

Application Type Renewal
 Facility Type Non-Municipal
 Major / Minor Minor

**NPDES PERMIT FACT SHEET
INDIVIDUAL SEWAGE**

Application No. PA0043966
 APS ID 1062686
 Authorization ID 1395163

Applicant and Facility Information

Applicant Name	<u>Valley Forge Group LP</u>	Facility Name	<u>Valley Forge Crossing MHP WWTP</u>
Applicant Address	<u>31200 Northwestern Highway</u> <u>Farmington Hills, MI 48334</u>	Facility Address	<u>1311 Catfish Lane</u> <u>Norristown, PA 19403</u>
Applicant Contact	<u>Joel Brown</u>	Facility Contact	<u>Steve Chernesky</u>
Applicant Phone	<u>(248) 626-0737</u>	Facility Phone	<u>(610) 389-3505</u>
Client ID	<u>207982</u>	Site ID	<u>240005</u>
Ch 94 Load Status	<u>Not Overloaded</u>	Municipality	<u>Lower Providence Township</u>
Connection Status		County	<u>Montgomery</u>
Date Application Received	<u>May 5, 2022</u>	EPA Waived?	<u>Yes</u>
Date Application Accepted		If No, Reason	
Purpose of Application	<u>Permit Renewal.</u>		

Summary of Review

The Project involves the renewal of NPDES permit to discharge 0.045 mgd of treated effluent from a sewage treatment plant that serves a mobile home park. Discharge is to an unnamed tributary to the Schuylkill River. The permitted design flow of the facility is 0.045 mgd. The effluent limits are unchanged from the previous permit, except that monitoring for E. Coli is included, per the SOP "Establishing Effluent Limitations for Individual Sewage Permits". There is no change in in effluent characteristics or receiving stream designation. The effluent limits for all the parameters will remain the same and are carried over from previous permit.

The sewage treatment plant consists of a bar screen, a grinder/communitor, two aeration tanks, two clarifiers, a chlorine contact tank and sludge holding tank. The treatment plant is extended aeration treatment plant with two parallel process trains which include two aeration tanks for biological treatment and two clarifiers for settling. Effluent from clarifiers then flows to chlorine contact tank for disinfection. Sodium Hypochlorite is used for disinfection and Sodium Sulfate tablets are used for dichlorination as needed. The treated effluent is then discharged into unnamed tributary to Schuylkill River. The sludge from treatment process is biologically treated and stored in the sludge holding tank and then sludge is pumped and hauled on a regular basis to another WWTP.

Sludge use and disposal description and location(s): Sewage sludge is sent to Hatfield Township Municipal Authority WWTP, Pottstown WWTP, Valley Forge Sewer Authority WWTP, and Towamencin Municipal Authority WWTP for treatment and disposal.

Act-14 Notification to Lower Providence Township on April 20, 2022.
 Act-14 Notification to Montgomery County Board of Commissioners on April 20, 2022.

Approve	Deny	Signatures	Date
X		<i>Ketan Thaker</i> Ketan Thaker / Project Manager	6/3/2022
X		<i>Pravin Patel</i> Pravin C. Patel, P.E. / Environmental Engineer Manager	06/03/2022

Summary of Review

Following are effluent limits:

PARAMETERS	EFFLUENT LIMIT (Av. Mo. in mg/l)	BASIS
CBOD5	25	Existing limit, Previous PR
Total Suspended Solids	30	92a.47
Ammonia-Nitrogen (5/1 to 10/31)	7	BPJ, Existing limit, Previous PR
Ammonia-Nitrogen (11/1 to 4/30)	20	BPJ, Existing limit, Previous PR
Dissolved Oxygen	5.0 minimum	BPJ, Existing limit
Fecal Coliform (#/100 ml)	200 Geo Mean	92a.47
Total Residual Chlorine	0.26	92a.47-48 Existing limit
pH (SU)	6.0 to 9.0 SU at all times	92a.47, 95.2
Total Phosphorus	Report	92a.61
Total Nitrogen	Report	92a.61
E. Coli (#/100 ml)	Report	92a.47

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.

Discharge, Receiving Waters and Water Supply Information

Outfall No.	<u>001</u>	Design Flow (MGD)	<u>0.045</u>
Latitude	<u>40° 6' 40.69"</u>	Longitude	<u>-75° 25' 40.25"</u>
Quad Name	<u>Valley Forge</u>	Quad Code	<u>1842</u>
Wastewater Description: <u>Sewage Effluent</u>			

Receiving Waters	<u>Unnamed Tributary to Schuylkill River (WWF)</u>	Stream Code	<u>00988</u>
NHD Com ID	<u>26003270</u>	RMI	<u>0.1</u>
Drainage Area	<u>1.0 mi2</u>	Yield (cfs/mi ²)	<u>0.12</u>
Q ₇₋₁₀ Flow (cfs)	<u>0.12</u>	Q ₇₋₁₀ Basis	<u>Previous WQPR</u>
Elevation (ft)	<u>75</u>	Slope (ft/ft)	<u>0.01</u>
Watershed No.	<u>3-F</u>	Chapter 93 Class.	<u>WWF</u>
Existing Use	<u>Same as Ch. 93</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>FLOW REGIME MODIFICATION, SILTATION</u>
Source(s) of Impairment	<u>HIGHWAY/ROAD/BRIDGE RUNOFF (NON-CONSTRUCTION RELATED), REMOVAL OF RIPARIAN VEGETATION, RURAL (RESIDENTIAL AREAS)</u>
TMDL Status	<u>Name</u>

Background/Ambient Data	Data Source
pH (SU)	<u></u>
Temperature (°F)	<u></u>
Hardness (mg/L)	<u></u>
Other:	<u></u>

Nearest Downstream Public Water Supply Intake	<u>PA American - Norristown</u>
PWS Waters	<u>Schuylkill River</u>
	Distance from Outfall (mi) <u>4.5</u>

Treatment Facility Summary				
Treatment Facility Name: Valley Forge Crossing MHP WWTP				
Waste Type	Degree of Treatment	Process Type	Disinfection	Avg Annual Flow (MGD)
Sewage	Secondary	Extended Aeration	Hypochlorite	0.045
Hydraulic Capacity (MGD)	Organic Capacity (lbs/day)	Load Status	Biosolids Treatment	Biosolids Use/Disposal
0.045		Not Overloaded		

Compliance History

DMR Data for Outfall 001 (from April 1, 2021 to March 31, 2022)

Parameter	MAR-22	FEB-22	JAN-22	DEC-21	NOV-21	OCT-21	SEP-21	AUG-21	JUL-21	JUN-21	MAY-21	APR-21
Flow (MGD) Average Monthly	0.0168	0.024	0.0214	0.0155	0.0146	0.0165	0.0199	0.0159	0.0138	0.0162	0.0162	0.01378
Flow (MGD) Daily Maximum	0.0329	0.0634	0.0725	0.0225	0.0195	0.0468	0.2248	0.0557	0.0273	0.0214	0.0422	0.0352
pH (S.U.) Instantaneous Minimum	7.09	7.15	7.44	7.56	7.32	7.29	7.3	7.11	7.24	7.38	7.23	7.05
pH (S.U.) Instantaneous Maximum	8.3	7.96	7.94	7.95	8.22	8.02	8.19	8.15	8.03	8.0	8.12	7.87
DO (mg/L) Instantaneous Minimum	5.9	7.49	7.39	7.44	6.95	5.41	6.8	5.53	5.25	5.9	6.15	6.36
TRC (mg/L) Average Monthly	0.06	< 0.07	< 0.04	0.11	< 0.03	< 0.05	< 0.10	< 0.03	< 0.06	< 0.03	< 0.03	< 0.04
TRC (mg/L) Instantaneous Maximum	0.19	0.41	0.41	0.97	0.28	0.64	0.78	0.20	0.29	0.08	0.06	0.19
CBOD5 (mg/L) Average Monthly	5	5	5	7	6	< 7	11	6	< 4	< 4	5	4
TSS (mg/L) Average Monthly	< 5	5	5	13	11	15	< 59	19	6	< 3	< 8	12
Fecal Coliform (No./100 ml) Geometric Mean	< 2	< 2	< 2	< 18	< 6	< 34	< 112	306	84	62	120	< 9
Fecal Coliform (No./100 ml) Instantaneous Maximum	< 2	< 2	< 2	10900	2500	709	3500	2100	410	320	791	62
Total Nitrogen (mg/L) Average Monthly	E	44.76	41.47	57.94	50.33	47.56	58.38	60	58.65	43.99	46.6	67.16
Ammonia (mg/L) Average Monthly	< 0.03	< 0.05	< 0.1	< 0.1	< 0.05	< 1.3	< 0.3	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1
Total Phosphorus (mg/L) Average Monthly	E	3.86	4.13	5.99	5.19	5.15	5.78	6.92	7.29	6.06	6.87	7.05

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	Average Monthly	Maximum	Instant. Maximum		
Flow (MGD)	Report	Report Daily Max	XXX	XXX	XXX	XXX	Continuous	Recorded
pH (S.U.)	XXX	XXX	6.0 Inst Min	XXX	XXX	9.0	1/day	Grab
DO	XXX	XXX	5.0 Inst Min	XXX	XXX	XXX	1/day	Grab
TRC	XXX	XXX	XXX	0.26	XXX	0.85	1/day	Grab
CBOD5	XXX	XXX	XXX	25	XXX	50	2/week	24-Hr Composite
TSS	XXX	XXX	XXX	30	XXX	60	2/week	24-Hr Composite
Fecal Coliform (No./100 ml)	XXX	XXX	XXX	200 Geo Mean	XXX	1000	2/week	Grab
E. Coli (No./100 ml)	XXX	XXX	XXX	XXX	XXX	Report	1/quarter	Grab
Total Nitrogen	XXX	XXX	XXX	Report	XXX	XXX	1/month	24-Hr Composite
Ammonia Nov 1 - Apr 30	XXX	XXX	XXX	20.0	XXX	40	2/week	24-Hr Composite
Ammonia May 1 - Oct 31	XXX	XXX	XXX	7.0	XXX	14	2/week	24-Hr Composite
Total Phosphorus	XXX	XXX	XXX	Report	XXX	XXX	1/month	24-Hr Composite