

Application Type Renewal  
Facility Type Municipal  
Major / Minor Minor

**NPDES PERMIT FACT SHEET  
INDIVIDUAL SEWAGE**

Application No. PA0023892  
APS ID 1110452  
Authorization ID 1478659

**Applicant and Facility Information**

Applicant Name	<u>Masontown Municipal Authority</u>	Facility Name	<u>Bessemer Run STP</u>
Applicant Address	<u>1 E Church Street</u> <u>Masontown, PA 15461-1841</u>	Facility Address	<u>State Route 3011</u> <u>Masontown, PA 15461</u>
Applicant Contact	<u>Mark Durant</u>	Facility Contact	<u>Edgar Harris</u>
Applicant Phone	<u>(724) 583-7731</u>	Facility Phone	<u>(724) 966-2278</u>
Client ID	<u>39690</u>	Site ID	<u>713796</u>
Ch 94 Load Status	<u>Projected Hydraulic Overload</u>	Municipality	<u>German Township</u>
Connection Status	<u>Dept. Imposed Connection Prohibitions</u>	County	<u>Fayette</u>
Date Application Received	<u>March 28, 2024</u>	EPA Waived?	<u>Yes</u>
Date Application Accepted	<u>April 25, 2024</u>	If No, Reason	<u></u>
Purpose of Application	<u>NPDES permit renewal.</u>		

**Summary of Review**


The Pa Department of Environmental Protection (PADEP/Department) received an NPDES permit renewal application from Masontown Municipal Authority (permittee) on March 28, 2024 for permittee's Bessemer STP (facility). This is a minor sewage facility with a design flow of 0.2 MGD that discharges into Cats Run (WWF) in state watershed 19-G. The current permit will expire on June 30, 2024. The terms and conditions of the current permit is administratively extended since the renewal application was not received at least 180 days prior to expiration date. Renewal NPDES permit application under Clean Water Program are not covered by PADEP's PDG per 021-2100-001. This fact sheet is developed in accordance with 40 CFR §124.56.

Changes to existing permit: Added: E. Coli.

Sludge use and disposal description and location(s): Aerobically digested sludge hauled-off to other WWTP.

Public Participation

DEP will publish notice of the receipt of the NPDES permit application and a tentative decision to issue the individual NPDES permit in the *Pennsylvania Bulletin* in accordance with 25 Pa. Code § 92a.82. Upon publication in the *Pennsylvania Bulletin*, DEP will accept written comments from interested persons for a 30-day period (which may be extended for one additional 15-day period at DEP's discretion), which will be considered in making a final decision on the application. Any person may request or petition for a public hearing with respect to the application. A public hearing may be held if DEP determines that there is significant public interest in holding a hearing. If a hearing is held, notice of the hearing will be published in the *Pennsylvania Bulletin* at least 30 days prior to the hearing and in at least one newspaper of general circulation within the geographical area of the discharge.

Approve	Deny	Signatures	Date
√		Reza H. Chowdhury, E.I.T. / Project Manager 	April 25, 2024
X		<b>Pravin Patel</b> Pravin C. Patel, P.E. / Environmental Engineer Manager	05/14/2024

Discharge, Receiving Waters and Water Supply Information			
Outfall No.	001	Design Flow (MGD)	0.2
Latitude	39° 50' 23"	Longitude	-79° 53' 51"
Quad Name	Masontown	Quad Code	2006
Wastewater Description: Sewage Effluent			
Receiving Waters	Cats Run (WWF)/Monongahela River (POFU)	Stream Code	41314, 37185 (POFU)
NHD Com ID	99416774	RMI	1.48, 82.03 (POFU)
Drainage Area	2.59 mi <sup>2</sup> , 4,460 mi <sup>2</sup> (POFU)	Yield (cfs/mi <sup>2</sup> )	
Q <sub>7-10</sub> Flow (cfs)		Q <sub>7-10</sub> Basis	
Elevation (ft)		Slope (ft/ft)	
Watershed No.	19-G	Chapter 93 Class.	WWF
Existing Use		Existing Use Qualifier	
Exceptions to Use		Exceptions to Criteria	
Assessment Status	Impaired		
Cause(s) of Impairment	METALS, PH, SILTATION		
Source(s) of Impairment	ACID MINE DRAINAGE, EROSION FROM DERELICT LAND (BARREN LAND)		
TMDL Status	Final (April 9, 2003)	Name	Cats Run
Nearest Downstream Public Water Supply Intake	Southeastern PA Water Authority		
PWS Waters	Monongahela River	Flow at Intake (cfs)	
PWS RMI	77.68	Distance from Outfall (mi)	5.82 mile

Changes Since Last Permit Issuance: None

**Streamflow:**

Per the previous fact sheet, a survey was conducted to determine the stream health (POFU) in 1992. The survey determined that the receiving stream, Cats Run, is impaired from Acid Mine Drainage (AMD) due to abandoned coal mine drainage. The stream pH was found to be 2.7 S.U. The survey concluded that there was no aquatic life to protect from the Outfall 001 to the confluence with Monongahela River, approximately 1.48 miles downstream. The stream health report was re-examined in 2013 by Regional Aquatic Biologist, and again on 2019. Both reviews stated that the stream health is still impaired from AMD. POFU was presumably determined at confluence with Monongahela River. For this reason, the limits were developed for this discharge as if the discharge is in Monongahela River. The dilution is too high at the Monongahela River ((347 cfs/(0.2 MGD\*1.547 cfs/MGD)) or 1,121:1 at Q<sub>7-10</sub> condition. Due to the much larger dilution, the WQM model wouldn't be utilized and secondary limits should be protective.

**PWS Intake:**

The nearby downstream PWS intake is Southeastern PA Water Authority, on Monongahela River, at 77.68 RMI which is approximately 5.82 miles downstream of the outfall 001. Due to the larger dilution, the discharge from the facility is expected not to have an adverse effect on the PWS intake.

**Cats Run Watershed TMDL:**

Cats Run is a part of the Monongahela River Basin located in southwest Pa, approximately 50 miles south of Pittsburgh. It is adjacent to the town of Masontown in Fayette County. There are no active mining operations in the watershed. All of the discharges in the watershed are from abandoned mines and were treated as non-point sources during TMDL development. Cats Run has been severely affected by acid mine drainage. There currently is a GFCC reclamation project underway in the watershed. This TMDL, as any AMD TMDL, identified three primary metals associated with the AMD- Iron, Manganese, and Aluminum. Treated sewage discharge from a minor STP, like this facility, is expected to be less than water quality criteria and not contributing to the stream impairment. The current permit has annual monitoring

requirements for these three metals which will be reviewed. If a Reasonable Potential isn't demonstrated, existing annual monitoring will be continued.

**Antidegradation (Ch. 93.4):**

The effluent limits for this discharge have been developed to ensure that existing in-stream uses and the level of water quality necessary to protect the existing uses are maintained and protected. The receiving stream is designated as Warm Water Fishes (WWF). No High-Quality watershed is impacted by this discharge. No Exceptional-value watershed is impacted by this discharge.

**Class A Wild Trout Fisheries:**

No Class A wild trout fisheries are impacted by this discharge.

Treatment Facility Summary				
<b>Treatment Facility Name:</b> Bessemer STP				
<b>WQM Permit No.</b>		<b>Issuance Date</b>		
<b>Waste Type</b>	<b>Degree of Treatment</b>	<b>Process Type</b>	<b>Disinfection</b>	<b>Avg Annual Flow (MGD)</b>
Sewage	Secondary	Activated Sludge	Ultraviolet	0.2
<b>Hydraulic Capacity (MGD)</b>				
0.2	<b>Organic Capacity (lbs./day)</b>		<b>Load Status</b>	<b>Biosolids Treatment</b>
	333		Projected Hydraulic Overload	Aerobic Digestion
			<b>Biosolids Use/Disposal</b>	Other WWTP

Changes Since Last Permit Issuance: To remediate the existing hydraulic overload condition due to wet weather flow, the permittee proposed and PADEP approved a Corrective Action Plan (CAP) on June 14, 2017. As part of the CAP, the following actions were identified and completed:

<b>Masontown Borough Bessemer Run WWTF</b>			<b>Reporting Period</b>	
Masontown Borough	Fayette County	PA0023892	FROM 1/1/2023	TO 7/31/2023

Task Description	Proposed Start Date	Actual Start Date	Required Completion Date	Actual Completion Date	% of Task Complete	Comments
1. Verification of Previous Testing	9/15/2016	10/17/2016	4/1/2017	3/1/2017	100%	Remediation list compiled
2. Inspection, Mapping, Cleaning & Televising	4/3/2017	4/12/2016	6/23/2017	6/19/2017	100%	Borough wide GIS completed
3. Pre-Construction Flow Monitoring & Analysis	6/26/2017	10/1/2017	10/27/2017	6/30/2018	100%	Flow Monitoring Completed
4. Project Design & Permitting	10/30/2017	5/1/2018	1/13/2020	1/6/2021	100%	WQM Part II Permit # 467S035-A4 Issued 1/6/2021
5. Project Construction	6/30/2021	4/18/2022	6/30/2022	4/4/2023	100%	Notice to Proceed 4/18/2022
6. Post- Construction Flow Monitoring & Analysis	4/1/2023		10/1/2023		0%	
7. Submittal of Plan for Additional Measures*	1/1/2024		6/1/2024		0%	

A Part II WQM permit was issued (amended) on January 2021 that authorized construction of the following items:

- Approximately 12,461 LF of 8" diameter PVC sewers
- Approximately 1,975 LF of 12" diameter PVC sewers
- Approximately 2,190 LF of 8" diameter CIPP Liner
- Approximately 9,479 LF of 6" diameter PVC laterals

- 73 4' diameter Precast Concrete Manholes
- Sewer appurtenances

Due to the hydraulic overload condition, a Department Imposed Connection Prohibition is in place until the CAP is satisfied.

**Treatment Plant Description**

Municipal Authority of Masontown (MAM/Permittee) owns and operates a sewage treatment plant, named Bessemer STP (facility), located in Masontown Borough, Fayette County. This is a minor STP with average annual design flow of 0.2 MGD, hydraulic design capacity of 0.2 MGD, and organic design capacity of 333 lbs. BOD5/day. The facility collects 84% of its flow from Masontown Borough, serving 537 EDUs, and 16% from German Township, serving 100 EDUs. The application stated the average annual flow for 2021, 2022, and 2023 was 0.1733 MGD, 0.1822 MGD, and 0.1509 MGD. The highest monthly average flow for previous year (2023) was 0.2551 MGD.

Flow enters a surge tank that empties into a combination bar screen/comminutor that flows into aeration tanks which thereafter flows through a clarifier. The flow from the clarifier is disinfected in a UV system and discharged via Outfall 001.

Compliance History

DMR Data for Outfall 001 (from March 1, 2023 to February 29, 2024)

Parameter	FEB-24	JAN-24	DEC-23	NOV-23	OCT-23	SEP-23	AUG-23	JUL-23	JUN-23	MAY-23	APR-23	MAR-23
Flow (MGD) Average Monthly	0.20680	0.23007	0.13702	0.13586	0.11978	0.11025	0.19972	0.12157	0.13502	0.12305	0.12738	0.18753
Flow (MGD) Daily Maximum	0.36264	0.34627	0.21243	0.22510	0.21110	0.19591	0.35947	0.16671	0.20341	0.19295	0.19427	0.35913
pH (S.U.) Instantaneous Minimum	6.8	6.6	6.2	6.7	6.4	6.6	6.7	6.8	6.7	6.6	6.7	6.6
pH (S.U.) IMAX	7.3	7.5	7.2	7.2	7.1	7.4	7.3	7.3	7.3	7.1	7.2	7.4
DO (mg/L) Instantaneous Minimum	7.0	6.1	5.9	5.2	5.6	5.4	5.7	5.8	6.4	6.7	5.2	6.4
CBOD5 (lbs/day) Average Monthly	3.6	6.8	6.0	2.8	1.6	1.7	3.4	1.9	2.4	2.5	3.6	3.6
CBOD5 (lbs/day) Weekly Average	6.0	15.1	7.8	3.5	1.8	2.0	5.9	2.2	3.8	3.3	5.5	6.0
CBOD5 (mg/L) Average Monthly	2.0	3.0	5.2	2.5	2.0	2.0	2.2	2.0	2.4	2.4	3.3	2.3
CBOD5 (mg/L) Weekly Average	2.0	5.9	6.2	2.9	2.0	2.0	2.6	2.0	3.5	3.1	4.0	3.1
BOD5 (lbs/day) Raw Sewage Influent Average Monthly	218.5	182.4	116.1	184.6	236.6	106.9	167.1	67.0	103.5	145.7	122.0	144.2
BOD5 (lbs/day) Raw Sewage Influent Daily Maximum	466.4	372.9	166.8	335.1	588.8	159.5	278.2	85.6	152.8	229.6	161.8	202.0
BOD5 (mg/L) Raw Sewage Influent Average Monthly	120.0	106.2	102.7	187.9	302.9	124.8	113.6	69.4	107.5	138.5	119.8	108.0
TSS (lbs/day) Average Monthly	8.9	21.3	8.4	6.2	4.0	4.3	10.2	5.0	5.3	5.3	5.3	8.2
TSS (lbs/day) Raw Sewage Influent Average Monthly	303.0	317.5	95.4	140.0	141.8	111.8	121.0	50.6	91.3	120.1	119.8	119.3
TSS (lbs/day) Raw Sewage Influent Daily Maximum	786.3	733.7	184.4	198.4	263.4	188.3	216.7	60.4	140.5	161.0	174.8	152.1
TSS (lbs/day) Weekly Average	15.1	43.9	12.7	8.5	4.5	5.1	26.4	6.0	6.6	6.1	6.9	14.2

**NPDES Permit Fact Sheet  
Bessemer Run STP**

**NPDES Permit No. PA0023892**

TSS (mg/L) Average Monthly	5.0	9.0	7.3	5.6	5.0	5.0	5.8	5.3	5.3	5.0	5.0	5.0
TSS (mg/L) Raw Sewage Influent Average Monthly	146.0	157.6	86.0	135.2	182.0	129.0	79.6	53.0	91.5	114.8	117.0	84.0
TSS (mg/L) Weekly Average	5.0	17.0	10.0	8.0	5.0	5.0	9.0	6.0	6.0	5.0	5.0	5.0
Fecal Coliform (No./100 ml) Geometric Mean	6	5	7	35	17	12	33	12	4	5	14	7
Fecal Coliform (No./100 ml) IMAX	93	44	167	186	147	51	174	122	43	31	184	37
UV Transmittance (%) Instantaneous Minimum	5.1	3.6	4.0	4.6	5.1	2.9	4.1	7.0	4.2	4.0	3.9	3.7
UV Transmittance (%) Average Monthly	6.1	5.4	5.6	5.7	6.8	7.9	7.9	7.8	7.5	6.6	6.0	5.5
Total Nitrogen (mg/L) Daily Maximum			4.3									
Ammonia (lbs/day) Average Monthly	0.3	0.3	10.8	1.2	0.1	0.1	0.2	0.2	0.2	0.5	4.3	1.9
Ammonia (mg/L) Average Monthly	0.2	0.2	9.4	1.2	0.2	0.2	0.1	0.2	0.2	0.5	3.9	1.7
Total Phosphorus (mg/L) Daily Maximum			2.4									
Total Aluminum (mg/L) Daily Maximum			0.17									
Total Iron (mg/L) Daily Maximum			0.08									
Total Manganese (mg/L) Daily Maximum			0.01									

Existing Limits

Parameter	Effluent Limitations						Monitoring Requirements	
	Mass Units (lbs/day) <sup>(1)</sup>		Concentrations (mg/L)				Minimum <sup>(2)</sup> Measurement Frequency	Required Sample Type
	Average Monthly	Weekly Average	Instantaneous Minimum	Average Monthly	Weekly Average	Instant. Maximum		
Flow (MGD)	Report	Report Daily Max	XXX	XXX	XXX	XXX	Continuous	Recorded
pH (S.U.)	XXX	XXX	6.0	XXX	XXX	9.0	1/day	Grab
Dissolved Oxygen	XXX	XXX	4.0	XXX	XXX	XXX	1/day	Grab
Carbonaceous Biochemical Oxygen Demand (CBOD5)	41.7	62.6	XXX	25.0	37.5	50	1/week	8-Hr Composite
Biochemical Oxygen Demand (BOD5) Raw Sewage Influent	Report	Report Daily Max	XXX	Report	XXX	XXX	1/week	8-Hr Composite
Total Suspended Solids	50.1	75.1	XXX	30.0	45.0	60	1/week	8-Hr Composite
Total Suspended Solids Raw Sewage Influent	Report	Report Daily Max	XXX	Report	XXX	XXX	1/week	8-Hr Composite
Fecal Coliform (No./100 ml) Oct 1 - Apr 30	XXX	XXX	XXX	2000 Geo Mean	XXX	10000	1/week	Grab
Fecal Coliform (No./100 ml) May 1 - Sep 30	XXX	XXX	XXX	200 Geo Mean	XXX	1000	1/week	Grab
Ultraviolet light transmittance (%)	XXX	XXX	Report	Report	XXX	XXX	1/day	Recorded
Total Nitrogen	XXX	XXX	XXX	XXX	Report Daily Max	XXX	1/year	Grab
Ammonia-Nitrogen	Report	XXX	XXX	Report	XXX	XXX	1/week	8-Hr Composite
Total Phosphorus	XXX	XXX	XXX	XXX	Report Daily Max	XXX	1/year	Grab
Aluminum, Total	XXX	XXX	XXX	XXX	Report Daily Max	XXX	1/year	Grab
Iron, Total	XXX	XXX	XXX	XXX	Report Daily Max	XXX	1/year	Grab
Manganese, Total	XXX	XXX	XXX	XXX	Report Daily Max	XXX	1/year	Grab

**Development of Effluent Limitations**

<b>Outfall No.</b> <u>001</u>	<b>Design Flow (MGD)</b> <u>0.2</u>
<b>Latitude</b> <u>39° 50' 23.00"</u>	<b>Longitude</b> <u>-79° 53' 51.00"</u>
<b>Wastewater Description:</b> <u>Sewage Effluent</u>	

**Technology-Based Limitations**

The following technology-based limitations apply, subject to water quality analysis and BPJ where applicable:

Pollutant	Limit (mg/l)	SBC	Federal Regulation	State Regulation
CBOD <sub>5</sub>	25	Average Monthly	133.102(a)(4)(i)	92a.47(a)(1)
	40	Average Weekly	133.102(a)(4)(ii)	92a.47(a)(2)
Total Suspended Solids	30	Average Monthly	133.102(b)(1)	92a.47(a)(1)
	45	Average Weekly	133.102(b)(2)	92a.47(a)(2)
pH	6.0 – 9.0 S.U.	Min – Max	133.102(c)	95.2(1)
Fecal Coliform (5/1 – 9/30)	200 / 100 ml	Geo Mean	-	92a.47(a)(4)
Fecal Coliform (5/1 – 9/30)	1,000 / 100 ml	IMAX	-	92a.47(a)(4)
Fecal Coliform (10/1 – 4/30)	2,000 / 100 ml	Geo Mean	-	92a.47(a)(5)
Fecal Coliform (10/1 – 4/30)	10,000 / 100 ml	IMAX	-	92a.47(a)(5)
Total Residual Chlorine	0.5	Average Monthly	-	92a.48(b)(2)

**Mass-Based Limits**

The federal regulation at 40 CFR 122.45(f) requires that effluent limits be expressed in terms of mass, if possible. The regulation at 40 CFR 122.45(b) requires that effluent limitations for POTWs be calculated based on the design flow of the facility. The mass-based limits are expressed in pounds per day and are calculated as follows:

$$\text{Mass based limit (lb/day)} = \text{concentration limit (mg/L)} \times \text{design flow (mgd)} \times 8.34$$

**Water Quality-Based Limitations**

As discussed in page 2 of this fact sheet, a WQM wasn't performed due to much larger dilution of the receiving stream.

**Flow and Influent BOD<sub>5</sub> and TSS Monitoring Requirement:**

The requirement to monitor the volume of effluent will remain in the draft permit per 40 CFR § 122.44(i)(1)(ii). Influent BOD<sub>5</sub> and TSS monitoring requirements are established in the permit per the requirements set in Pa Code 25 Chapter 94.

**CBOD<sub>5</sub>:**

In absence of water quality analysis, technology-based limit of 25 mg/l as Average Monthly (AML) and 40.0 mg/l as Weekly Average are applicable. The Instantaneous Maximum (IMAX) limit of 50 mg/l is calculated by multiplying AML with a factor of 2. The current permit has AML of 25 mg/l but weekly average limit as 37.5 mg/l (calculated as 1.5 times AML) and referenced TBEL as governing limits. These limits will be carried over. Current mass-based limits are carried over.

**TSS:**

There is no water quality criterion for TSS. The existing limits of 30 mg/L average monthly, 45 mg/l average weekly, and 60 mg/L instantaneous maximum will remain in the permit based on the minimum level of effluent quality attainable by secondary treatment, 25 Pa. Code § 92a.47 and 40CFR 133.102(b). The mass based average monthly and weekly average limits are calculated to be 50.1 lbs./day and 75.1 lbs./day respectively, which are the same as were in existing permit and will be carried over.

**pH:**

The TBEL for pH is above 6.0 and below 9.0 S.U. (40 CFR §133.102(c) and Pa Code 25 §§ 95.2(1), 92a.47) which are existing limits and will be carried over.



**UV Disinfection:**

PADEP's SOP BCW-PMT-033 recommends UV parameter monitoring where UV is used as a method of disinfection, with the same frequency as would be if Chlorine is used for disinfection. The facility can monitor and report UV Transmittance in %. Daily minimum UV Transmittance will be continued in this renewal.

**Total Nitrogen:**

PADEP's SOP BCW-PMT-033 recommends monitoring for Total Nitrogen for facilities with design flow more than 2000-GPD, which is also supported by Pa Code 25 Ch. 92a.61. Current monitoring requirement will be continued.

**Total Phosphorus:**

PADEP's SOP BCW-PMT-033 recommends monitoring for Total Phosphorus for facilities with design flow more than 2000-GPD, which is also supported by Pa Code 25 Ch. 92a.61. Current monitoring requirement will be continued.

**Fecal Coliform:**

The recent coliform guidance in 25 Pa. code § 92a.47.(a)(4) requires a summer technology limit of 200/100 ml as a geometric mean and an instantaneous maximum not greater than 1,000/100ml and § 92a.47.(a)(5) requires a winter limit of 2,000/100ml as a geometric mean and an instantaneous maximum not greater than 10,000/100ml. These are existing requirements and will be carried over in this renewal.

**E. Coli:**

Pa Code 25 § 92a. 61 requires monitoring of E. Coli. DEP's SOP titled "Establishing Effluent Limitations for Individual Sewage Permits (BCW-PMT-033, revised March 24, 2021) recommends quarterly E. Coli monitoring for sewage dischargers with design flow greater than or equal to 0.05 MGD but less than 1.0 MGD. This requirement will be applied from this permit term.

**D.O.**

A minimum DO of 4.0 mg/l should be established based on BPJ to ensure adequate operation and maintenance, unless there is water quality concern. The receiving stream is WWF and not a Class A/ wild trout stocking waterbody. Therefore, existing limit will be carried over.

**Ammonia-N:**

Due to larger dilution, it is assumed that a limit of 25.0 mg/l as AML will be sufficient. For existing dischargers, if 25 mg/l as AML is acceptable, a year-round monitoring, at a minimum, may be imposed. Existing monitoring requirement will be carried over.

**TMDL Parameters:**

As discussed in pages 2 and 3 of this report, quarterly monitoring will be continued unless a reasonable potential is demonstrated. The sample results in the application indicated all three AMD parameters are discharging at a concentration lower than the most stringent criteria, therefore existing monitoring requirements will be carried over.

**Monitoring Frequency and Sample Types:**

Unless otherwise specified above, the monitoring frequency and sample type of compliance monitoring for existing parameters are recommended by DEP's SOP and Permit Writers Manual and/or on a case-by-case basis using best professional judgment (BPJ).

**Anti-Backsliding**

Anti-backsliding prohibition is justified in sections where an exception is justified for the affected pollutant(s). For remaining pollutants, this prohibition isn't applicable since the proposed limits are at least as stringent as were in current permit.

**Special Parameters Monitoring:**

PADEP has determined that they have sufficient data over the past 7 years of implementing the special monitoring logic for TDS, Sulfate, Chloride, Bromide, and 1,4-Dioxane, and monitoring is no longer needed. The previous permit didn't have TDS monitoring and it won't be included in this renewal.

**Proposed Effluent Limitations and Monitoring Requirements**

The limitations and monitoring requirements specified below are proposed for the draft permit, and reflect the most stringent limitations amongst technology, water quality and BPJ. Instantaneous Maximum (IMAX) limits are determined using multipliers of 2 (conventional pollutants) or 2.5 (toxic pollutants). Sample frequencies and types are derived from the “NPDES Permit Writer’s Manual” (386-0400-001), SOPs and/or BPJ.

**Outfall 001, Effective Period: Permit Effective Date through Permit Expiration Date.**


Parameter	Effluent Limitations						Monitoring Requirements	
	Mass Units (lbs/day) <sup>(1)</sup>		Concentrations (mg/L)				Minimum <sup>(2)</sup> Measurement Frequency	Required Sample Type
	Average Monthly	Weekly Average	Instantaneous Minimum	Average Monthly	Weekly Average	Instant. Maximum		
Flow (MGD)	Report	Report Daily Max	XXX	XXX	XXX	XXX	Continuous	Recorded
pH (S.U.)	XXX	XXX	6.0	XXX	XXX	9.0	1/day	Grab
DO	XXX	XXX	4.0	XXX	XXX	XXX	1/day	Grab
CBOD5	41.7	62.6	XXX	25.0	37.5	50	1/week	8-Hr Composite
BOD5 Internal Monitoring Point	Report	Report Daily Max	XXX	Report	XXX	XXX	1/week	8-Hr Composite
TSS	50.1	75.1	XXX	30.0	45.0	60	1/week	8-Hr Composite
TSS Internal Monitoring Point	Report	Report Daily Max	XXX	Report	XXX	XXX	1/week	8-Hr Composite
Fecal Coliform (No./100 ml) Oct 1 - Apr 30	XXX	XXX	XXX	2000 Geo Mean	XXX	10000	1/week	Grab
Fecal Coliform (No./100 ml) May 1 - Sep 30	XXX	XXX	XXX	200 Geo Mean	XXX	1000	1/week	Grab
E-Coli (No./100 ml)	XXX	XXX	XXX	XXX	XXX	Report	1/quarter	Grab
UV Transmittance (%)	XXX	XXX	Report	Report	XXX	XXX	1/day	Recorded
Total Nitrogen	XXX	XXX	XXX	XXX	Report Daily Max	XXX	1/year	Grab
Ammonia	Report	XXX	XXX	Report	XXX	XXX	1/week	8-Hr Composite

Outfall 001 , Continued (from Permit Effective Date through Permit Expiration Date )

Parameter	Effluent Limitations						Monitoring Requirements	
	Mass Units (lbs/day) <sup>(1)</sup>		Concentrations (mg/L)				Minimum <sup>(2)</sup> Measurement Frequency	Required Sample Type
	Average Monthly	Weekly Average	Instantaneous Minimum	Average Monthly	Weekly Average	Instant. Maximum		
Total Phosphorus	XXX	XXX	XXX	XXX	Report Daily Max	XXX	1/year	Grab
Total Aluminum	XXX	XXX	XXX	XXX	Report Daily Max	XXX	1/year	Grab
Total Iron	XXX	XXX	XXX	XXX	Report Daily Max	XXX	1/year	Grab
Total Manganese	XXX	XXX	XXX	XXX	Report Daily Max	XXX	1/year	Grab

Compliance Sampling Location: At outfall 001

Other Comments: None

Approve	Deny	Signatures	Date
√		Reza H. Chowdhury, E.I.T. / Project Manager 	April 25, 2024
X		<i>Pravin Patel</i> Pravin C. Patel, P.E. / Environmental Engineer Manager	05/14/2024