

Application Type New
Wastewater Type Sewage
Facility Type SRSTP

**NPDES PERMIT FACT SHEET
INDIVIDUAL SFTF/SRSTP**

Application No. PA0284980
APS ID 1068240
Authorization ID 1404547

Applicant, Facility and Project Information

Applicant Name	<u>Brett Toth</u>	Facility Name	<u>Toth Properties SRSTP</u>
Applicant Address	<u>66 Station Street</u> <u>Bulger, PA 15019-2017</u>	Facility Address	<u>66 Station Street</u> <u>Bulger, PA 15019-2017</u>
Applicant Contact	<u>Brett Toth</u>	Facility Contact	<u>Same as Applicant</u>
Applicant Phone	<u>(412) 526-2181</u>	Facility Phone	<u>Same as Applicant</u>
Client ID	<u>371430</u>	Site ID	<u>858856</u>
SIC Code	<u>8800</u>	Municipality	<u>Smith Township</u>
SIC Description	<u>Private Households</u>	County	<u>Washington</u>
Date Application Received	<u>July 27, 2022</u>	WQM Required	<u>Yes</u>
Date Application Accepted	<u>August 3, 2022</u>	WQM App. No.	<u>6322404</u>
Project Description	<u>Application of a new NPDES Permit for discharge of treated sewage.</u>		

Summary of Review

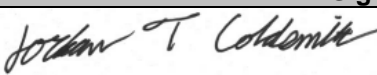

The applicant has proposed to construct a 0.0005 MGD Single Residence Sewage Treatment Plant (SRSTP).

The Discharge is to UNT 33883 to Raccoon Creek, which is classified as Warm-Water Fishes (WWF), located in watershed 20-D

Act 537 was approved for this project on March 30, 2022.

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		 Jordan Coldsmith / Environmental Engineering Specialist	August 16, 2022
x		 Mahbuba Iasmin, Ph.D., P.E. / Environmental Engineering Manager	September 9, 2022

Discharge and Stream Data – 2 - Receiving Waters and PWS

Discharge, Receiving Waters and Water Supply Information			
Outfall No.	<u>001</u>	Design Flow (MGD)	<u>0.0005</u>
Latitude	<u>40° 22' 59.17"</u>	Longitude	<u>-80° 21' 39.58"</u>
Quad Name	<u>Clinton</u>	Quad Code	<u>40080D3</u>
Wastewater Description: <u>Sewage Effluent</u>			
Receiving Waters	<u>Unnamed Tributary to Raccoon Creek (WWF)</u>	Stream Code	<u>33883</u>
NHD Com ID	<u>99689814</u>	RMI	<u>0.2500</u>
Drainage Area	<u>0.32</u>	Yield (cfs/mi ²)	<u>0.006125</u>
Q ₇₋₁₀ Flow (cfs)	<u>0.00196</u>	Q ₇₋₁₀ Basis	<u>USGS StreamStat</u>
Elevation (ft)	<u>1143</u>	Slope (ft/ft)	<u></u>
Watershed No.	<u>20-D</u>	Chapter 93 Class.	<u>WWF</u>
Existing Use	<u></u>	Existing Use Qualifier	<u></u>
Exceptions to Use	<u></u>	Exceptions to Criteria	<u></u>
Assessment Status	<u>Impaired</u>		
Cause(s) of Impairment	<u>SILTATION</u>		
Source(s) of Impairment	<u>SOURCE UNKNOWN</u>		
TMDL Status	<u>Final</u>	Name	<u>Raccoon Creek Watershed</u>
Background/Ambient Data		Data Source	
pH (SU)	<u></u>		<u></u>
Temperature (°F)	<u></u>		<u></u>
Hardness (mg/L)	<u></u>		<u></u>
Other:	<u></u>		<u></u>
Nearest Downstream Public Water Supply Intake	<u>MIDLAND BORO MUNI AUTH</u>		
PWS Waters	<u>Ohio River (WWF)</u>	Flow at Intake (cfs)	<u></u>
PWS RMI	<u></u>	Distance from Outfall (mi)	<u>45.6</u>

Changes Since Last Permit Issuance: N/A, New Issuance

Other Comments: N/A

Treatment Facility Summary				
Treatment Facility Name: Toth Properties SRSTP				
WQM Permit No.		Issuance Date		
6322404		Under Department Review		
Waste Type	Degree of Treatment	Process Type	Disinfection	Avg Annual Flow (MGD)
Sewage	Tertiary	Aerobic	UV	0.0005
Hydraulic Capacity (MGD)				
0.0005	Organic Capacity (lbs/day)	Load Status	Biosolids Treatment	Biosolids Use/Disposal
		Not Overloaded		Other WWTP

Changes Since Last Permit Issuance: N/A. New Permit Issuance

Other Comments: WQM permit No. 6322404 currently under department review; approves construction of a STP with a rated annual average design flow of 0.0005 MGD. The treatment process consists of:

- Premier Tech EC7 500-P-P Pack Coco Filter containing the septic tank capacity and DiUV disinfection unit

Act 537 was approved for this project on March 30, 2022.

Development of Effluent Limitations

Outfall No. <u>001</u>	Design Flow (MGD) <u>.05</u>
Latitude <u>40° 22' 59.16"</u>	Longitude <u>-80° 21' 37.45"</u>
Wastewater Description: <u>Sewage Effluent</u>	

Technology-Based Limitations

The following effluent limitations and monitoring requirements, at a minimum, will be established in all new and renewed SFTF permits based on the requirements of DEP's "Standard Operating Procedure (SOP) for Clean Water Program New and Reissuance Small Flow Treatment Facility Individual NPDES Permit Application" (SOP No. BCW-PMT-003, Version 1.8, Final, November 9, 2012, Revised May 17, 2019).

Parameter	Avg	IMAX	Sample Type	Frequency: SFTFs	Frequency: SRSTPs
Flow (GPD)	Report	XXX	Estimate (SRSTPs) Measured (SFTFs)	1/month	1/year
BOD5 (mg/L)	10	20	Grab	1/month	1/year
TSS (mg/L)	10	20	Grab	1/month	1/year
pH*	6.0 S.U. Inst. Min.	9.0 S.U.	Grab	1/month	1/year
TRC (mg/L)	Report for SRSTPs; Use TRC Spreadsheet to determine WQBELs or 0.02 mg/L for SFTFs		Grab	1/month	1/year
Fecal Coliform (No./100 ml)	200 Geometric Mean (SFTFs) / Average (SRSTPs)		Grab	1/month	1/year

* Technology-Based effluent limits for pH will be imposed based upon Federal Regulation 133.102(c) and State Regulation 95.2(1).

TMDL

This facility discharges to the Raccoon Creek Watershed. The Watershed has a TMDLs that was finalized on February 3, 2005. The watershed is impaired by metals and pH. Abandoned mine drainage is a source of such impairment. The sewage discharge from the Toth SRSTP is not expected to contribute to the stream impairment. No WLAs have been developed for this sewage discharge, and they are not expected to contribute to the stream impairment for these pollutants. No monitoring requirements for Total Iron, Total Manganese and Total Aluminum will be imposed on this facility.

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" (362-0400-001), 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	Average Weekly	Minimum	Annual Average	Maximum	Instant. Maximum		
Flow (GPD)	Report Annl Avg	XXX	XXX	XXX	XXX	XXX	1/year	Estimate
pH (S.U.)	XXX	XXX	6.0 Inst Min	XXX	XXX	9.0	1/year	Grab
BOD5	XXX	XXX	XXX	10.0	XXX	20.0	1/year	Grab
TSS	XXX	XXX	XXX	10.0	XXX	20.0	1/year	Grab
Fecal Coliform (No./100 ml)	XXX	XXX	XXX	200.0	XXX	XXX	1/year	Grab

Compliance Sampling Location: Outfall 001

Other Comments: Ultraviolet (UV) disinfection is used, and therefore, Total Residual Chlorine (TRC) limits are not applicable. Current policy does not require SRSTPs to monitor for UV Intensity.

SRSTPs are not required to monitor for Total Nitrogen and Total Phosphorus in new and reissued permits.

The receiving stream is not impaired for nutrients.

StreamStats Report

Region ID: PA

Workspace ID: PA20220818184631937000

Clicked Point (Latitude, Longitude): 40.38312, -80.36102

Time: 2022-08-18 14:46:52 -0400



 Collapse All

> Basin Characteristics

Parameter Code	Parameter Description	Value	Unit
DRNAREA	Area that drains to a point on a stream	0.32	square miles
ELEV	Mean Basin Elevation	1143	feet

> Low-Flow Statistics

Low-Flow Statistics Parameters [Low Flow Region 4]

Parameter Code	Parameter Name	Value	Units	Min Limit	Max Limit
DRNAREA	Drainage Area	0.32	square miles	2.26	1400
ELEV	Mean Basin Elevation	1143	feet	1050	2580

Low-Flow Statistics Disclaimers [Low Flow Region 4]

One or more of the parameters is outside the suggested range. Estimates were extrapolated with unknown errors.

Low-Flow Statistics Flow Report [Low Flow Region 4]

Statistic	Value	Unit
7 Day 2 Year Low Flow	0.00736	ft ³ /s
30 Day 2 Year Low Flow	0.0149	ft ³ /s
7 Day 10 Year Low Flow	0.00196	ft ³ /s
30 Day 10 Year Low Flow	0.00455	ft ³ /s
90 Day 10 Year Low Flow	0.00974	ft ³ /s

Low-Flow Statistics Citations

Stuckey, M.H., 2006, Low-flow, base-flow, and mean-flow regression equations for Pennsylvania streams: U.S. Geological Survey Scientific Investigations Report 2006-5130, 84 p. (<http://pubs.usgs.gov/sir/2006/5130/>)