Pennsylvania Department of Environmental Protection

Northcentral Regional Office
CLEAN WATER PROGRAM

Application Type	**Renewal**	Application No.	**PA0209660**
Facility Type	**Municipal**	APS ID	**1112664**
Major / Minor	**Minor**	Authorization ID	**1482546**

NPDES PERMIT FACT SHEET INDIVIDUAL SEWAGE

Applicant and Facility Information

Applicant Name	**Cooper Township Municipal Authority**	Facility Name	**Winburne Sewer Tr Plant**
Applicant Address	PO Box 446	Facility Address	293 Terrace Street
	Winburne, PA 16879-0446		Winburne, PA 16879
Applicant Contact	Christopher Hitchings	Facility Contact	
Applicant Phone	(814) 345-5673	Facility Phone	
Client ID	66571	Site ID	487968
Ch 94 Load Status	Not Overloaded	Municipality	Cooper Township
Connection Status	No Limitations	County	Clearfield
Date Application Received	April 29, 2024	EPA Waived?	Yes
Date Application Accepted	May 13, 2025	If No, Reason	
Purpose of Application	Renewal of existing NPDES permit		

Summary of Review

The above applicant has submitted an NPDES renewal application for the existing Windburne Sewage Treatment Plant. The 0.277 MGD treatment plant serves 745 EDUs in the Cooper Township villages of Winburne, Lanse, Kylertown, Forest, and Morrisdale.

Sludge use and disposal description and location(s): Biosolids are typically land applied in accordance with beneficial reuse permit no. PAG084835. If land application is not feasible, sludge is hauled to the Muddy Run Regional Authority Wastewater Treatment Plant, NPDES Permit No. PA0228842.

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
X		*Chad A. Fabian* Chad A. Fabian / Project Manager	February 4, 2026
X		*Nicholas W. Hartranft, P.E.* Nicholas W. Hartranft, P.E. / Environmental Engineer Manager	February 5, 2026

Discharge, Receiving Waters and Water Supply Information

Outfall No.	001	Design Flow (MGD)	0.277
Latitude	40º 57' 33.06"	Longitude	-78º 8' 18.12"
Quad Name	Philipsburg	Quad Code	1120
Wastewater Description:	Sewage Effluent		
Receiving Waters	Moshannon Creek	Stream Code	25695
NHD Com ID	61830873	RMI	22.97
Drainage Area	179.74 sq. mi.	Yield (cfs/mi^2)	0.132
Q_{7-10} Flow (cfs)	20.1	Q_{7-10} Basis	Streamgage No. 01542000
Elevation (ft)	1380	Slope (ft/ft)	n/a
Watershed No.	8-D	Chapter 93 Class.	TSF
Existing Use	n/a	Existing Use Qualifier	n/a
Exceptions to Use	n/a	Exceptions to Criteria	n/a
Assessment Status	Impaired		
Cause(s) of Impairment	Metals		
Source(s) of Impairment	Abandoned Mine Drainage		
TMDL Status	Final, 6/9/2009	Name	Moshannon Creek Watershed
Nearest Downstream Public Water Supply Intake	PA American Water Company		
PWS Waters	West Branch Susquehanna River	Flow at Intake (cfs)	679.73
PWS RMI	10.6	Distance from Outfall (mi)	147.2

Changes Since Last Permit Issuance: None

TMDL

Moshannon Creek currently has an EPA-approved TMDL for metals associated with abandoned mine drainage; aluminum, iron, and manganese. To demonstrate whether or not the facility was contributing to the impairment, previous sampling for total aluminum, iron, and manganese was established in a previous permit cycle. The sampling showed concentration of the metals in the discharge are all below Chapter 93 criterion. Since the concentrations were below criteria, the discharge does not demonstrate reasonable potential to contribute to an impairment. Therefore, no sampling requirements for total aluminum, iron, and manganese TMDL parameters are proposed.

Treatment Facility Summary

Treatment Facility Name: Cooper Township Municipal Authority Winburne WWTP

WQM Permit No.	Issuance Date
1799405	3/24/2000

Waste Type	Degree of Treatment	Process Type	Disinfection	Avg Annual Flow (MGD)
Sewage	Secondary	Extended Aeration	Gas Chlorine	0.185

Hydraulic Capacity (MGD)	Organic Capacity (lbs/day)	Load Status	Biosolids Treatment	Biosolids Use/Disposal
0.277	324	Not Overloaded	Aerobic Digestion	Land Application

Changes Since Last Permit Issuance: None

The treatment plant consists of the following: One (1) HyCor spiral screen,One (1) distribution box, two (2) Stahlermatic biotanks (hybrid fixed film/activated sludge process),two (2) secondary clarifiers, two (2) chlorine contact tanks (gas chlorine disinfection), one (1) aerobic sludge digester, one (1) aerated sludge holding tank. Disinfected effluent is discharged via Outfall 001 to Moshannon Creek.

Two treatment trains are available; however, typical plant operation only requires one train to be online.

Compliance History	
Summary of DMRs:	A review of the eDMR data for the past year shows 3 effluent violations. These effluent violations are shown in the compliance history table on page 5 of this fact sheet
Summary of Inspections:	The most recent inspection was performed by the Department on December 5th, 2025. The inspection noted the effluent violations shown on page 5 of this fact sheet. No other violations were noted.

Compliance History

DMR Data for Outfall 001 (from January 1, 2025 to December 31, 2025)

Parameter	DEC-25	NOV-25	OCT-25	SEP-25	AUG-25	JUL-25	JUN-25	MAY-25	APR-25	MAR-25	FEB-25	JAN-25
Flow (MGD) Average Monthly	0.06	0.051	0.048	0.05	0.049	0.052	0.063	0.067	0.06	0.063	0.07	0.058
Flow (MGD) Daily Maximum	0.09	0.062	0.057	0.058	0.057	0.068	0.1	0.094	0.074	0.091	0.143	0.07
pH (S.U.) Instantaneous Minimum	6.36	6.2	6.59	6.62	6.77	6.74	6.84	6.95	7.03	6.95	6.98	6.91
pH (S.U.) Instantaneous Maximum	7.17	7.17	7.2	7.29	7.27	7.72	7.32	7.44	7.5	7.55	7.48	7.54
DO (mg/L) Instantaneous Minimum	0.2	0.5	0.2	0.48	0.1	0.5	0.6	0.1	1.1	2.71	1.47	1.5
TRC (mg/L) Average Monthly	0.39	0.37	0.49	0.37	0.37	0.31	0.37	0.29	0.32	0.39	0.38	0.39
TRC (mg/L) Instantaneous Maximum	0.59	0.62	0.93	0.7	0.64	0.64	0.85	0.66	0.74	0.66	0.67	0.71
CBOD5 (lbs/day) Average Monthly	3	2	2	2	2	5	7	8	11	11	15	7
CBOD5 (mg/L) Average Monthly	6.0	5.0	6.0	6.0	6.0	11.0	15.0	14.0	23.0	23.0	27.0	15.0
BOD5 (lbs/day) Raw Sewage Influent Average Monthly	163	108	77	114	112	109	135	144	153	128	138	124
TSS (lbs/day) Average Monthly	4	< 2	3	3	3	< 2	8	7	9	8	8	5
TSS (lbs/day) Raw Sewage Influent Average Monthly	97	73	54	71	100	107	136	129	134	66	126	100
TSS (mg/L) Average Monthly	7.0	< 4.0	< 7.0	6.0	7.0	6.0	16.0	12.0	18.0	16.0	15.0	11.0
TSS (mg/L) Raw Sewage Influent Average Monthly	194	193	147	168	254	243	285	209	264	129	246	212

Fecal Coliform (No./100 ml) Geometric Mean	< 1	< 1	< 1	< 1	< 4	< 9	10.0	49	32	< 13	74	< 5
Fecal Coliform (No./100 ml) Instantaneous Maximum	3	2	1	3.0	214	411	> 2419.6	345	109.8	58.3	431	< 5
Ammonia (mg/L) Average Monthly	26.5	16.1	22.2	42.2	40.5	35.94	34.7	25.4	24.4	23.0	28.402	15.0

Compliance History

Effluent Violations for Outfall 001, from: February 1, 2025 To: December 31, 2025

Parameter	Date	SBC	DMR Value	Units	Limit Value	Units
CBOD5	02/28/25	Avg Mo	27.0	mg/L	25.0	mg/L
CBOD5	03/31/25	Wkly Avg	45.0	mg/L	40.0	mg/L
Fecal Coliform	06/30/25	IMAX	> 2419.6	No./100 ml	1000	No./100 ml

Development of Effluent Limitations

Outfall No. 001 **Design Flow (MGD)** .277
Latitude 40º 57' 33.80" **Longitude** -78º 8' 18.90"
Wastewater Description: Sewage Effluent

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
$CBOD_5$	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)

Comments: A previous run of the Department's TRC model showed that the technology standard is protective or water quality standards.

Water Quality-Based Limitations

A previous "Reasonable Potential Analysis" (attached) determined the existing technology-based effluent limits and monitoring requirements for CBOD5, TSS, dissolved oxygen, and ammonia-n are protective of Moshannon Creek. Per the Department's SOP for reissuance of NPDES permit, since there is no change to the flow, discharge characteristics, or the receiving stream, a new model run is not required. The previous model is attached as a pdf at the end of this fact sheet.

Best Professional Judgment (BPJ) Limitations

To continue to characterize the wastewater and ensure proper plant operation, DEP has proposed to continue monitoring requirements for dissolved oxygen and ammonia-n.

Anti-Backsliding

In accordance with 40 CFR 122.44(l)(1) and (2), this permit does not contain effluent limitations, standards, or conditions that are less stringent than the previous permit.

Additional Considerations

Influent monitoring for BOD5 and TSS are proposed to remain in the permit to help with Chapter 94 reporting requirements.

Chesapeake Bay

Since the permittee has completed five years of sampling, in accordance with requirements for Phase V facilities in Phase 2 of Pennsylvania's Chesapeake Bay Watershed Implementation Plan, reporting for total nitrogen and phosphorus has been removed from the permit.

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) (1)		Concentrations (mg/L)				Minimum (2) Measurement Frequency	Required Sample Type
	Average Monthly	Weekly Average	Minimum	Average Monthly	Weekly Average	Instant. Maximum		
Flow (MGD)	Report	Report Daily Max	XXX	XXX	XXX	XXX	Continuous	Metered
pH (S.U.)	XXX	XXX	6.0 Inst Min	XXX	XXX	9.0	1/day	Grab
DO	XXX	XXX	Report Inst Min	XXX	XXX	XXX	1/day	Grab
TRC	XXX	XXX	XXX	0.5	XXX	1.6	1/day	Grab
CBOD5	38	60	XXX	25.0	40.0	50	1/week	24-Hr Composite
BOD5 Raw Sewage Influent	Report	Report Daily Max	XXX	Report	XXX	XXX	2/month	24-Hr Composite
TSS Raw Sewage Influent	Report	Report Daily Max	XXX	Report	XXX	XXX	2/month	24-Hr Composite
TSS	46	65	XXX	30.0	45.0	60	1/week	24-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
Ammonia	Report	XXX	XXX	Report	XXX	XXX	1/week	24-Hr Composite

Compliance Sampling Location: 001

The Department recommends drafting the NPDES permit as described herein.

WQM Modeling.pdf