

Northcentral Regional Office CLEAN WATER PROGRAM

Application Type

Wastewater Type

Facility Type

New

Sewage

SRSTP

NPDES PERMIT FACT SHEET INDIVIDUAL SFTF/SRSTP

 Application No.
 PA0233331

 APS ID
 1079783

 Authorization ID
 1424941

Applicant Name	Heaton Brian	Facility Name	Brian Heaton SFSTF	
Applicant Address	700 Steele Hollow Road	Facility Address	700 Steele Hollow Road	
	Julian, PA 16844-8308	<u>-</u>	Julian, PA 16844-8308	
Applicant Contact	Brian Heaton	Facility Contact	Brian Heaton	
Applicant Phone	(814) 692-4318	Facility Phone	(814) 692-4318	
Client ID	134699	Site ID	521466	
SIC Code	4952	Municipality	Huston Township	
SIC Description	Trans. & Utilities - Sewerage Systems	County	Centre	
Date Application Received January 9, 2023		WQM Required	Yes	
Date Application Accepted February 6, 2023		WQM App. No.	1423401	

Summary of Review

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.

This application is for a new individual NPDES permit for the discharge of treated sewage from a 3-bedroom single residence. This will be replacing an existing NPDES Permit PAG044889, which will be terminated. The annual average design flow for this facility is 400 GPD and the proposed treatment system has a design hydraulic capacity of 400 GPD due to the limitations of the disinfection system. An individual Single Residence permit is required due to the use of an alternative design that is not covered in the *Small Flow Treatment Facilities Design Manual* (Document 362-0300-002.) This system is not listed in the *Alternate System Guidance* (Document 362-0300-007), it is approved under the Onlot Alternate Technology Listings. This system is listed as a Premier Tech Aqua Ecoflo Coco Biofilter (Ecoflo EC7 Series) and classified under Alternate technology (A2017-0029-0001).

Planning approval was previously conducted for the previous PAG-04 permit. No further approval is required for the modifications.

Approve	Deny	Signatures	Date
X		Jonathan P. Peterman	
^		Jonathan P. Peterman / Project Manager	March 20, 2023
X		Nicholas W. Hartranft	
Λ		Nicholas W. Hartranft, P.E. / Environmental Engineer Manager	March 30, 2023

Discharge, Receiving Waters and Water Supply Information				
Outfall No. 001		Design Flow (MGD)	0.0004	
Latitude 40° 51' 10.	.00"	Longitude	-78° 0' 45.00"	
Quad Name Port Ma	tilda	Quad Code	1221	
Wastewater Description:	Sewage Effluent			
			_	
Receiving Waters Ste	el Hollow (CWF)	Stream Code	23194	
NHD Com ID 671	79954	RMI	1.4	
Drainage Area N/A		Yield (cfs/mi²)	_N/A	
Q ₇₋₁₀ Flow (cfs) N/A	•	Q ₇₋₁₀ Basis	N/A	
Elevation (ft) N/A		Slope (ft/ft)	N/A	
Watershed No.		Chapter 93 Class.		
Existing Use		Existing Use Qualifier		
Exceptions to Use		Exceptions to Criteria		
Assessment Status	Attaining Use(s)			
Cause(s) of Impairment	N/A			
Source(s) of Impairment	N/A			
TMDL Status	N/A	Name N/A		

Changes Since Last Permit Issuance: N/A Other Comments: None

Treatment Facility Summary				
Treatment Facility Name: Brian Heaton SRSTP				
	Degree of			Design Flow
Waste Type	Treatment	Process Type	Disinfection	(MGD)
Sewage	Tertiary	ECOFLO Coco Filter	Hypochlorite	0.0004
Hydraulic Capacity	Organic Capacity			Biosolids
(MGD)	(lbs/day)	Load Status	Biosolids Treatment	Use/Disposal
0.0004		Not Overloaded	None.	Other WWTP.

Treatment System Components for Outfall 001: - One (1) 1,000-gallon septic tank. - One (1) Effluent filter.

- One (1) Ecoflo EC7-600 Coco filter.
- Two (2) Inline erosion chlorinators.
- One (1) 200-gallon chlorine contact tank.
- One (1) Outfall.

Changes Since Last Permit Issuance: N/A.

Other Comments: None.

Chesapeake Bay Requirements

Facilities that are designed based on a flow of less than 2,000 GPD (400 GPD design flow for this facility) are not a part of Pennsylvania's Chesapeake Bay Tributary Strategy. Accordingly, it is not practicable to require the permittee to perform nutrient monitoring.

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 the abovementioned 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) and/or BPJ.

Proposed Limits - Outfall 001, Effective Period: Permit Effective Date through Permit Expiration Date

	Limitations							
	Mass (lb/day)		Concentration (mg/L)			Monitoring		
Discharge Parameter	Monthly Average	Daily Maximum	Minimum	Average Monthly	Average Weekly	Instantaneous Maximum	Minimum Frequency	Sample Type
Flow (MGD)	Report						1/ Year	Estimate
BOD ₅				10		20	1/ Year	Grab
TSS				10		20	1/ Year	Grab
TRC				Report		Report	1/Month	Grab
Fecal Coliforms		200	No./100 ml a	as a geome	tric mean		1/ Year	Grab

^{*}The proposed effluent limits for Outfall 001 were based on a design flow of 0.0004 MGD.

Development of Effluent Limitations and Monitoring Frequencies

BOD₅ (10 mg/L) and TSS (10mg/L) are technology-based limits stipulated in the *Technical Guidance for the Development and Specification of Effluent Limitations* (362-0400-001). The fecal coliform limits correspond with 25 PA Code § 92a.47 (a)(4). pH monitoring is not required for SRSTPs. SRSTP's are required to conduct monthly monitoring for TRC.

All of the monitoring frequencies sample types correspond with the policies and procedures stipulated in the SOP in lieu of the *Technical Guidance for the Development and Specification of Effluent Limitations* (362-0400-001).

Compliance History

<u>WMS Query Summary</u> - A WMS Query was run at *Reports - Violations & Enforcements – Open Violations for Client Report* to determine whether there are any unresolved violations associated with the client that will affect issuance of the permit (per CSL Section 609). This query revealed that there were no unresolved violations.

Tools and References Used to Develop Permit				
	WQM for Windows Model (see Attachment)			
<u> </u>	PENTOXSD for Windows Model (see Attachment)			
<u> </u>	TRC Model Spreadsheet (see Attachment)			
	Temperature Model Spreadsheet (see Attachment)			
	Toxics Screening Analysis Spreadsheet (see Attachment)			
	Water Quality Toxics Management Strategy, 361-0100-003, 4/06.			
\boxtimes	Technical Guidance for the Development and Specification of Effluent Limitations, 362-0400-001, 10/97.			
	Policy for Permitting Surface Water Diversions, 362-2000-003, 3/98.			
	Policy for Conducting Technical Reviews of Minor NPDES Renewal Applications, 362-2000-008, 11/96.			
	Technology-Based Control Requirements for Water Treatment Plant Wastes, 362-2183-003, 10/97.			
	Technical Guidance for Development of NPDES Permit Requirements Steam Electric Industry, 362-2183-004, 12/97.			
一百	Pennsylvania CSO Policy, 385-2000-011, 9/08.			
	Water Quality Antidegradation Implementation Guidance, 391-0300-002, 11/03.			
	Implementation Guidance Evaluation & Process Thermal Discharge (316(a)) Federal Water Pollution Act, 391-2000-002, 4/97.			
\boxtimes	Determining Water Quality-Based Effluent Limits, 391-2000-003, 12/97.			
	Implementation Guidance Design Conditions, 391-2000-006, 9/97.			
	Technical Reference Guide (TRG) WQM 7.0 for Windows, Wasteload Allocation Program for Dissolved Oxygen and			
	Ammonia Nitrogen, Version 1.0, 391-2000-007, 6/2004.			
	Interim Method for the Sampling and Analysis of Osmotic Pressure on Streams, Brines, and Industrial Discharges, 391-2000-008, 10/1997.			
	Implementation Guidance for Section 95.6 Management of Point Source Phosphorus Discharges to Lakes, Ponds,			
	and Impoundments, 391-2000-010, 3/99.			
	Technical Reference Guide (TRG) PENTOXSD for Windows, PA Single Discharge Wasteload Allocation Program for Toxics, Version 2.0, 391-2000-011, 5/2004.			
	Implementation Guidance for Section 93.7 Ammonia Criteria, 391-2000-013, 11/97.			
	Policy and Procedure for Evaluating Wastewater Discharges to Intermittent and Ephemeral Streams, Drainage Channels and Swales, and Storm Sewers, 391-2000-014, 4/2008.			
	Implementation Guidance Total Residual Chlorine (TRC) Regulation, 391-2000-015, 11/1994.			
	Implementation Guidance for Temperature Criteria, 391-2000-017, 4/09.			
	Implementation Guidance for Section 95.9 Phosphorus Discharges to Free Flowing Streams, 391-2000-018, 10/97.			
	Implementation Guidance for Application of Section 93.5(e) for Potable Water Supply Protection Total Dissolved Solids, Nitrite-Nitrate, Non-Priority Pollutant Phenolics and Fluorides, 391-2000-019, 10/97.			
	Field Data Collection and Evaluation Protocol for Determining Stream and Point Source Discharge Design Hardness, 391-2000-021, 3/99.			
	Implementation Guidance for the Determination and Use of Background/Ambient Water Quality in the Determination of Wasteload Allocations and NPDES Effluent Limitations for Toxic Substances, 391-2000-022, 3/1999.			
	Design Stream Flows, 391-2000-023, 9/98.			
	Field Data Collection and Evaluation Protocol for Deriving Daily and Hourly Discharge Coefficients of Variation (CV) and Other Discharge Characteristics, 391-2000-024, 10/98.			
	Evaluations of Phosphorus Discharges to Lakes, Ponds and Impoundments, 391-3200-013, 6/97.			
\boxtimes	Pennsylvania's Chesapeake Bay Tributary Strategy Implementation Plan for NPDES Permitting, 4/07.			
\boxtimes	SOP: New and Reissuance Small Flow Treatment Facility Individual NPDES Permit Applications			
$\overline{\boxtimes}$	Other: Small Flow Treatment Facilities Manual (362-0300-002)			