

# Northwest Regional Office CLEAN WATER PROGRAM

Application Type

Wastewater Type
Facility Type

Renewal

Sewage

SFTF

# NPDES PERMIT FACT SHEET INDIVIDUAL SFTF/SRSTP

Application No. PA0264334

APS ID 1036861

Authorization ID 1350706

Applicant Name	Denis Brooks	Facility Name	Denis Brooks SFTF
Applicant Address	3257 Soap Fat Road	Facility Address	3257 Soap Fat Road
	Shippenville, PA 16254-3029	<u></u>	Shippenville, PA 16254-3029
Applicant Contact	Denis Brooks	Facility Contact	
Applicant E Mail	denis@deercreekwine.com	Facility E Mail	
Applicant Phone	(724) 372-0564	Facility Phone	
Client ID	325413	Site ID	811371
Municipality	Elk Township	County	Clarion
SIC Code	7000	SIC Code	4952
SIC Description	Hotels And Other Lodging Places,	SIC Description	Trans. & Utilities - Sewerage Systems
Application Received	March 15, 2021	WQM Required	The Present facility is adequate.
Application Accepted	May 31, 2021	WQM App. No.	. <u>.</u>

#### **Summary of Review**

No WMS listed violations. The facility serves an eight-room bed and breakfast as part of the Deer Creek Winery, LLC.

The only filed AMR is dated June 2017 and states effluent analysis will be done in July. Start-up was late 2016 with first sludge removal on October 30, 2020. Chlorination bridging reported and corrected, The system was pumped this last summer which should abate the BOD5 and TSS levels.

#### **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
		William H. Mentzer	
		William H. Mentzer, P.E.	
		Environmental Engineering Specialist	October 17, 2022
X		vacant Environmental Engineer Manager	Okay to Draft JCD 10/24/2022

ischarge, Receiving	y Water	s and Water Supply Info	rmation			
Outfall No. 001			Design Flow (MGD)	0.00194		
Latitude DP	41º 18	3' 4.70"	Longitude DP	-79° 29' 12.14"		
Latitude NHD	41º 18	3' 4.43"	Longitude NHD	-79° 29' 11.78"		
Quad Name Fryburg			Quad Code	0810		
Wastewater Descrip	otion:	Treated domestic wastes	3			
Receiving WatersUnnan		med Tributary Judith Run	Stream Code	63347		
NHD Com ID	10266	69307	_ RMI	0.3800		
Drainage Area	0.94 (	598.8 acres)	Yield (cfs/mi <sup>2</sup> )	0.02806		
Q <sub>7-10</sub> Flow (cfs)	0.02638		Q <sub>7-10</sub> Basis	Sevenmile Run near Rasselas		
Elevation (ft)	1388.00		Slope (ft/ft)	0.015152 CWF		
Watershed No.	17-B		Chapter 93 Class.			
Existing Use	State	wide	Existing Use Qualifier	none		
Exceptions to Use	none		Exceptions to Criteria	none		
Comments		NHD precision limited la	titude and longitude			
Assessment Status		Impaired, this proposal s	should not impact the minin	g TMDL.		
Cause(s) of Impairn	nent	Metals, Siltation, pH				
Source(s) of Impairs	ment	Abandoned Mine Draina	ge			
TMDL Status		Final	Name Deer Creek (Clarion)			
Background/Ambier	nt Data		Data Source			
pH (SU)		7.0	model default			
Temperature (°F)			CWF			
Hardness (mg/L)		100	model default			
Other:			sed in the Deer Creek TMD	DL. Stream modeling is		
		independent of the TMD	L.			
		c Water Supply Intake	City of Parker			
PWS Waters		neny River	Flow at Intake (cfs)	NA		
PWS RMI 83.95		<u> </u>	Distance from Outfall (	mi) <u>36.91</u>		

Changes Since Last Permit Issuance: none

Other Comments: none

Treatment Facility Summary								
Treatment Facility Na	me: Denis Brooks SFTF							
WQM Permit No.	Issuance Date							
1615402								
	Degree of			Avg Annual				
Waste Type	Treatment	Process Type	Disinfection	Flow (MGD)				
Sewage	secondary	Coconut filter	chlorination	0.0004				
· ·								
Hydraulic Capacity	Organic Capacity			Biosolids				
(MGD)	(lbs/day)	Load Status	Biosolids Treatment	Use/Disposal				
0.0004	1.1	No overload	anaerobic	Off site				

Changes Since Last Permit Issuance: NA

Other Comments: Permitted is a septic tank with a coconut fiber filter. Review is based on the facility NSF listing.

		Jun	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May
May 2022	TRC	0.53	0.26	< 0.2	<0.2	<0.2	< 0.2	< 0.2	< 0.2	< 0.2	< 0.2	0.33	
	UV		NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	
	BOD5	12.4	28.4	10.4	15.0	23.0	80.4	46.8	190	166	58.6	140	
	рН	6.7	6.37	6.47	6.88	6.74	6.65	6.84	7.27	7.3	7.65	7.74	
	TSS	20.0	384	15.5	36.0	236	492	120	47	840	280	1260	
	Fecals	1	80.4	<1	29.5	>2449.6	>2419.6	>2449.6	12098	>2419.6	>2419.6	>4839.2	

#### **Development of Effluent Limitations**

Outfall No. 001 Design Flow (MGD) .00194

 Latitude
 41° 18' 4.70"
 Longitude
 -79° 29' 12.14"

Wastewater Description: Treated domestic wastes

#### **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)
CBOD5	40	Average Weekly	133.102(a)(4)(ii)	92a.47(a)(2)
	30	Average Monthly	133.102(b)(1)	92a.47(a)(1)
Total Suspended Solids	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: The secondary treatment requirements listed above are superseded by the small flow advance treatment requirements (10-mg/L for 5 Day CBOD and TSS).

#### **Water Quality-Based Limitations**

TRC and WQM 7.0 modelling do not recommend TRC, 5 day CBOD or ammonia water-quality based limitations.

The example small flow permit recommends twice a year analysis for 5 day CBOD, TSS, ammonia, and pH while the small flow guidance except for pH recommends monthly analysis. For small flow discharges not in special protection waters upon request pH monitoring is recommended.

The discharge is an addition to the Deer Creek TMDL which also includes:

The discharge is all addition to the Beel Ore	CK TIVIDE WITHOUT	also intolados.				
Facility	NPDES	Outfalls	Waste Flow	Stream	TMDL	₋ pH
Name	permit	MGD	Code		Min	Max
CLARION CNTY AIRPORT AUTH	PAR808370	001, 002 & 005	NA	49415	4.8	5.3
CLARION CNTY AIRPORT AUTH	PAR808370	006	NA	Trib to 49422	7.1	7.6
CLARION CNTY AIRPORT AUTH	PAR808370	004	NA	49423	no data	
PA AMER WATER PAINT-ELK WWTP	PA0034924	001	0.6	49424	3.4	4.5
CORNER WATER SUPPLY & SVC CORP	PA0104426	001	0.0014	49424	3.4	4.5
SHIPPENVILLE BORO STP	PA0103276	001	0.1	49407	3.3	6.3
DENIS BROOKS SFTF	PA0264334	001	0.00194	63347	3.8	4.2
TROY A WOLBERT SFTF	PAG048678	001	0.0004	49466	4.9	5.0
RICHARD A BAUMCRATZ SRSTP	PAG048665	001	0.0004	49466	4.9	5.0
EDGAR L & MARYLOU BELL SFTF	PAG049014	001	0.0004	49465	3.3	4.8
KAHLES KITCHENS INC	PAR228332	001	NA	49465	3.3	4.8
JENNIFER A & RONALD J GROOMS SFTF	PAG048759	001	0.0004	49456	4.5	6.4
FARMINGTON TWP STP CLARION	PA0223042	001	0.1	49465	3.3	4.8
CLARION BATHWARE INC	NNOEXNW05	001, 002 & 003	NA	63341	no data	

IW NPDES Permit PA0104426 has aluminum, iron, and manganese. Industrial Waste Storm water Permits PAR808370, PAR228332, and NNOEXW05; small flow sewage permits PAG048678, PAG048665, and PAG048759; and sewage permits PA0034924, PA0103276, and PA0223042 are not listed

### **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.

		Effluent Limitations					Monitoring Requirements	
Parameter	Mass Units	(lbs/day) <sup>(1)</sup>	lbs/day) <sup>(1)</sup> Concentrations (mg/L)			Minimum <sup>(2)</sup>	Required	
Farameter	Average Monthly	Average Weekly	Minimum	Average Monthly	Maximum	Instant. Maximum	Measurement Frequency	Sample Type
Flow (GPD)	Report	XXX	XXX	XXX	XXX	XXX	1/month	Measured
pH (S.U.)	XXX	XXX	6.0 Inst Min	XXX	XXX	9.0	1/month	Grab
TRC	XXX	XXX	XXX	0.5	XXX	1.6	1/month	Grab
BOD5	XXX	XXX	XXX	10.0	XXX	20.0	1/month	Grab
TSS	XXX	XXX	XXX	10.0	XXX	20.0	1/month	Grab
Fecal Coliform (No./100 ml)	XXX	XXX	XXX	200 Geo Mean	XXX	1000	1/month	Grab

Compliance Sampling Location: Outfall 001 after disinfection