentachlorophenol	< 0.100		µg/L	EPA 625.1	0.100	1	03/29/22	AMAA	03/31/22	3:21	MAG
Phenanthrene	< 0.0952	L1	µg/L	EPA 625.1	0.0952	1	03/29/22	AMAA	03/31/22	3:21	MAG
Phenol	< 0.0433		µg/L	EPA 625.1	0.0433	1	03/29/22	AMAA	03/31/22	3:21	MAG
Pyrene	0.250	B, L1, J	µg/L	EPA 625.1	0.0885	1	03/29/22	AMAA	03/31/22	3:21	MAG
1,2,4-Trichlorobenzene	< 0.0894	L1	µg/L	EPA 625.1	0.0894	1	03/29/22	AMAA	03/31/22	3:21	MAG
2,4,6-Trichlorophenol	< 0.0952		µg/L	EPA 625.1	0.0952	1	03/29/22	AMAA	03/31/22	3:21	MAG

Surrogate Recoveries	Results	Units	Method	%Recovery	DF	Limits (%Recovery)	Analysis Date
Surrogate: 2-Fluorophenol	79.7	µg/L	EPA 625.1	41%	1	10-79	03/31/22 3:21
Surrogate: Phenol-d6	54.6	µg/L	EPA 625.1	28%	1	10-57	03/31/22 3:21
Surrogate: Nitrobenzene-d5	64.6	µg/L	EPA 625.1	67%	1	24-119	03/31/22 3:21
Surrogate: 2-Fluorobiphenyl	60.9	µg/L	EPA 625.1	63%	1	29-115	03/31/22 3:21

Report Generated On: 03/13/2023 11:28 am 2C05004
STL_Results Revision #2.1 Effective: 09/01/2022

SUBURBAN TESTING LABS



1037F MacArthur Road, Reading, PA 19605 Phone: 610-375-TEST Fax: 610-375-4090 suburbantestinglabs.com

PA DEP # 06-00208
NJDEP # PA001



Sample Number: 2C05004-01	Site: 2032021-01	Sample ID: 2032021
Collector: Client	Collect Date: 03/23/2022 7:00 am	Sample Type: Composite

Department / Test / Parameter	Result	Units	Method	R.L.	DF	Prep Date	By	Analysis Date	By
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Semivolatiles (Continued)

SVOA, 825, PPL (Continued)

Surrogate Recoveries (Continued)	Results	Units	Method	%Recovery	DF	Limits (%Recovery)	Analysis Date
Surrogate: 2,4,6-Tribromophenol	152	µg/L	EPA 625.1	79%	1	10-141	03/31/22 3:21
Surrogate: p-Terphenyl-d14	67.7	µg/L	EPA 625.1	70%	1	44-124	03/31/22 3:21

SVOA, 8270 SIM

1,4-Dioxane, SIM	< 0.1	µg/L	SW846 3510C/8270E	0.1	1	03/29/22	MAG	03/31/22 3:21	MAG
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Surrogate Recoveries	Results	Units	Method	%Recovery	DF	Limits (%Recovery)	Analysis Date
Surrogate: 2-Fluorophenol	79.7	µg/L	SW846 3510C/8270E	41%	1	10-79	03/31/22 3:21
Surrogate: Phenol-d6	54.6	µg/L	SW846 3510C/8270E	28%	1	10-57	03/31/22 3:21
Surrogate: Nitrobenzene-d5	64.6	µg/L	SW846 3510C/8270E	67%	1	24-119	03/31/22 3:21
Surrogate: 2-Fluorobiphenyl	60.9	µg/L	SW846 3510C/8270E	63%	1	29-115	03/31/22 3:21
Surrogate: 2,4,6-Tribromophenol	152	µg/L	SW846 3510C/8270E	79%	1	10-141	03/31/22 3:21
Surrogate: p-Terphenyl-d14	67.7	µg/L	SW846 3510C/8270E	70%	1	44-124	03/31/22 3:21

Report Generated On: 03/13/2023 11:28 am 2C05004
STL_Results Revision #2.1 Effective: 09/01/2022

SUBURBAN TESTING LABS



1037F MacArthur Road, Reading, PA 19605 Phone: 610-375-TEST Fax: 610-375-4090 suburbantestinglabs.com

PA DEP # 06-00208
NJDEP# PA081



Sample Number: 2C05004-02	Site: 2032021-02	Sample ID: 2032021
Collector: Client	Collect Date: 03/23/2022 10:15 am	Sample Type: Grab

Inorganics

Department / Test / Parameter	Result	Units	Method	R.L.	DF	Prep Date	By	Analysis Date	By	
Cyanide, Free	5	B	µg/L	OIA 1677-09	0.5	1	04/01/22	CJ	04/01/22 11:37	cj
Phenolics	40	J	µg/L	EPA 420.1	20	1	03/31/22	ZJH	03/31/22 15:44	ZJH

Volatiles

Department / Test / Parameter	Result	Units	Method	R.L.	DF	Prep Date	By	Analysis Date	By	
VOA, 624, PPL										
Acrolein	< 0.9	P	µg/L	EPA 624.1	0.9	1	03/25/22	MWS	03/25/22 18:43	LAS
Acrylonitrile	< 0.3	P	µg/L	EPA 624.1	0.3	1	03/25/22	MWS	03/25/22 18:43	LAS
Benzene	< 0.04		µg/L	EPA 624.1	0.04	1	03/25/22	MWS	03/25/22 18:43	LAS
Bromodichloromethane	2.5		µg/L	EPA 624.1	0.08	1	03/25/22	MWS	03/25/22 18:43	LAS
Bromoform	< 0.1		µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 18:43	LAS
Bromomethane	< 0.1		µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 18:43	LAS
Carbon Tetrachloride	< 0.1		µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 18:43	LAS
Chlorobenzene	< 0.07		µg/L	EPA 624.1	0.07	1	03/25/22	MWS	03/25/22 18:43	LAS
Chloroethane	< 0.06		µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 18:43	LAS
2-Chloroethyl vinyl ether	< 0.1		µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 18:43	LAS
Chloroform	20.7		µg/L	EPA 624.1	0.09	1	03/25/22	MWS	03/25/22 18:43	LAS
Chloromethane	< 0.09		µg/L	EPA 624.1	0.09	1	03/25/22	MWS	03/25/22 18:43	LAS
Dibromochloromethane	0.7		µg/L	EPA 624.1	0.08	1	03/25/22	MWS	03/25/22 18:43	LAS
1,1-Dichloroethane	< 0.06		µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 18:43	LAS
1,2-Dichloroethane	< 0.08		µg/L	EPA 624.1	0.08	1	03/25/22	MWS	03/25/22 18:43	LAS
1,1-Dichloroethene	< 0.07		µg/L	EPA 624.1	0.07	1	03/25/22	MWS	03/25/22 18:43	LAS
trans-1,2-Dichloroethene	< 0.1		µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 18:43	LAS
1,2-Dichloropropane	< 0.1		µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 18:43	LAS
1,3-Dichloropropene, Total	< 0.06		µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 18:43	LAS
Ethyl Benzene	< 0.06		µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 18:43	LAS
Methylene Chloride	0.2		µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 18:43	LAS
1,1,2,2-Tetrachloroethane	< 0.1		µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 18:43	LAS
Tetrachloroethene	< 0.09		µg/L	EPA 624.1	0.09	1	03/25/22	MWS	03/25/22 18:43	LAS
Toluene	0.1		µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 18:43	LAS
1,1,1-Trichloroethane	< 0.06		µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 18:43	LAS
1,1,2-Trichloroethane	< 0.08		µg/L	EPA 624.1	0.08	1	03/25/22	MWS	03/25/22 18:43	LAS
Trichloroethene	< 0.1		µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 18:43	LAS
Vinyl Chloride	< 0.1		µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 18:43	LAS

Surrogate Recoveries	Results	Units	Method	%Recovery	DF	Limits (%Recovery)	Analysis Date
Surrogate: Dibromofluoromethane	21.4	µg/L	EPA 624.1	107%	1	60-140	03/25/22 18:43
Surrogate: 1,2-Dichloroethane-d4	21.1	µg/L	EPA 624.1	106%	1	60-140	03/25/22 18:43
Surrogate: Toluene-d8	19.6	µg/L	EPA 624.1	98%	1	60-140	03/25/22 18:43
Surrogate: Bromofluorobenzene	18.7	µg/L	EPA 624.1	93%	1	60-140	03/25/22 18:43

Report Generated On: 03/13/2023 11:28 am 2C05004
STL_Results Revision #2.1 Effective: 09/01/2022

SUBURBAN TESTING LABS



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PA DEP # 06-00208
NJDEP# PA061



Sample Number: 2C05004-03	Site: Trip Blank	Sample ID: 2032021-03							
Collector: Client	Collect Date: 03/23/2022 12:00 am	Sample Type: Grab							
Department / Test / Parameter	Result	Units	Method	R.L.	DF	Prep Date	By	Analytic Date	By

Volatiles

VOA, 624, Trip Blank

Acetone	< 1.2	µg/L	EPA 624.1	1.2	1	03/25/22	MWS	03/25/22 17:48	MWS
Acrolein	< 0.9	µg/L	EPA 624.1	0.9	1	03/25/22	MWS	03/25/22 17:48	MWS
Acrylonitrile	< 0.3	µg/L	EPA 624.1	0.3	1	03/25/22	MWS	03/25/22 17:48	MWS
Allyl Chloride	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
Benzene	< 0.04	µg/L	EPA 624.1	0.04	1	03/25/22	MWS	03/25/22 17:48	MWS
Bromobenzene	< 0.06	µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 17:48	MWS
Bromochloromethane	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
Bromodichloromethane	< 0.08	µg/L	EPA 624.1	0.08	1	03/25/22	MWS	03/25/22 17:48	MWS
Bromoform	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
Bromomethane	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
2-butanone (MEK)	< 0.2	µg/L	EPA 624.1	0.2	1	03/25/22	MWS	03/25/22 17:48	MWS
tert-Butylbenzene	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
sec-Butylbenzene	< 0.05	µg/L	EPA 624.1	0.05	1	03/25/22	MWS	03/25/22 17:48	MWS
n-Butylbenzene	< 0.08	µg/L	EPA 624.1	0.08	1	03/25/22	MWS	03/25/22 17:48	MWS
Carbon Tetrachloride	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
Chlorobenzene	< 0.07	µg/L	EPA 624.1	0.07	1	03/25/22	MWS	03/25/22 17:48	MWS
Chloroethane	< 0.06	µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 17:48	MWS
2-Chloroethyl vinyl ether	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
Chloroform	< 0.09	µg/L	EPA 624.1	0.09	1	03/25/22	MWS	03/25/22 17:48	MWS
Chloromethane	< 0.09	µg/L	EPA 624.1	0.09	1	03/25/22	MWS	03/25/22 17:48	MWS
2-Chlorotoluene	< 0.05	µg/L	EPA 624.1	0.05	1	03/25/22	MWS	03/25/22 17:48	MWS
4-Chlorotoluene	< 0.05	µg/L	EPA 624.1	0.05	1	03/25/22	MWS	03/25/22 17:48	MWS
1,2-Dibromo-3-chloropropane (DBCP)	< 0.3	µg/L	EPA 624.1	0.3	1	03/25/22	MWS	03/25/22 17:48	MWS
Dibromochloromethane	< 0.08	µg/L	EPA 624.1	0.08	1	03/25/22	MWS	03/25/22 17:48	MWS
1,2-Dibromoethane (EDB)	< 0.07	µg/L	EPA 624.1	0.07	1	03/25/22	MWS	03/25/22 17:48	MWS
Dibromomethane	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
1,4-Dichlorobenzene	< 0.08	µg/L	EPA 624.1	0.08	1	03/25/22	MWS	03/25/22 17:48	MWS
1,3-Dichlorobenzene	< 0.05	µg/L	EPA 624.1	0.05	1	03/25/22	MWS	03/25/22 17:48	MWS
1,2-Dichlorobenzene	< 0.09	µg/L	EPA 624.1	0.09	1	03/25/22	MWS	03/25/22 17:48	MWS
Dichlorodifluoromethane	< 0.08	µg/L	EPA 624.1	0.08	1	03/25/22	MWS	03/25/22 17:48	MWS
1,1-Dichloroethane	< 0.06	µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 17:48	MWS
1,2-Dichloroethane	< 0.08	µg/L	EPA 624.1	0.08	1	03/25/22	MWS	03/25/22 17:48	MWS
1,1-Dichloroethene	< 0.07	µg/L	EPA 624.1	0.07	1	03/25/22	MWS	03/25/22 17:48	MWS
cis-1,2-dichloroethene	< 0.05	µg/L	EPA 624.1	0.05	1	03/25/22	MWS	03/25/22 17:48	MWS
trans-1,2-Dichloroethene	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
1,2-Dichloropropane	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
1,3-Dichloropropane	< 0.07	µg/L	EPA 624.1	0.07	1	03/25/22	MWS	03/25/22 17:48	MWS
2,2-Dichloropropane	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
trans-1,3-Dichloropropene	< 0.06	µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 17:48	MWS
cis-1,3-Dichloropropene	< 0.06	µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 17:48	MWS
1,1-dichloropropene	< 0.07	µg/L	EPA 624.1	0.07	1	03/25/22	MWS	03/25/22 17:48	MWS
Ethyl Benzene	0.1	µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 17:48	MWS
Hexachlorobutadiene	< 0.3	µg/L	EPA 624.1	0.3	1	03/25/22	MWS	03/25/22 17:48	MWS

Report Generated On: 03/13/2023 11:28 am 2C05004
STL_Results Revision #2.1 Effective: 09/01/2022

SUBURBAN TESTING LABS



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PA DEP # 06-00208
NJDEP # PA001



Sample Number: 2C05004-03	Site: Trip Blank	Sample ID: 2032021-03
Collector: Client	Collect Date: 03/23/2022 12:00 am	Sample Type: Grab

Department / Test / Parameter	Result	Units	Method	R.L.	DF	Prep Date	By	Analysis Date	By
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Volatiles (Continued)

VOA, 624, Trip Blank (Continued)

2-hexanone	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
Isopropylbenzene	< 0.06	µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 17:48	MWS
4-Isopropyltoluene	< 0.2	µg/L	EPA 624.1	0.2	1	03/25/22	MWS	03/25/22 17:48	MWS
Methylene chloride	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
4-methyl-2-pentanone	< 0.08	µg/L	EPA 624.1	0.08	1	03/25/22	MWS	03/25/22 17:48	MWS
Methyl-t-butyl ether (MTBE)	< 0.05	µg/L	EPA 624.1	0.05	1	03/25/22	MWS	03/25/22 17:48	MWS
Naphthalene	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
n-Propylbenzene	< 0.08	µg/L	EPA 624.1	0.08	1	03/25/22	MWS	03/25/22 17:48	MWS
Styrene	< 0.05	µg/L	EPA 624.1	0.05	1	03/25/22	MWS	03/25/22 17:48	MWS
1,1,2,2-Tetrachloroethane	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
1,1,1,2-Tetrachloroethane	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
Tetrachloroethene	< 0.09	µg/L	EPA 624.1	0.09	1	03/25/22	MWS	03/25/22 17:48	MWS
Toluene	< 0.06	µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 17:48	MWS
1,2,4-Trichlorobenzene	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
1,2,3-Trichlorobenzene	< 0.2	µg/L	EPA 624.1	0.2	1	03/25/22	MWS	03/25/22 17:48	MWS
1,1,1-Trichloroethane	< 0.06	µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 17:48	MWS
1,1,2-Trichloroethane	< 0.08	µg/L	EPA 624.1	0.08	1	03/25/22	MWS	03/25/22 17:48	MWS
Trichloroethene	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
Trichlorofluoromethane	< 0.07	µg/L	EPA 624.1	0.07	1	03/25/22	MWS	03/25/22 17:48	MWS
1,2,3-Trichloropropane	< 0.08	µg/L	EPA 624.1	0.08	1	03/25/22	MWS	03/25/22 17:48	MWS
1,3,5-Trimethylbenzene	< 0.06	µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 17:48	MWS
1,2,4-Trimethylbenzene	0.2	µg/L	EPA 624.1	0.06	1	03/25/22	MWS	03/25/22 17:48	MWS
Vinyl Chloride	< 0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
o-Xylene	0.1	µg/L	EPA 624.1	0.05	1	03/25/22	MWS	03/25/22 17:48	MWS
m,p-xylene	0.1	µg/L	EPA 624.1	0.1	1	03/25/22	MWS	03/25/22 17:48	MWS
Xylenes, Total	< 0.2	µg/L	EPA 624.1	0.2	1	03/25/22	MWS	03/25/22 17:48	MWS

Surrogate Recoveries	Results	Units	Method	%Recovery	DF	Limits (%Recovery)	Analysis Date
Surrogate: Dibromofluoromethane	20.6	µg/L	EPA 624.1	103%	1	60-140	03/25/22 17:48
Surrogate: 1,2-Dichloroethane-d4	21.2	µg/L	EPA 624.1	106%	1	60-140	03/25/22 17:48
Surrogate: Toluene-d8	19.5	µg/L	EPA 624.1	97%	1	60-140	03/25/22 17:48
Surrogate: Bromofluorobenzene	18.8	µg/L	EPA 624.1	94%	1	60-140	03/25/22 17:48

Report Generated On: 03/13/2023 11:28 am 2C05004
STL_Results Revision #2.1 Effective: 09/01/2022





Data Qualifiers:

- B The target analyte was detected in the Method, Dilution Water, Instrument or Extraction Blank or Sterility Check at or above the method Reporting Limit or applicable method, client, or regulatory requirement.
- B3 The target analyte was detected in the Method, Dilution Water, Instrument or Extraction Blank or Sterility Check at or above the MRL or applicable method, client, or regulatory requirement. Possibility of high bias in the sample result, however it is ND.
- C4 The CCV for this analyte was above acceptance criteria, however the analyte was not detected in the associated sample. Data may be fully useable under the applicable TNI Standard.
- J The analyte was detected above the method detection limit but below the method reporting limit; the reported result is an estimated value.
- L1 The Laboratory Control Sample for the analysis batch associated with this sample was below acceptance criteria. Results may have greater uncertainty.
- P Preservation for this analysis did not meet regulatory or method requirements.

Sample Receipt Conditions:

All samples met the sample receipt requirements for the relevant analyses.

Units P/A = Present/Absent
Units P/F = Pass/Fail

** This report has been Amended (Rev4) and replaces all previous reports for this order ID **

The test *pH*, Lab is performed in the Laboratory as soon as possible. These results are not appropriate for compliance with NPDES, SDWA, or other regulatory programs that require analysis within 15 minutes of sample collection and should be considered for informational purposes only.

**pH*, Final for ASTM leachate is performed by method SM 4500-H-B.

All results meet the requirements of STL's TNI (NELAC) Accredited Quality System unless otherwise noted. If your results contain any data qualifiers or comments, you should evaluate usability relative to your needs.

If collectors initials include "STL", samples have been collected in accordance with STL SOP SL0015.

All results reported on an As Received (Wet Weight) basis unless otherwise noted.

This laboratory report may not be reproduced, except in full, without the written approval of STL.

Results are considered Preliminary unless report is signed by authorized representative of STL.

Reviewed and Released By:

Lauren Uille
Project Manager I

Report Generated On: 03/13/2023 11:28 am 2C05004
STL_Results Revision #2.1 Effective: 09/01/2022

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SUBURBAN TESTING LABS



PA DEP # 06-00208
NJDEP# PA001

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2C05004
Lisa F. Carr

CONTRACT ORDER

Environmental Service Laboratories, Inc.
2032021

esl@envlabs.com. Contact ESL with any questions.

SENDING LABORATORY:

Environmental Service Laboratories, Inc.
1803 Philadelphia Street
Indiana, PA 15701
Phone: 724-463-8378
Fax: 724-465-4209
Project Manager: Kirsten Conoran

RECEIVING LABORATORY:

Suburban Water Testing Labs - Reading
1037F MacArthur Road
Reading, PA 19605
Phone : (610) 375-8378
Fax: 1610-375-4090

State of Origin: PA

Analysis	Due	Expires	Comments
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Sample ID: 2032021-01

Matrix: Water Sampled: 03/23/2022 07:00 Sample Type: Composite Sampled By: Client

Antimony ICP-MS	04/04/2022 23:00	09/19/2022 07:00	Report to MDL
Arsenic ICP-MS	04/04/2022 23:00	09/19/2022 07:00	Report to MDL
Cadmium ICP-MS	04/04/2022 23:00	09/19/2022 07:00	Report to MDL
Hexavalent Cr	04/04/2022 23:00	03/24/2022 07:00	Report to MDL
Lead ICP-MS	04/04/2022 23:00	09/19/2022 07:00	Report to MDL
Selenium ICP-MS	04/04/2022 23:00	09/19/2022 07:00	Report to MDL
Silver ICP-MS	04/04/2022 23:00	09/19/2022 07:00	Report to MDL
SVOC 625	04/04/2022 23:00	03/30/2022 07:00	Reference profile 542606
Thallium ICP-MS	04/04/2022 23:00	09/19/2022 07:00	Report to MDL
Zinc ICP-MS	04/04/2022 23:00	09/19/2022 07:00	Report to MDL

Containers Supplied:

Poly 500mL, HNO3 (A) Poly 250mL (C) Amber Glass, 1000mL (F) Amber Glass, 1000mL (G) Amber Glass, 1000mL (H)

Sample ID: 2032021-02

Matrix: Water Sampled: 03/23/2022 10:15 Sample Type: Grab Sampled By: Client

Cyanide, Free Subcontract	04/04/2022 23:00	04/06/2022 10:15	Report to MDL
Total Phenolics	04/04/2022 23:00	04/20/2022 10:15	EPA 420.1, Target QL 5 ug/l
VOC 624	04/04/2022 23:00	04/06/2022 10:15	Reference profile 542606

Containers Supplied:

Poly 500mL, NaOH (B) Amber Glass, 1000mL, H2SO4 (E) VOA Vial, 40mL (F) VOA Vial, 40mL (G) VOA Vial, 40mL (H)

Sample ID: 2032021-03

Matrix: Water Sampled: 03/23/2022 00:00 Sample Type: Trip Blank Sampled By: Client

VOC 624	04/04/2022 23:00	04/06/2022 00:00	Reference profile 542606
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Containers Supplied:

VOA Vial, 40mL (A) VOA Vial, 40mL (B)

Suburban Testing Labs

Lab Date/Time: 3/24/22 10:10 Lab Temp: 5.6°C

Number of containers/coolers match number on COC? Y/N
Sample labels and COC are free of discrepancies? Y/N
All containers intact? Y/N
Received in lab within acceptable temperature limits? Y/N
40 mL VOA vials free of headspace? Y/N

Released By: SPM Date: 3/23/22 Received By: _____

Released By: _____ Date: _____ Received By: _____

Relinquished by: Delivery Received in lab by: (17)



ATTACHMENT E

Previous TRC Model Output

TRC_CALC.XLS

1A	B	C	D	E	F	G
2	TRC EVALUATION		Enter Facility Name in E3			
3	Input appropriate values in B4:B8 and E4:E7					
4	0.1287	= Q stream (cfs)	0.5	= CV Daily		
5	1.5	= Q discharge (MGD)	0.5	= CV Hourly		
6	30	= no. samples	1	= AFC_Partial Mix Factor		
7	0.8	= Chlorine Demand of Strea	1	= CFC_Partial Mix Factor		
8		= Chlorine Demand of Disch	15	= AFC_Criteria Compliance Time (min)		
9	0.5	= BAT/BPJ Value	720	= CFC_Criteria Compliance Time (min)		
		= % Factor of Safety (FOS)		= Decay Coefficient (K)		
#	Source	Reference	AFC Calculations	Reference	FC Calculations	
#	TRC	1.3.2.iii	WLA_afc = 0.064	1.3.2.iii	WLA_cfc = 0.056	
#	PENTOXSD T	5.1a	LTAMULT_afc = 0.373	5.1c	LTAMULT_cfc = 0.581	
#	PENTOXSD T	5.1b	LTA_afc = 0.024	5.1d	LTA_cfc = 0.033	
#	Source	Effluent Limit Calculations				
#	PENTOXSD T	5.1f	AML_MULT = 1.231			
#	PENTOXSD T	5.1g	AVG_MON_LIMIT (mg/l) = 0.030	AFC		
#			INST_MAX_LIMIT (mg/l) = 0.097			
	WLA_afc	(.019/e(-k*AFC_tc)) + [(AFC_Yc*Qs*.019/Qd*e(-k*AFC_tc))... ...+ Xd + (AFC_Yc*Qs*Xs/Qd)]*(1-FOS/100)				
	LTAMULT_afc	EXP((0.5*LN(cvh^2+1))-2.326*LN(cvh^2+1)^0.5)				
	LTA_afc	wla_afc*LTAMULT_afc				
	WLA_cfc	(.011/e(-k*CFC_tc)) + [(CFC_Yc*Qs*.011/Qd*e(-k*CFC_tc))... ...+ Xd + (CFC_Yc*Qs*Xs/Qd)]*(1-FOS/100)				
	LTAMULT_cfc	EXP((0.5*LN(cvd^2/no_samples+1))-2.326*LN(cvd^2/no_samples+1)^0.5)				
	LTA_cfc	wla_cfc*LTAMULT_cfc				
	AML_MULT	EXP(2.326*LN((cvd^2/no_samples+1)^0.5)-0.5*LN(cvd^2/no_samples+1))				
	AVG_MON_LIMI	MIN(BAT_BPJ,MIN(LTA_afc,LTA_cfc)*AML_MULT)				
	INST_MAX_LIMI	1.5*((av_mon_limit/AML_MULT)/LTAMULT_afc)				

ATTACHMENT F

Current TRC Model Output

TRC EVALUATION					
Input appropriate values in A3:A9 and D3:D9					
0.0319	= Qstream (cfs)			0.5	= CV Daily
1.5	= Qdischarge (MGD)			0.5	= CV Hourly
30	= no. samples			1	= AFC_Partial Mix Factor
0.3	= Chlorine Demand of Stream			1	= CFC_Partial Mix Factor
0	= Chlorine Demand of Discharge			15	= AFC_Criteria Compliance Time (min)
0.5	= BAT/BPJ Value			720	= CFC_Criteria Compliance Time (min)
0	= % Factor of Safety (FOS)				= Decay Coefficient (K)
Source	Reference	AFC Calculations		Reference	CFC Calculations
TRC	1.3.2.iii	WLA_afc = 0.023		1.3.2.iii	WLA_cfc = 0.015
PENTOXSD TRG	5.1a	LTAMULT_afc = 0.373		5.1c	LTAMULT_cfc = 0.581
PENTOXSD TRG	5.1b	LTA_afc = 0.009		5.1d	LTA_cfc = 0.009
Source	Effluent Limit Calculations				
PENTOXSD TRG	5.1f	AML_MULT = 1.231			
PENTOXSD TRG	5.1g	AVG MON LIMIT (mg/l) = 0.011		AFC	
		INST MAX LIMIT (mg/l) = 0.035			
WLA_afc	$(.019/e^{-k \cdot AFC_tc}) + [(AFC_Yc \cdot Qs \cdot 0.19/Qd) \cdot e^{-k \cdot AFC_tc}] \dots$				
	$\dots + Xd + (AFC_Yc \cdot Qs \cdot Xs/Qd)]^2 (1-FOS/100)$				
LTAMULT_afc	$EXP((0.5 \cdot LN(cvh^2+1)) - 2.326 \cdot LN(cvh^2+1)^{0.5})$				
LTA_afc	$wla_afc \cdot LTAMULT_afc$				
WLA_cfc	$(.011/e^{-k \cdot CFC_tc}) + [(CFC_Yc \cdot Qs \cdot 0.11/Qd) \cdot e^{-k \cdot CFC_tc}] \dots$				
	$\dots + Xd + (CFC_Yc \cdot Qs \cdot Xs/Qd)]^2 (1-FOS/100)$				
LTAMULT_cfc	$EXP((0.5 \cdot LN(cvd^2/no_samples+1)) - 2.326 \cdot LN(cvd^2/no_samples+1)^{0.5})$				
LTA_cfc	$wla_cfc \cdot LTAMULT_afc$				
AML_MULT	$EXP(2.326 \cdot LN((cvd^2/no_samples+1)^{0.5}) - 0.5 \cdot LN(cvd^2/no_samples+1))$				
AVG MON LIMIT	$MIN(BAT_BPJ, MIN(LTA_afc, LTA_cfc) \cdot AML_MULT)$				
INST MAX LIMIT	$1.5 \cdot ((av_mon_limi/AML_MULT)/LTAMULT_afc)$				

ATTACHMENT G

MAWC Pre-Draft Survey Response



**NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES)
PRE-DRAFT PERMIT SURVEY FOR TOXIC POLLUTANTS**

Permittee Name: Municipal Authority of Westmoreland County Permit No.: PA0021148

Pollutant(s) identified by DEP that may require WQBELs: 8 pollutants

Is the permittee aware of the source(s) of the pollutant(s)? Yes No Suspected

If Yes or Suspected, describe the known or suspected source(s) of pollutant(s) in the effluent.

Has the permittee completed any studies in the past to control or treat the pollutant(s)? Yes No

If Yes, describe prior studies and results:

Does the permittee believe it can achieve the proposed WQBELs now? Yes No Uncertain

If No, describe the activities, upgrades or process changes that would be necessary to achieve the WQBELs, if known.

Estimated date by which the permittee could achieve the proposed WQBELs: _____ Uncertain

Will the permittee conduct additional sampling for the pollutant(s) to supplement the application? Yes No

Check the appropriate box(es) below to indicate site-specific data that have been collected by the permittee in the past. If any of these data have not been submitted to DEP, please attach to this survey.

<input type="checkbox"/> Discharge pollutant concentration coefficient(s) of variability	Year(s) Studied:
<input type="checkbox"/> Discharge and background Total Hardness concentrations (metals)	Year(s) Studied:
<input type="checkbox"/> Background / ambient pollutant concentrations	Year(s) Studied:
<input type="checkbox"/> Chemical translator(s) (metals)	Year(s) Studied:
<input type="checkbox"/> Slope and width of receiving waters	Year(s) Studied:
<input type="checkbox"/> Velocity of receiving waters at design conditions	Year(s) Studied:
<input type="checkbox"/> Acute and/or chronic partial m x factors (mixing at design conditions)	Year(s) Studied:
<input type="checkbox"/> Volatilization rates (highly volatile organics)	Year(s) Studied:
<input type="checkbox"/> Site-specific criteria (e.g., Water Effect Ratio or related study)	Year(s) Studied:

Please submit this survey to the DEP regional office that is reviewing the permit application within 30 days of receipt.