

Peters Township Sanitary Authority

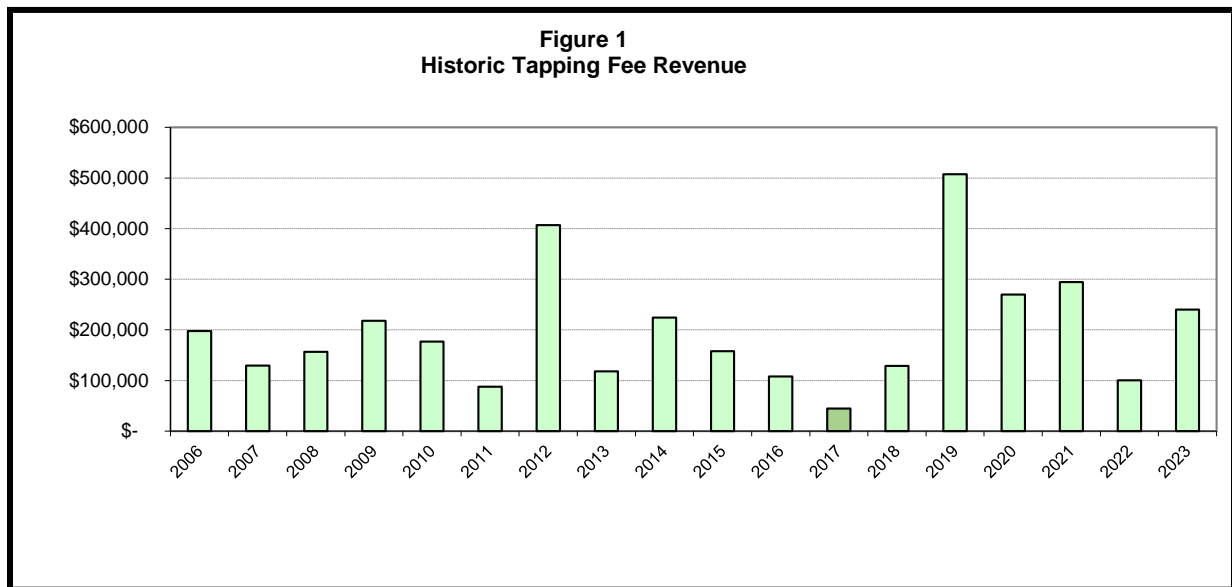
PROPOSED CAPITAL IMPROVEMENT PLAN FOR 2023 And 10-Year Capital Plan

1.0 INTRODUCTION

The Authority has included a capital improvement plan in its budget since 1996, and to a large extent it has been the effort that we invest in preparing the capital improvement plan, followed by implementing the plan during the year, which has helped the Authority achieve many of its objectives over the past two decades.

The Capital Plan recognizes the Authority continues in a reduced financial condition, attributed to the slowdown in the housing market, and which reduces our tap fee revenue, as well as our growth in operating revenue. The 2017 Tapping Fee revenue of \$44,663 was at an all-time low. The Township's 2013 Comprehensive Plan was approved, and with the implementation of the rezoning to higher densities in 2017. The budgeted 2022 tapping fee revenue was \$137,600, with \$100,520 projected in revenues. The developments connecting to the system included, Brookwood Village, Brookwood Place, Anthony Farms, Tuscany, , and Justabout Farms.

Figure 1 compares our 2022 forecasted and 2023 projected annual tap fee revenue with the previous 16 years. Note that 2012 was not a typical year in Tap Revenue due to General Purpose Tap Fees plus Special Purpose Tap Fees from the 29 Valley View properties, and 2019 the Waters residential facility was received.



Note: The tap fee revenue for 2009 through 2015 includes tap fees reimbursed under Developer Construction Agreements. The developments with tap fee reimbursement agreements are described in Section 5.0.

The Authority established that a \$2 million annual re-investment in our facilities should be considered the minimum necessary to maintain a “sustainable level of service”. See definition at right.

Sustainable Level of Service
A service level which provides the treatment and conveyance capacity for growth, while providing uninterrupted service to our customers, and meeting all regulatory requirements.

Thereby, necessitating regular sewer use rate increases to generate additional operating budget surpluses through the Equipment Replacement Allowance line item, which funds the capital improvement plan, in conjunction with tap fee revenue and investment interest.

This Equipment Replacement Allowance category was \$520,000 in the 2022 Operating Budget and in the 2023 budget will decreased to \$355,000.

2.0 CAPITAL IMPROVEMENT FUND (CIF) EXPENDITURES

2.1 The following tables will provide the updated status of the Planned 2022 Capital Improvements. The Sources of Funds available were \$5,478,325, and the 2022 projected expenditures were \$403,420 leaving a balance of \$5,074,904.

Summary of Total Cumulative Project Expenditures

		Beginning Balance	Approved Budget	Actual Jan- Sept	Projected Expenditures	Varaince Budget to Projected	Ending Balance
	Expenditures						
	Office and Administrative						
Completed	Piney Fork Watershed 537 Plan	\$ 48,957	\$ 26,000	\$ 4,308	\$ 4,308	\$ 21,692	\$ 53,265
Completed	Sewerline Camera	-	12,500	12,345	12,345	155	12,345
Completed	Phone System-Office, Plants, PS	-	-	-	15,000	(15,000)	15,000
NA	Server Hardware/Software		3,000	-	-	3,000	-
	Sub Total	\$ 48,957	\$ 41,500	\$ 16,653	\$ 31,653	\$ 9,847	\$ 80,610
	Treatment						
Ongoing	BR NPDES Renewal	\$ 81,532	\$ 54,500	\$ 20,145	\$ 32,250	\$ 22,250	\$ 113,782
Completed	BR UV Upgrades - Permit.Desigi	350,438	-	-	-	-	350,438
Completed	BR UV Upgrades Contruction	2,653,319	40,000	82,573	82,573	(42,573)	2,735,891
Completed	BR UV Upgrades-Engineering C	100,208	19,000	-	33,906	(14,906)	134,114
Completed	BR Minor Improvments	-	73,500	71,168	71,168	2,332	71,168
	Sub Total	\$3,185,497	\$187,000	\$ 173,886	\$ 219,897	\$ (32,897)	\$3,405,393
Completed	DC Minor Equipment	\$ -	\$ -	\$ 1,573	\$ 1,573	\$ (1,573)	\$ 1,573
	Sub Total	\$ -		\$ 1,573	\$ 1,573	\$ (1,573)	\$ 1,573
	Sewer System						
Ongoing	Crestview Acres Replacment	\$ 13,987	\$ -	\$ 19,250	\$ 39,810	\$ (39,810)	\$ 53,797
Ongoing	Upper Valley Brook Augmentati	834	104,800	51,206	101,966	2,834	102,800
Ongoing	USC BR PS Capital Improv	70,908	98,400	8,522	8,522	89,878	79,430
NA	Other Sewer Projects	-	50,000	-	-	50,000	-
	Sub Total	\$ 85,729	\$253,200	\$ 78,978	\$ 150,298	\$102,902	\$ 236,027
	Total Expenditures	\$3,320,183	\$481,700	\$ 271,089	\$ 403,420	\$ 78,279	\$3,723,603

Table-I a Status of the 2022 Capital Improvement Projects		
Project	1	Brush Run Plant Optimization Project: Ultraviolet disinfection and chemical addition: Project Closeout Estimated cost: \$59,000 Projected: \$116,479
Project	2	Brush Run Plant Rerate and NPDES Permit Amendment; NPDES Renewal Estimated cost: \$54,500 Projected: \$32,250 Anticipated to be completed by December 2022
Project	3	Piney Fork 537 Plan / Church Hill Property Sale Estimated cost: \$26,000 Projected: \$21,692 Completed
Project	4	Deerfield Manor/Fairways Pump Station/Force Main to USC: Sewage Facilities Planning, Design and Construction Estimated cost: \$98,400 Projected: Sewage facilities planning & design Completed, bid and construction 2023
Project.	5	Other Sewer Lining Projects / Emergency Repairs Estimated cost: \$50,000 Projected: \$0
Project	6	Valley Brook Interceptor Augmentation Design Estimated cost: \$104,800 Projected: Design ongoing, construction 2023
Project	7	BR Minor Improvements Estimated cost: \$73,500 Projected: \$71,168 Completed paving of lot and lab equipment purchases
	8	DC Minor Improvements Projected: \$1,573
Project	9	Sewer Lateral Push Camera Estimated cost: \$12,500 Projected:\$12,345 Completed
Project	10	Network/Computer – Field Laptop Estimated cost: \$3,000 Projected: \$0
Project	11	Telephone System Upgrade – Office, Plants, Pump Stations Projected \$15,000
Projected Total		\$403,420
Total Expenditures Planned: \$481,700 Projected Expenditures: \$ 403,420		

3.0 CAPITAL PLAN

3.1 Sources of Funds

This section describes the sources of funds for 2021 as well as discussing projections for future years. The Authority's capital improvement projects are funded by a combination of:

- General Purpose Tapping Fees
- Special Purpose Tapping Fees
- Assessments
- Operating Budget Surplus (Debt Service Cover, Equipment Replacement Allowance, and Capital Transfer)
- Investment Interest

- Grants, if any
- Borrowed Funds, if any

Tapping Fees – These are charges imposed on new customers as they connect to the sewer system. The current tapping fee is \$3,200/equivalent dwelling unit. The maximum amount a municipal authority can charge is governed by the formula prescribed in the Municipality Authorities Act. Essentially, it is the cost of the Authority’s unencumbered infrastructure assets divided by the design treatment capacity (in gallons/day) to arrive at a cost/gallon of capacity. For the Authority this cost is \$12.05/gallon. Residential units require 258 gallons/day of capacity; therefore, the capacity charge is \$3,109, plus \$91 for the Customer Facilities/Connection Fee, which covers the permitting and inspection process. Non-Residential units are charged a tapping fee based on the estimated maximum monthly average day water consumption times the \$12.05/gallon, with a minimum consumption of 258 gallons/day. The tapping fee calculation was last updated in 2008.

Tapping Fee Reimbursements – All new customers connecting to the sewer system pay a tapping fee. However, under special circumstances the Authority may enter into a Tap Fee Reimbursement Agreement with a Developer, whereby the Developer constructs capital improvements for the Authority that are not otherwise required for its development, and dedicates the improvement to the Authority in exchange for future installments to be paid at such time when tapping fees are collected as units are connected in the development. While the Authority has used this mechanism only sparingly over the years. During 2009 two developments were completed that included Tap Fee Reimbursement Agreements. These developments are: 1) Overlook Plan, which included reimbursement up to \$89,600 in tap fees; and 2) Willoughby Woods Plan (*now called Brookwood Villas*), which included reimbursement up to \$32,084 in tap fees. The Willoughby Woods exhausted its tap reimbursements in 2013; thereby, only the Overlook Plan Tap Fee Reimbursement Agreement remains, with three tap reimbursements available.

Detailed descriptions of the projects with Tapping Fee Reimbursements, and the remaining balance, are provided in Section 5.0 of this report.

Tapping Fee Reimbursement Process – For developments with Tap Fee Reimbursement Agreements, whenever a sewer tap is obtained, the tap fee paid is deposited in the CIF and recorded as tapping fee revenue. At a subsequent Board meeting, the tap fee reimbursement due the Developer is listed on the CIF’s requisition as a Tap Reimbursement to the Developer, and approved by the Board. At that time the reimbursement becomes a CIF expense.

Special Purpose Tapping Fees – The Municipality Authorities Act provides for charging a Special Purpose Part to the tapping fee for special purpose facilities, such as sewer main extensions, that are applicable to a particular group of customers, based upon the cost of the facilities and the number of customers served. This provides an alternative to public improvement assessment programs for recovering the cost of sewer main extensions from the customers served. Since the Special Purpose Part of a tapping fee can be based on the design capacity of the facilities expressed in Equivalent Dwelling Units, the cost of a project can be equally distributed across all existing customers and all future customers served by the facility, and avoid the costly expenses associated with assessment programs. The Authority has four Special Purpose Tapping Fee districts established, as described in a memo at the end of the Capital Plan. Periodically, the Special Purpose Tapping Fee amounts are indexed forward using the Engineering News Record cost index, essentially adjusting the fee by the inflation index. The last adjustment was in July 2013. Review of the fee was completed in 2020.

The following sewer extensions were imposed a Special Purpose Part Tapping:

Project Name	Max. EDUs	Accept. Date	Spec. Purp. Fee, Initial	Spec. Purp. Fee Current/Date 12/31/2021	Value	Lots Outstanding
Severns Ext	3	12/13/2005	\$4,415.00	\$7,206.49	\$7,206	948 E. McM
Hays Road Ext. Engineering Only	4	10/11/2005	\$900.00	\$1,485.36	\$1,485	Parcel 540-002-04-03-0003-00
2007 E. McMurray Ext.	7	6/4/2008	\$7,501.14	\$11,500.95	\$11,500	864 E. McM
2012 Valley View Ext						
Valley View Dr.	6	8/14/2012	\$3,200	\$4,260.07	\$25,560	6
Component B	275	8/14/2012	\$870.00	\$1,158.21	\$239,250	275 projected
Component C	35	10/9/2012	\$2,330.00	\$3,101.86	\$81,550	35 lots
Component CL	12	10/19/2012	\$1,830.00	\$2,436.23	\$21,960	12 projected
Subtotal:	322					
Total:	342			Total Value:	\$388,513	

Assessments – Historically, the Authority used sewer assessment programs to recover the cost of sewer extensions from the property owners benefiting. The most recent assessment program was for the Ivy Lane Sewer Extension project in 2003. The Authority allows sewer assessments (and Special Purpose Tapping Fees) to be paid on repayment schedules, and a number of repayment schedules still exist for the Ivy Lane assessments. The Authority has one agricultural deferred assessments outstanding which total \$15,422. Summarized in the table below.

The Lushen assessment was paid in full 2022.

1989	Brookwood Rd. Ext	6/10/1992	Lushen	216 Sugar Camp Rd	\$73,000
------	-------------------	-----------	--------	-------------------	----------

Agriculture Deferments					
Project Year	Project Name	Act 71 Cert. Date	Property Name	Property Address	Assessment Amount
1989	Beacon Manor Ext.	11/13/1991	Munroe	267 Thompsonville Rd	\$15,422
				Total:	\$15,422

Operating Budget Surplus, Debt Service Coverage, and Equipment Replacement Allowance – Any operating surplus is transferred to the CIF. The Authority’s Trust Indenture requires that we budget each year the annual debt service, plus 10%, which resulted in surplus at the end of the year and is transferred to the CIF.

The Authority also budgets an Equipment Replacement Allowance/Capital Transfer each year. If these funds are not used for equipment replacement during the year the remaining balance is transferred to the CIF. If there are no charges to the account, the balance is transferred to the CIF after final reconciliation of year-end expenses occurs in February.

The Authority frequently uses in the Operating Budget the line item Equipment Replacement Allowance as a “budget balancer” to postpone rate increases. For instance, it was budgeted at \$520,000 in 2022, but in 2023 Operating Budget decreased to \$355,000.

Investment Interest – The Authority prudently invests its CIF funds and Construction Funds in accordance with the Trust Indenture restrictions and the Municipality Authorities Act. Most of savings are in CD’s offering a 2% interest rate.

Capital Improvement Fund –These CIF funds are currently invested at CFS Bank in interest bearing accounts and one CD’s earning various interest rates, and Slovenian Savings and Loan Association. The Authority may also invest in short-term government securities from time to time.

Grants – The following is a listing of grants received:

Year	Grant Program	Project	Grant	Balance
2009	H2O PA	Brush Run Wet Weather	\$600,000	\$0
2009	Conservation Works	Blower VFDs/ DO Control	\$137,250	\$0
2010	LSA	Valley View Sewer Ext.	\$300,000	\$0
2010	H2O PA	Valley View Sewer Ext	\$225,000	\$0
2012	LSA	DC Plant Replacement Design	\$85,000	\$0
2013	NA	NA	\$0	NA
2014	PA Small Water & Sewer	Stratford PS Force Main Replacement	\$56,000	\$0
2015	LSA	DC Plant Replacement Construction	\$500,000	\$0
2017	LSA	DC Interceptor Replacement	\$300,000	\$0
2020	LSA	BR UV Improvements	\$250,000	\$0
2022	LSA	2022 Conveyance System Improvements	\$500,000	\$500,000
		Total:	\$2,953,250.00	\$500,000.00

Grant Applications Pending

Application for 2022 was submitted to the CFA in the amount of \$500,000 for the 2022 Sewer Rehabilitation Project. The project will include the Augmentation of the Lower Valley Brook (Lower & Upper Pelipetz) Sewer Capacity Augmentation – Approximately 5,670 Linear Feet, and Sewer Replacement of the Crestview Acres – Physical location in the vicinity of Elizabeth and Marble Drive – Approximately 3,000 Linear Feet. Both projects have been outlined in the 10-year Capital Plan. The Lower Valley Brook (Lower and Upper Pelipetz) portion is the final component of the 2008 Valley Brook Interceptor Comprehensive Plan which was approved by the PaDEP November 25, 2009. The Crestview Acres portion sewers have well reached the end of their structural useful life. In this area the sewers were installed in the early 1960’s by a developer, prior to the formation of the Sanitary Authority. These sewers are considered the most compromised and structurally deficient sewers and manholes in the Authority’s service area.

Sewage Planning Grants

The Township/Authority has been approved a planning grant for the following project:

- Donaldson's Crossroads 537 Sewage Plan, grant amount: \$37,455, (confirmed, however, no funds budgeted by the state).

The grant proceeds are released by PaDEP after the planning document is approved by the PaDEP, provided funds are available in the state budget.

Future Grant Applications

Borrowed Funds

- Pennvest loan for the 2003 Ivy Lane Sewer Extension project with a balance of \$32,396 as of December 31, 2022, at an interest rate of 2.774%.
- Pennvest loan for the 2017 DC WPCP Replacement project. The Loan is \$11,000,000 with a term of 20-years. The interest rate during the first 5-year period is 1.055%, with a rate of 1.835% for the remaining 15 years. The balance as of December 31, 2022 is \$8,807,209.
- Guaranteed Sewer Revenue Bond issue, Series 2021, in the amount of \$9,190,000 for the DC WPCP Replacement Project. The term of the bond issue is 24-years, and the interest rate is 2.80%. The balance as of December 31, 2022 is \$8,960,000.
- Pennvest loan for the 2020 Conveyance System Improvements project. The Loan is \$5,255,000 with a term of 20-years. The interest rate during the first 5-year period is 1.0%, with a rate of 1.743% for the remaining 15 years. The balance as of December 31, 2022 is \$4,596,208.

3.2 Recommended Capital Improvement for 2023

The funds available for CIF projects in 2023 are estimated as follows:

Balance of CIRF Funds	\$ 5,074,904
Tap and Assessments budgeted	54,400
Equipment Replcmt Allowance (prior year)	480,000
Operating Surplus	52,500
Bond, Grant, Loan	500,000
Total Capital Funding	\$ 6,161,804

The Authority's goal is to maintain a minimum balance of \$2,000,000 balance in the CRF at all times.

Table-III
RECOMMENDED 2023 CAPITAL IMPROVEMENT PROJECTS

Project	1	Brush Run Plant Rerate and NPDES Permit Amendment; NPDES Renewal Estimated cost: \$5,000
Project	2	Deerfield Manor/Fairways Pump Station/Force Main to USC: Engineering & Construction Estimated cost: \$99,500
Project	3	Valley Brook Interceptor Augmentation - Engineering, & Construction Estimated cost: \$1,126,563
Project	4	Crestview Acres Sewer Replacement – Design, Engineering, & Construction Estimated cost: \$675,938
Project	5	Brush Run Plant Water System Upgrade - Design, Engineering, & Construction Estimated cost: \$571,000
Project	6	BR Minor Improvements Estimated cost: \$35,000
Project	7	DC Minor Equipment Estimated cost: \$14,000
Project	8	Vehicle Replacement Estimated costs: \$60,000
Project	9	Other Sewer Lining Projects / Emergency Repairs Estimated cost: \$75,000
Project	10	USC BR PS Annual Capital Improvements Estimated Cost: \$4,400
Project	11	Phone system upgrades Estimated cost: \$1,000
		USC
Projected Total		\$2,667,401

Table IV – Recommended 10-Year Capital Plan

SOURCES OF FUNDS	Projected 2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032
Balance of CIRF Funds	\$ 4,387,605	\$ 5,074,904	\$ 3,494,403	\$2,942,891	\$ 3,235,391	\$ 2,697,891	\$ 2,680,391	\$2,952,891	\$2,697,891	\$2,572,891	\$2,437,891
Tap and Assessments Projected /def assessments	176,720	54,400	20,000	20,000	20,000	20,000	20,000				
Equipment Replcmt Allowance (prior year)	412,000	480,000	355,000	450,000	400,000	400,000	400,000				
Operating Surplus	210,000	52,500	52,500	52,500	52,500	52,500	52,500				
PV Loan/Loan/Bond/trustee interest	74,000	-	-	-	-	-	-				
Grant - BR		500,000									
Sale Proceeds Piney Fork property	218,000										
TOTAL CAPITAL FUNDING	\$ 5,478,325	\$ 6,161,804	\$ 3,921,903	\$ 3,465,391	\$ 3,707,891	\$ 3,170,391	\$ 3,152,891	\$ 2,952,891	\$ 2,697,891	\$ 2,572,891	\$ 2,437,891
CAPITAL EXPENDITURES											
TREATMENT PLANTS											
BR Minor Improvements	71,168	35,000	18,000	-	40,000	40,000	40,000				
BR SCADA Improvements	-				-		-				
BR Plant Water System Upgrades		571,000									
BR Security Improvements	-		50,000								
BR Belt Press Replacement	-			50,000	750,000						
BR Blower Upgrade/Replacement	-				25,000	100,000	25,000	100,000			
BR NPDES Renewal/re-rate	32,250	5,000	-	-	-	35,000					
BR NPDES/Optimization Project -Design	-										
BR NPDES/Optimization Project - CA Eng	33,906										
BR NPDES/Optimization Project - Construction	82,573										
DC Minor Equipment	1,573	14,000			45,000						
DC NPDES Permit Renewal	-	-	25,000	10,000				35,000			
SEWER SYSTEM											
Crossgates Bremen Lane Replace	-	-	-	-	75,000	225,000					
VB Inter Augmentations	101,966	1,126,563	482,812	-							
Crestview Acres Sewer Replace	39,810	675,938	270,000								
Deer Field Manor/Linksvew Dm Transfer	8,522	99,500	-	-	-	-	-				
USC BR PS Annual Capital Improvements		4,400									
Other Sewers/Lining/Emergency Repairs	12,345	75,000	75,000	75,000	75,000	75,000	75,000	75,000	75,000		
Sewer Line Camera/Flow Meters											
Vehicles		60,000	50,000	35,000	-		60,000	45,000	50,000	60,000	
OFFICE ADMINISTRATION											
Tap Fee Reimbursements	-		3,200	-	-	-	-				
Server Hardware/Software			5,000	-	-	15,000					
Phone System/pump station upgrades	15,000	1,000	-	-	-	-	-				
Legal/Financial	-	-	-	-	-	-	-				
Piney Fork Property (sell portion)/ 537 Plan	4,308		-	-	-	-	-				
TOTAL CAPITAL EXPENSES	\$403,420	\$2,667,401	\$979,012	\$230,000	\$1,010,000	\$490,000	\$200,000	\$255,000	\$125,000	\$135,000	\$0
ENDING BALANCE	\$5,074,904	\$3,494,403	\$2,942,891	\$3,235,391	\$2,697,891	\$2,680,391	\$2,952,891	\$2,697,891	\$2,572,891	\$2,437,891	\$2,437,891

3.2.1 Project Descriptions

Project No. 1. Brush Run Plant Rerate & NPDES Permit Amendment

The PADEP indicated in November 2022 that the draft NPDES Permit Amendment would be issued in December 2022. The funds budgeted are for any potential permit challenges.

Project No. 2. Deerfield Manor/Fairways Pump Station Upgrades and New Force-main to USC: Bidding and Construction

Due to wet weather related issues at the USC Brush Run Pump Station, it has been agreed that sewage flows from the Deerfield Manor service area of USC that utilizes their Brush Run Pump Station will be redirected by gravity flow into the PTSA sanitary system. As per the recently adopted Second Amendment to the 1950 Agreement, all parties concur that sewage flows from the PTSA's existing Fairway Estates Pump Station will be redirected by a new force-main to the USC collection system.

The Sewage Facilities Planning was approved by PADEP on February 18, 2022 for the exchange of sewage flows between USC (Allegheny County) and PTSA (Washington County). Project design and offsite easement acquisition was completed in 2022, with bidding and construction planned for early spring 2023.

Project No 3. Lower Valley Brook Interceptor Sewer Augmentation (Upper Pelipetz) – Permitting, Bidding, Construction & Engineering

The primary goal of this project is to increase the Valley Brook Interceptor sewer capacity to address the following items: eliminate the sanitary sewer overflows experienced during peak wet weather events, accommodate the recently revised Township zoning that allows a more dense development in the Township, and provide for future growth for the Brush Run and Piney Fork sewersheds. This project is one of the final components in the Authority's 2008 Valley Brook Interceptor Comprehensive Plan, which was requested by PADEP to address the aforementioned capacity related issues.

To manage the finances associated with the Project, the Authority has phased the augmentation for the Lower Valley Brook Interceptor into Upper Pelipetz and Lower Pelipetz. The Upper Pelipetz portion of the project will encompass augmentation of approximately 2,050 LF of 12", 15" and 18" diameter clay pipe. The Lower Pelipetz portion consists of 3,620 LF of 15", 18" and 21" VCP and PVC sewers. Design and permitting was started in 2022, with construction planned for 2023.

Project No. 4. Crestview Acres Sewer Replacement – Permitting, Bidding, Construction, & Engineering

The project will replace gravity sewers in the Crestview Acres near Elizabeth and Marble Drives. The sewer was originally installed in the early 1960's and is in poor condition. The Authority previously replaced 1,000 linear feet (LF) of pipe in 1996 and several hundred more as an emergency replacement in 2004. This project will replace 3,000 LF of 8" VCP sewer and associated manholes, while also constructing new sewers to reconnect existing homes and eliminate private laterals in the road right of way. Design and permitting was initiated in 2022 and is expected to be completed early in 2022. Construction is anticipated spring 2023.

Project No. 5. Brush Run Plant Water System Upgrades

The existing plant water system at the facility, circa 1995, is not able to meet the plant water demands to sustain consistent operations. Furthermore, the pumps have been rebuilt multiple times and have reached their useful limit. In 2022, the Authority engaged GHD to evaluate the plant water system needs and determine options for replacement. In July 2022, GHD completed and submitted to PTSA a Basis of Design Report for the upgrade. The Report provides (2) alternatives for water system upgrades: Duplex Pumping System and Triplex Pumping System. Both systems will utilize hydropneumatic tanks and automated system instrumentation controls. Final design and construction is planned for 2023.

Project No. 6. Brush Run Minor Improvements – Belt Filter Press Conveyor Belt, Laboratory Autoclave Oven, Press Room Lighting Replacement, Automated Sampler

This item encompasses the replacement of a large portion of the belt filter press conveyor belt at cost of \$13,000. A section of the conveyor belt was replaced in 2022 due to failure, with the remaining 71 LF planned for replacement in 2023. Also included here is replacement of the autoclave (circa 1994) in the laboratory at an estimated cost of \$8,500. This unit is obsolete and has undergone multiple repairs; however, although the unit remains operational it presents safety concerns due to the pressurized environment. Upgrading of the press room lighting to LED lighting has been included in this project to address the malfunctioning and age of the existing fluorescent light fixtures \$5,000. Replacement of the existing automated sampler is also included in this project, at a cost of \$8,500.

Project No. 7. DC Minor Equipment

Included in this project is the coating/sealing of the asphalt parking lot at the Donaldson Crossroads Treatment Plant to extend the longevity of the surface. Also included in the project is the sealing of the driveways for the Rutledge, Hidden Valley and Maple Lane pump stations. Total cost for the project is \$14,000.

Project No. 8. Vehicle Replacement – 2014 Ford F250

The Authority utilizes a standard accounting practice of vehicle depreciation over seven years, while evaluating the potential replacement of said vehicles if deemed necessary or economically feasible. Due to the substantial repairs incurred by the 2014 Ford F250 it has been determined that it would be most economical to replace the vehicle in kind (2023).

Project No. 9 Other Sewer Lining Projects / Emergency Repairs

This project encompasses lining projects (Manhole to manhole lining) and emergency repairs. This type of repair does not include routine repairs by Authority staff, but would be any large scale repair projects that would require outside assistance by contractor. Examples of this type of repair would be unplanned sewer repairs undertaken due to landslides, such as occurred in 2018 at Hemlock Drive and Buffalo Ridge. This line item has been funded each year of the capital plan.

Project No. 10 Upper St. Clair (USC)/Brush Run Pump Station Capital Improvements

This project is USC's and per contract the Authority's cost share is 3.1% of capital expenditures for the USC Brush Run Pump Station. They are planning renovations estimated at \$141,000, PTSA's share is \$4,400.

4.0 FUTURE YEARS CAPITAL PROJECTS

The 10-year capital plan beyond 2022 is summarized in the Table IV. It identifies the revenues and sources of funds at the top of the page and capital expenditures on the lower half. Table IV is used to identify the cash flow required to construct the known or anticipated projects. One of the objectives of the 10-year capital plan is to manage our CIRF balance at \$500,000 or greater. As can be seen from Table IV the CIF balance remains at \$500,000 or above through 2027. The projects planned beyond 2022 are not intended to be all inclusive, but provide a magnitude of cash flow requirements. In order to achieve the necessary cash flow, the Equipment Replacement Allowance to generate surplus funds will need to be regularly increased.

2024 through 2025 Projects/Expense Summary

Treatment Plants:

- Brush Run Computer and Software Upgrades - \$18,000 (2024)
- Brush Run Actuated Gate - \$50,000 (2024)
- Brush Run Belt Filter Press Replacement (Design) - \$50,000 (2025)
- Donaldson Crossroads NPDES Permit Renewal - \$25,000 (2024)

Sewer System:

- Crestview Acres Sewer Replacement Construction, Engineering, As-Builts \$270,000 (2024)
- Valleybrook Interceptor Augmentation (Upper & Lower Pelipetz Construction, Engineering, As-Built Drawings \$482,812 (2024)
- Emergency Repairs \$75,000 (2024-25)
- Vehicles \$50,000 (2024)
- Sewer Line Camera Equipment (Lateral Launch) \$35,000 (2025)

Office and Administration:

- Tap Fee Reimbursement \$3,200 (2024)
- Server Hardware / Software Upgrades \$5,000 (2024)

2026 through 2032 Projects/Expenses**Treatment Plants:**

- Brush Run WPCP Minor Improvements: Projected \$120,000 (2026-2028)
- Brush Run WPCP Belt Press Replacement \$750,000 (2026)
- Brush Run Blower No.1 Replacement - \$125,000 (2026-2027)
- Brush Run WPCP Digester Blower Replacement \$125,000 (2028-2029)
- Brush Run WPCP NPDES Permit Renewal \$35,000 (2027)
- DC WPCP Minor Improvements SCADA: Projected \$45,000 (2026)
- DC NPDES Permit Renewal \$35,000 (2025, 2029)

Sewer System

- Crossgates Bremen Lane Sewer Replacement \$300,000 (2026-27)
- Emergency Repairs \$450,000 (2026-32)
- Vehicles \$215,000 (2028-30)

Office and Administration

- Network Server – Hardware and Software \$15,000 (2027)

5.0 TAP REIMBURSEMENT PROJECT DESCRIPTIONS

The following project description is for the only remaining project that includes tap fee reimbursements.

Maple Lane Pump Station – The Overlook Plan was going to require a new sewage pumping station that would be located just several hundred feet downstream of the Authority's existing Timbercrest Pump Station, which was constructed in 1972. The Developer agreed to increase the capacity of his proposed pump station from 27 units to 64 units to provide for the 37 units from the Timbercrest Plan. The Authority participated in specific capacity related pump station tasks. The total pump station/force main project cost exceeded \$500,000; however the Authority only participated in \$391,000 of the cost, of which \$199,030 was the Authority's share. The Authority paid \$109,430 of this total directly, paying for the design engineering, construction observation, emergency generator, and other equipment. The \$89,600 balance was paid through tap fee reimbursements. The balance in tap fee reimbursements as of November 30, 2017 was \$9,600.

End of Report