

Application Type Renewal
Wastewater Type Sewage
Facility Type SRSTP

NPDES PERMIT FACT SHEET INDIVIDUAL SFTF/SRSTP

Application No. PA0246590
APS ID 808359
Authorization ID 1481472

Applicant, Facility and Project Information

Applicant Name	<u>Dennis A McClure & Janice E McClure</u>	Facility Name	<u>McClure Residence</u>
Applicant Address	<u>3469 McAlevys Fort Road</u> <u>Petersburg, PA 16669-2802</u>	Facility Address	<u>3469 McAlevys Fort Road</u> <u>Petersburg, PA 16669-2802</u>
Applicant Contact	<u>Dennis McClure</u>	Facility Contact	<u>Janice McClure</u>
Applicant Phone	<u>(814) 667-2388</u>	Facility Phone	<u>(814) 571-8661</u>
Client ID	<u>303405</u>	Site ID	<u>462596</u>
SIC Code	<u>8811</u>	Municipality	<u>Jackson Township</u>
SIC Description	<u>Services - Private Households</u>	County	<u>Huntingdon</u>
Date Application Received	<u>April 19, 2024</u>	WQM Required	<u></u>
Date Application Accepted	<u>April 19, 2024</u>	WQM App. No.	<u></u>
Project Description	<u>NPDES permit Renewal.</u>		

Summary of Review

An application was submitted on April 19, 2024 for reissuance of an NPDES permit to discharge treated sewage from the single-family residence sewage treatment plant located in Jackson Township, Huntingdon County. The permit was last reissued on October 30, 2019 and became effective on November 1, 2019. The permit expires on October 31, 2024.

The facility has a design capacity of 400 gpd, and discharges to an UNT to Laurel Run, which is classified for HQ-Cold Water and Migratory fishes.

Changes from the previous permit: BOD₅ limits changed to CBOD₅ limits.

Based on the review outline in this fact sheet, it is recommended that the permit be drafted and published in the Pennsylvania Bulletin for public comments for 30 days.

Approve	Deny	Signatures	Date
X		<i>Hilaryle</i> Hilary H. Le / Environmental Engineering Specialist	June 14, 2024
X		<i>Maria D. Bebenek for</i> Daniel W. Martin, P.E. / Environmental Engineer Manager	June 25, 2024

Discharge, Receiving Waters and Water Supply Information			
Outfall No.	001	Design Flow (MGD)	0.0004
Latitude	40° 40' 45.09"	Longitude	-77° 52' 41.43"
Quad Name	Pine Grove Mills	Quad Code	
Wastewater Description: Sewage Effluent			
Receiving Waters	Unnamed Tributary of Laurel Run (HQ-CWF, MF)	Stream Code	15463
NHD Com ID	65603582	RMI	0.1100
Drainage Area	0.22 mi. ²	Yield (cfs/mi ²)	0.0032
Q ₇₋₁₀ Flow (cfs)	0.0005	Q ₇₋₁₀ Basis	USGS StreamStats
Elevation (ft)	969.2	Slope (ft/ft)	
Watershed No.	11-B	Chapter 93 Class.	HQ-CWF, MF
Existing Use		Existing Use Qualifier	
Exceptions to Use		Exceptions to Criteria	
Assessment Status	Attaining Use(s)		
Cause(s) of Impairment			
Source(s) of Impairment			
TMDL Status	Name		
Nearest Downstream Public Water Supply Intake	Mifflintown Borough MA Juniata County		
PWS Waters	Juniata River	Flow at Intake (cfs)	
PWS RMI	37.3 miles	Distance from Outfall (mi)	Approximate 82.89 miles

Changes Since Last Permit Issuance: none

Drainage Area:

The discharge is to the headwater of Unnamed Tributary 15463 to Laurel Run at RMI 0.11 mile. A drainage area of the point of discharge is estimated to be 0.22 sq. miles according to USGS StreamStats available at <https://streamstats.usgs.gov/ss/>.

Streamflow:

USGS StreamStats produces a Q₇₋₁₀ 0.000545 cfs at the point of discharge.

Unnamed Tributary 15463 to Laurel Run:

This stream is classified as a High Quality-Cold Water and migratory fishery. The effluent limits for this discharge have been developed to ensure the existing in-stream water uses and the level of water quality necessary to protect existing uses are maintained and protected. No special protection water(s) is therefore impacted by this discharge. DEP's latest integrated report prepared in 2024 showed Laurel Run is not impaired and the discharge is located in a stream segment listed as attaining uses.

Public Water Supply Intake:

The fact sheet prepared for the renewal permit indicated that the nearest downstream public water supply intake is Mifflintown Borough Municipal Authority Juniata County located on Juniata River, approximately 82.89 miles from the discharge. Based on the nature of discharge and the distance from the public water supply, the discharge is not expected to affect downstream public water supply.

303d Listed Streams:

The discharge is not located on a 303d listed stream segment.

Compliance History						
Summary of DMRs:	Annual Maintenance Reports have been submitted annual and effluent sample results are as follows:					
	Year	TRC (mg/L)	pH (S.U.)	BOD ₅ (mg/L)	Fecal (No./100 mL)	TSS (mg/L)
	June 2022 - May 2023	0.4	7.1	< 3.0	< 1.0	5.6
	June 2021 – May 2022	0.4	7.3	< 20.0	1.0	8.4
Summary of Inspections:	9/30/2020: Mr. Clark, WQS DEP, conducted an administrative inspection. There was no violation. Recommendations are to have the treatment system inspected and determine the cause of the high total suspended solids (TSS) test result and submit a 2020-2021 Annual Maintenance Report to the Department by June 30, 2021.					
Other Comments:	There are currently no open violations associated with the permittee or the facility.					

Other Comments:

Treatment Facility Summary

The treatment system serving single residence 3-bedrooms capacity 400 GPD consists of a 1,000-gallon septic tank, 500-gallon dosing tank/pump, 600 square feet lined subsurface sand filter, tablet chlorinator with a 500-gallon chlorine contact tank, and an outfall. The original WQM permit No. 3197402 was issued on August 12, 1997.

Development of Effluent Limitations and Monitoring Requirements

Unless stated otherwise below, the proposed effluent limitations and monitoring requirements listed on page 6 of the Fact sheet are derived from DEP's Standard Operating Procedure (SOP) for New and Reissuance Small Flow Treatment Facility Individual NPDES Permit Applications (SOP No. BPNPSM-PMT-003) revised November 9, 2023.

The reviewer notes that the existing BOD₅ and TSS monitoring frequencies and limits are inconsistent with the monitoring frequencies and limits recommended in DEP SOP No. BPNPSM-PMT-003 for SRSTPs. Based on the best professional judgement of the author, the existing monitoring frequencies are sufficient and necessary. Therefore, the existing monitoring frequencies will remain the same as those specified in the existing permit. However, it is recommended that existing limits be carried over in this renewal and BOD₅ limits be replaced by CBOD₅ to comply with the recent SOP.

Fecal Coliform

Per SOP, a year-round average monthly limit for fecal coliform geometric mean to be 200/100 ml for all new or renewal. The existing permit has seasonal limit which is recommended year-round limit.

Chesapeake Bay Requirements

No nutrient monitoring requirement is recommended for this facility. Facilities that are designed based on a flow of less than or equal to 2,000 GPD or considered as SRSTPs are exempt from the Bay requirements.

Total Maximum Daily Load (TMDL)

The discharge is located in a stream segment listed as attaining uses; therefore, no TMDL has been taken into consideration during this review.

Antidegradation Requirements

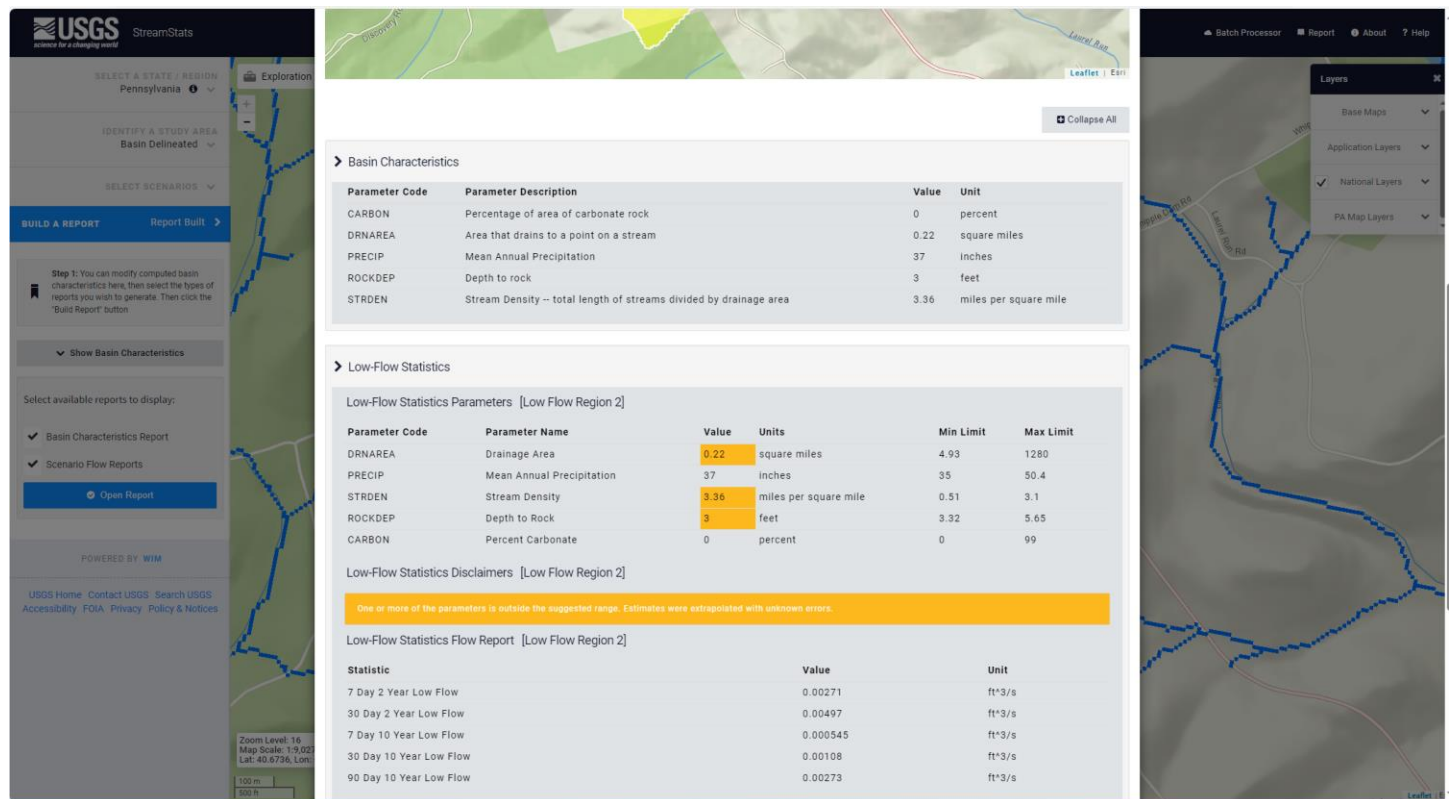
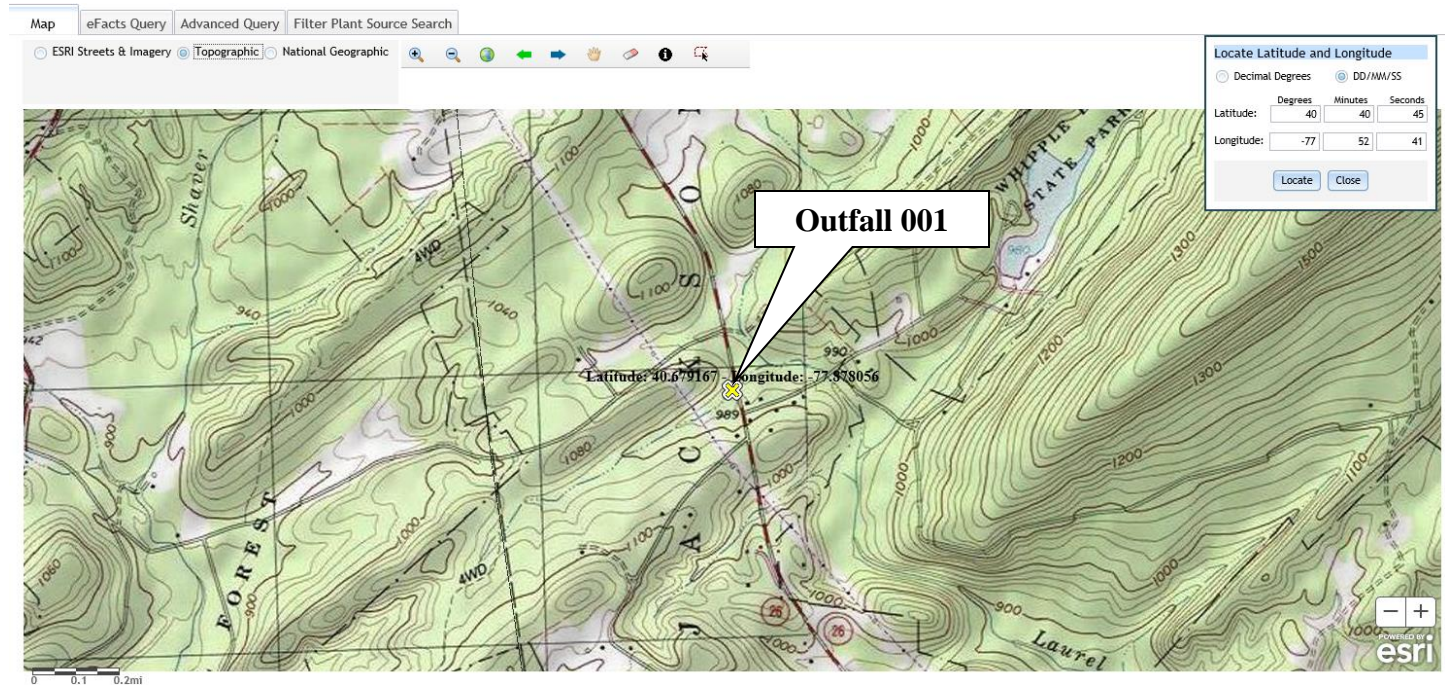
All effluent limitations and monitoring requirements have been developed to ensure that existing instream water uses and the level of water quality necessary to protect the existing uses are maintained and protected.

Other Considerations

No Class A Wild Trout Fishery is impacted by this discharge. Considering dilution and distance from the intake, the discharge is not expected to affect the water supply.

NPDES Permit Fact Sheet McClure Res

NPDES Permit No. PA0246590



Existing Effluent Limitations and Monitoring Requirements

Outfall 001,

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
TRC	XXX	XXX	XXX	Report	XXX	XXX	1/quarter	Grab
BOD ₅	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	XXX	1,000	1/year	Grab

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
TRC	XXX	XXX	XXX	Report	XXX	XXX	1/quarter	Grab
CBOD5	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	XXX	1000	1/year	Grab

Compliance Sampling Location:

Other Comments: