

**Project Title** ID 184177

Bedford Street Sewer Separation Project

**Water Resources**

**Division** Sewer

**Classification** Wastewater

**Project Description**

The Bedford St Sewer Separation Project is a CSO Tier 3 project within the Back Cove Watershed. This project will install a new storm drain from Back Cove on Bedford Street to Brighton Ave. This will connect to a project done by DOT called the USM Roundabout which will have sewer separation and green infrastructure incorporated into it.

**Project Justification**

This project was identified in the Back Cove West Separation and Green Project Report. The project was ranked to be done in phase 1 and would separate 39.11 acres from the combined sewer system.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
		\$8,500,000		\$8,500,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2019		\$8,500,000			<input type="checkbox"/>
2020					<input type="checkbox"/>
2021					<input type="checkbox"/>
2022					<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$8,500,000			

**Other Funding Source Description**

**Operating Budget Impact**

**Project Title** ID 152461

CMOM - Pump Station Rehabilitation

**Water Resources**

**Division** Sewer

**Classification** Stationary Equipment

**Project Description**

The following projects were recommended to be completed:

- Curtis Pump Station Engineering
- Riverton Replacement with Submersible Pump Station
- Franklin Street Pump Station Improvements
- Castine Replacement of Security Fence
- SCADA and Hardware Updates
- Flowmeters at Pump Stations

**Project Justification**

Recommendations in the CMOM report which was done by Woodard and Curran.  
Also from the I & I Study

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
		\$5,800,000		\$5,800,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2015		\$682,000	\$680,000		<input checked="" type="checkbox"/>
2016		\$670,000	\$670,000		<input checked="" type="checkbox"/>
2017		\$1,100,000	\$1,100,000		<input checked="" type="checkbox"/>
2018		\$670,000	\$670,000		<input checked="" type="checkbox"/>
2019		\$670,000			<input type="checkbox"/>
2020		\$670,000			<input type="checkbox"/>
2021		\$670,000			<input type="checkbox"/>
2022		\$670,000			<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$5,802,000	\$3,120,000		

**Other Funding Source Description**

**Operating Budget Impact**

**Project Title** ID 173179

CMOM - Inflow and Infiltration Program

**Water Resources**

**Division** Sewer

**Classification** Wastewater

**Project Description**

The I&I Reduction Program: A practical and systematic I&I reduction effort that is conducted strategically and opportunistically will reduce I&I flows over time and future treatment costs. I&I reduction will:

- Decrease operations and maintenance costs including pumping and treatment costs associated with extraneous flows
- Increase compliance performance and
- Potentially reduce compliance related costs

**Project Justification**

According to the EPA Clean Water Act Administrative Order Docket No 12-009

CMOM Corrective Action Implementation Schedule outlines a three Phase I&I Reduction Plan. Phase I and Phase II are to be developed and submitted between January 2015 and December 1, 2019. The data compiled during this time frame will determine the extent of Phase III. The scope of the project in the CMOM includes A phase I report that includes flow metering results and identifies all sub-catchment areas that that have I&I flows in excess of 4,000GPD per inch diameter/mile of sewer.

CIP Fiscal 2017 and 2018 (July 2016-June 2019) is a short time to accomplish both phase I and II. Phase III will be a mitigation plan.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
\$1,800,000		\$3,000,000		\$4,800,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2017		\$750,000	\$750,000		<input checked="" type="checkbox"/>
2018		\$260,000	\$260,000		<input checked="" type="checkbox"/>
2019		\$790,000			<input type="checkbox"/>
2020		\$1,000,000			<input type="checkbox"/>
2021		\$1,000,000			<input type="checkbox"/>
2022		\$1,000,000			<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$4,800,000	\$1,010,000		

**Other Funding Source Description**

**Operating Budget Impact**

**Water Resources**

**Division** Sewer

**Classification** Wastewater

**Project Description**

Project involves engineering and construction of replacement/upgrades of priority sanitary sewers throughout the City's sewer network of over 200 miles of sewer lines, that require replacement, relining or upgrade as recommended by the outside consulting report on condition assessment of the sewer infrastructure.

**Project Justification**

The City of Portland has an aging sewer infrastructure with some sewer lines reaching over 100 years in age. While we have highly invested in upgrading and eliminating CSO's, funding in past several years has been limited to support a basic service level for sewer cleaning and repairs, less preventive and more emergency response to sewer line needs. As a result of staff reports to the Department of Environmental Protection (DEP), on dry weather and wet weather sanitary sewer overflows, (SSO's), EPA issued an Administrative Order on September 27, 2012 due the Agencies view that the City violated the Clean Water Act and is subject to penalties and further mandates. See Attached. The mandates require that the City enter into a CMOM program. CMOM stands for Capacity, Management, Operations, and Maintenance Assessment. The program follows a 2012-2013 condition assessment report of the City's sewer infrastructure, that once completed will recommend specific preventive maintenance investments to eliminate the occurrences of SSO's.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
\$1,290,000		\$14,810,000		\$16,100,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2014		\$1,000,000	\$1,000,000		<input checked="" type="checkbox"/>
2015		\$1,100,000	\$1,100,000		<input checked="" type="checkbox"/>
2016		\$1,100,000	\$1,100,000		<input checked="" type="checkbox"/>
2017		\$1,100,000	\$1,100,000		<input checked="" type="checkbox"/>
2018		\$1,100,000	\$1,100,000		<input checked="" type="checkbox"/>
2019		\$1,100,000			<input type="checkbox"/>
2020		\$3,200,000			<input type="checkbox"/>
2021		\$3,200,000			<input type="checkbox"/>
2022		\$3,200,000			<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$16,100,000	\$5,400,000		

**Other Funding Source Description**

**Operating Budget Impact**

Staff is anticipating that as a result of an enhanced sewer preventive maintenance program and regular preventive maintenance, the Department will avoid unanticipated sewer line collapses that can cost anywhere from \$40,000-\$250,000 depending upon the length and location of the sewer line. In addition, the program will contribute toward avoiding fines and penalties as administered by EPA. Based on our CSO Engineering Consultant recommendations, reoccurring sewer line replacement and upgrades could costs as much as \$3,000,000 per year.

**Project Title** ID 152384

CSO - Close CSO #42

**Water Resources**

**Division** Sewer

**Classification** Wastewater

**Project Description**

Do a detailed study of the Capisic sewer system and watershed to determine where and how storm water is entering into the sewer system and causing sewer overflows at CSO#42. Overflows at CSO #42 were supposed to be eliminated at the completion of Tier 2 but they are still occurring even after completing all of the projects outlined in Tier 2 and the CSO Master Plan. This study would involve hiring a consultant and also installing numerous flow meters within the system for the first year. Subsequent years will involve actual design and construction of action items determined by the study to fully close CSO #42.

**Project Justification**

The completion of Tier 2 separation projects within the Capisic Brook Watershed was supposed to close CSO#42. This action was not successful and more work needs to be done in order to obtain complete closure. The CSO Long Term Control Plan Tier 3 update did not propose any new projects or studies of Capisic Brook because it was thought that at the completion of Tier 2 CSO #42 would be closed. Since this CSO is still overflowing on rain events and we did not meet the goal of Tier 2 a new CIP request has been made in order to correct this and meet our long term control plan and consent decree. By still overflowing at CSO #42 we are not in compliance with our consent decree and DEP may take action due to this.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
\$175,000		\$500,000		\$675,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2015		\$75,000	\$75,000		<input checked="" type="checkbox"/>
2019		\$100,000			<input type="checkbox"/>
2020		\$500,000			<input type="checkbox"/>
2021					<input type="checkbox"/>
2022					<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$675,000	\$75,000		

**Other Funding Source Description**

**Operating Budget Impact**

**Project Title** ID 194801

Warren - Hicks to Hemingway Sewer Separation



**Water Resources**

**Division** Sewer

**Classification** Wastewater

**Project Description**

This request is for a sewer separation project in the area of Warren Avenue between Hicks Street and Hemingway Street. There is currently 4 existing storm drains currently connected to the combined sewer. The project will extend an existing stormwater main from Hicks to Hemingway.

**Project Justification**

Currently, stormwater is captured in the combined sewer which has led to combined sewer overflows at CSO 42.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
		\$400,000		\$400,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2019		\$400,000			<input type="checkbox"/>
2020					<input type="checkbox"/>
2021					<input type="checkbox"/>
2022					<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$400,000			

**Other Funding Source Description**

**Operating Budget Impact**

**Project Title** ID 194802  
 Forest - Avalon to Warren Sewer Separation



**Water Resources**

**Division** Sewer

**Classification** Wastewater

**Project Description**

This request is for a sewer separation project in the area of Forest Avenue between Avalon Street and Warren Avenue. There is currently a separated stormwater pipe which collects runoff from 8 existing storm drains currently connected to the combined sewer. The project will install new stormwater pipe at a higher elevation so that this system can be connected to a existing storm drain instead of the combined sewer.

**Project Justification**

Currently, stormwater is captured in the combined sewer which has led to combined sewer overflows at CSO 42.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
		\$250,000		\$250,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2019		\$250,000			<input type="checkbox"/>
2020					<input type="checkbox"/>
2021					<input type="checkbox"/>
2022					<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$250,000			

**Other Funding Source Description**

**Operating Budget Impact**

**Project Title**

ID 184173

Integrated Planning LTCP and Post Construction Monitoring Program

**Water Resources**

Division Sewer

Classification Wastewater

**Project Description**

The City of Portland is faced with many Clean Water Act Regulations, Federal and State Orders around failure to meet those regulations, and stakeholder engagement over the state of the bay and climate change. The two permits that the City operates under are the CSO (Combined Sewer Overflow) Discharge Permit and the MS4 Permit (Municipal Separate Storm Sewer Systems ) Both of these permits are expiring in 2018. When a permit reaches its 5 year renewal, it is open for comment by regulators and stakeholder groups such as Conservation Law, Friends of Casco Bay and the Casco Bay Estuary Partnership. The City's Long Term Control Plan is part of the CSO Permit and therefore will be open for comment and a review of the plan is due to the EPA in December of 2018. Additionally the East End WWTP is in the process of renewing its 5 year permit and stronger regulations are absolutely in store for them which has a tremendous effect on our processes. Since it has been a goal of the City Council for some time to embark on an integrated plan, and because we have an excellent opportunity to approach all of these requirements as a team, including Portland Water District, I am asking that we combine all of the work needed into a single program over the next three years, with the third year a monitoring program implementation, thus setting the City on the best possible path for growth and sustainability.

**Project Justification**

Improving water quality conditions is a fundamental goal of the city. Through the municipal budgeting process however, the city must balance implementation of this goal with its efforts to achieve other equally important municipal goals. In addition the City must address its water quality challenges within its limited legal authority to control the root causes of many of the water quality conditions. For these reasons the City has always stressed and attempted to implement the most cost effective and streamlined process for meeting its water quality challenges. The Integrated Plan will consolidate in one place the City's water quality requirements and outline the specific measurable steps the city will take to achieve compliance with those requirements. The Integrated Plan will be based on both existing and new technical analysis, include an integrated monitoring plan, and would provide a regular assessment and adaptation to allow the plan to evolve and be refined over time. The plan will be developed through a public process and implemented through the various permits and Long Term Control Plan. The basis for the work will be derived from; the EPA Integrated Plan MEMORANDUM, May 2012, the EPA's framework for LTCP and the EPA's model for Post Construction monitoring. An integrated plan coupled with the required review of the LTCP, will allow the City staff, stakeholders and regulators to reach a consensus on what makes sense for the City to pursue, in what order and for what benefit. The 2.5 million would include: Yr1 \$1.0m Yr2 1.1 Yr3 400

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
\$2,500,000				\$2,500,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2018		\$1,000,000	\$1,000,000		<input checked="" type="checkbox"/>
2019		\$400,000			<input type="checkbox"/>
2020		\$1,100,000			<input type="checkbox"/>
2021					<input type="checkbox"/>
2022					<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$2,500,000	\$1,000,000		

**Other Funding Source Description**



**Project Title**

**ID** 184173

**Operating Budget Impact**



**Water Resources**

**Division** Sewer

**Classification** Wastewater

**Project Description**

This project includes the sewer separation of Brighton Avenue from Lomond Street to Dorset street. The project will separate approximately 30 acres of watershed area currently tributary to CSO location #39. Along with separating area within Brighton Avenue, the project will also disconnect a large wooded wetland from the combined sewer and tie it into the new storm drain. The new storm drain will be routed down Rowe Avenue and a new outfall will be constructed down the Meriline paper street and discharge into inland wetland area which will eventually tie into a new storm drain outfall being constructed as part of the Rowe Avenue sewer separation project.

**Project Justification**

The goal of this project is to eliminate or significantly mitigate CSO activity at CSO # 39 which is a relief point along the City's Fore River Sewer interceptor system. CSO's from this location currently discharge into the Fore River tidal marsh system. The intent of this project aligns with the City's goal to reduce and eliminate CSO activity into it's water bodies.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
		\$1,000,000		\$1,000,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2019		\$1,000,000			<input type="checkbox"/>
2020					<input type="checkbox"/>
2021					<input type="checkbox"/>
2022					<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$1,000,000			

**Other Funding Source Description**

**Operating Budget Impact**

**Project Title** ID 184196

Thames St Stormwater Outfall

**Water Resources**

**Division** Stormwater

**Classification** Wastewater

**Project Description**

Discharge point for construction of approx. 600' of new storm drain to run from Fore street, down the proposed new Thames street extension road and outfall across the Amythest Lot Development Site into Portland Harbor/Casco Bay.

**Project Justification**

Building this new Stormdrain outfall will allow the Water Resources Division to separate Fore Street/ Munjoy Hill watershed from Congress Street to Fore Street. This will reduce the flows to the India street pump station, and reduce CSO activity at CSO's 23 and 24.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
\$100,000		\$750,000		\$850,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2018		\$100,000	\$100,000		<input checked="" type="checkbox"/>
2019		\$750,000			<input type="checkbox"/>
2020					<input type="checkbox"/>
2021					<input type="checkbox"/>
2022					<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$850,000	\$100,000		

**Other Funding Source Description**

**Operating Budget Impact**

Addition to Utility systems will require O&M funding in annual operating budget(s).

**Project Title** ID 184195

Thames St Sewer / Stormwater Extension

**Water Resources**

**Division** Sewer

**Classification** Wastewater

**Project Description**

The city will be extending Thames St towards 58 Fore St Portland Complex and ultimately Fore Street. This request is for inclusion of the necessary City Utility systems; ie extension of the sewer and storm drain systems.

**Project Justification**

This public street can not be extended without provision of necessary wastewater & drainage systems.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
\$50,000		\$250,000		\$300,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2018		\$75,000	\$75,000		<input checked="" type="checkbox"/>
2019		\$225,000			<input type="checkbox"/>
2020					<input type="checkbox"/>
2021					<input type="checkbox"/>
2022					<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$300,000	\$75,000		

**Other Funding Source Description**

**Operating Budget Impact**

Addition of several hundred linear feet of Utility systems will require O&M via annual budget funds.

**Project Title** ID 184370

Pavement Preservation Program - Utility costs

**Water Resources**

**Division** Sewer

**Classification** Streets/Sidewalks

**Project Description**

Paving activity requires that sewer and stormwater structures be adjusted and/or repaired. Typical contract costs show that 5% of the paving program value is spent on such activity.

**Project Justification**

Paving requires that structures be adjusted, and Water Resources staff have advised that building those costs into the contracted work is preferred.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
		\$1,200,000		\$1,200,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2018		\$200,000	\$200,000		<input checked="" type="checkbox"/>
2019		\$200,000			<input type="checkbox"/>
2020		\$200,000			<input type="checkbox"/>
2021		\$200,000			<input type="checkbox"/>
2022		\$200,000			<input type="checkbox"/>
2023		\$200,000			<input type="checkbox"/>
<b>Total</b>		\$1,200,000	\$200,000		

**Other Funding Source Description**

NOTE - the \$200,000 estimated annual cost is 5% of the \$4M annual request in the General Fund.

**Operating Budget Impact**

Minimizes costs to annual budgets and eliminates scheduling logistics.

**Project Title** ID 184372

MPI/CPR Paving Programs - Utility costs

**Water Resources**

**Division** Sewer

**Classification** Streets/Sidewalks

**Project Description**

Oct 18, 2017: MaineDOT has added a new paving program named "CPR". The depth of pavement added is minimal, yet utility covers may require adjustment or repair. Specific streets to receive CPR paving in 2018 include Park Avenue and Valley Street.

Prior Cycle Info:

Paving activity triggers adjustment and/or repair of sewer & stormwater structures. Typical paving contract costs show that 5% of the value is for this sewer & stormwater structure work.

FY18 request was for PACTS awarded Allen Ave project; FY19 request is a combination of Allen & Washington Avenue goals. FY20 goals include Brighton Ave.

**Project Justification**

These costs are triggered each time the City is awarded leveraged paving funds by MaineDOT or PACTS. Water Resources prefers that the necessary work is made part of the paving contract.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
\$300,000		\$3,407,650		\$3,707,650

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2018	\$137,500	\$13,750	\$13,750		<input checked="" type="checkbox"/>
2019	\$1,329,350	\$127,050			<input type="checkbox"/>
2020	\$500,000	\$25,000			<input type="checkbox"/>
2021	\$500,000	\$25,000			<input type="checkbox"/>
2022	\$500,000	\$25,000			<input type="checkbox"/>
2023	\$500,000	\$25,000			<input type="checkbox"/>
<b>Total</b>	\$3,466,850	\$240,800	\$13,750		

**Other Funding Source Description**

FY18 = PACTS awarded Allen Ave 50% leveraged project; General Fund request of 45% Local Match, Sewer to supply 5%.

FY19 = PACTS & MaineDOT awards include Washington Ave, Allen Ave, Park Ave., and Valley Street.

FY20-23 requests are tied to General Fund requests being made; adjustments are likely.

**Operating Budget Impact**

Minimizes annual budget costs and eliminates scheduling logistics.

**Project Title** ID 184374

Street Rehab Program - Utility costs

**Water Resources**

**Division** Sewer

**Classification** Streets/Sidewalks

**Project Description**

General Fund requests contain 70% of total estimated costs for Street rehabilitation work; Sewer Fund request is for the remaining 30%. See General Fund item for full description & examples of candidate streets.

**Project Justification**

Each street the City rehabilitates requires City sewer and stormwater utility work ranging from simple adjustments to full upgrades. Contract experience shows that 30% of such project costs are attributed to sewer and/or stormwater. This is a companion request to a General Fund Program request.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
\$600,000		\$5,400,000		\$6,000,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2019		\$1,200,000			<input type="checkbox"/>
2020		\$1,200,000			<input type="checkbox"/>
2021		\$1,200,000			<input type="checkbox"/>
2022		\$1,200,000			<input type="checkbox"/>
2023		\$1,200,000			<input type="checkbox"/>
<b>Total</b>		\$6,000,000			

**Other Funding Source Description**

General Fund CIP companion request for 70% of total program estimates; Sewer Fund CIP = 30%.

**Operating Budget Impact**

Achieving upgrades during street rehab minimizes maintenance and future capital costs.

**Project Title** ID 184376

PACTS Paving - ineligible Utility costs

**Water Resources**

**Division** Sewer

**Classification** Streets/Sidewalks

**Project Description**

Paving activity triggers adjustment and/or repair of sewer & stormwater structures. These are ineligible costs and are entirely borne by the City. Sewer Fund companion request for 5% of total program value above & beyond our 25% Local Match obligations.

Each PACTS funding cycle will trigger these ineligible costs.

FY19 = Allen, Cumberland, Danforth, and Washington Ave awarded projects.

FY21 = Projected awards for 2020-2023 construction

**Project Justification**

City utility systems in these paving projects must also be addressed; those ineligible costs are estimated at 5% above & beyond total value & requested via Sewer Fund. Water Resources prefers that the necessary work is made part of the paving contract.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
		\$5,250,300		\$5,250,300

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2019	\$1,020,300	\$30,000			<input type="checkbox"/>
2020					<input type="checkbox"/>
2021	\$3,000,000	\$150,000			<input type="checkbox"/>
2022					<input type="checkbox"/>
2023	\$1,000,000	\$50,000			<input type="checkbox"/>
<b>Total</b>	\$5,020,300	\$230,000			

**Other Funding Source Description**

FY19 = PACTS Collector Paving awards. FY21 = projected award amount for CY2020-2022. Separate General Fund requests exist for 95% of standard Local Match.

**Operating Budget Impact**

Minimizes annual budget costs and eliminates scheduling logistics.



**Project Title** ID 194904

Pump Station at 109 District Road

**Water Resources**

**Division** Sewer

**Classification** Wastewater

**Project Description**

**Project Justification**

Conversion of the existing 20,000 gallon septic storage tank to a pumping station.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
		\$120,000		\$120,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2019		\$120,000			<input type="checkbox"/>
2020					<input type="checkbox"/>
2021					<input type="checkbox"/>
2022					<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$120,000			

**Other Funding Source Description**

**Operating Budget Impact**

This project was part of the three phase upgrade proposal for the 109 District Road site. The existing tank would be retrofitted with a submersible sewage pump and and the necessary footage of 4" force main and 8" gravity main with appurtenant structures and fittings. This system would tie in to the city owned gravity sewer in Congress Street. The pump installation, control panel and emergency generator transfer switch would be installed by contractors. The force main and gravity system would be installed by Water Resources construction staff. The retrofitted system would serve the needs of both Water Resources and Solid Waste. Additionally, wash down and other runoff flow would be captured and conveyed as an improvement to our site oriented stormwater BMP's.

**Project Title** ID 152331

Stormwater Retrofits on Riverside Street

**Water Resources**

**Division** Stormwater

**Classification** Wastewater

**Project Description**

This project, recommended in the Watershed Management Plan, involves installation of 3 small gravel wetland retrofits in failing or poorly-performing detention basins on two private parcels on Riverside Street. This small (10 AC) commercial catchment is 72% impervious and these retrofits will provide high quality stormwater treatment for almost half of that area

**Project Justification**

Capisic Brook does not meet State water quality standards and has been designated as an Urban Impaired Stream. Citing the link between developed land (i.e.: impervious area) and water quality impairment, the State developed an Impervious Cover TMDL for Capisic Brook that sets targets for reducing the impacts of stormwater runoff from developed areas. Under the Clean Water Act the City is required to develop and implement a plan for mitigating the impacts of stormwater runoff and restoring water quality in the brook. The Capisic Brook Watershed Management Plan was approved by the Maine Department of Environmental Protection and adopted by the City in December of 2012. Construction of this project would implement one of several structural stormwater retrofits listed in the watershed management plan and help reduce the impact of polluted stormwater runoff on the brook.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
		\$185,000		\$185,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2019		\$185,000			<input type="checkbox"/>
2020					<input type="checkbox"/>
2021					<input type="checkbox"/>
2022					<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$185,000			

**Other Funding Source Description**

**Operating Budget Impact**

A small amount of funding will be needed in the years leading up to this plan to address legal and planning issues associated with such a public-private partnership. However, this work will benefit future efforts of a similar nature.

**Project Title** ID 194905

Bell Street Sewer Replacement

**Water Resources**

**Division** Sewer

**Classification** Wastewater

**Project Description**

A section of sewer under Bell Street needs replacement due to inadequate soils which have led to the sewer to sag.

**Project Justification**

Since the pipe is sagging in multiple spots, it is prone to blockages. This sewer deficiency has led to a sanitary sewer overflow in the past. The pipe is over 20 foot deep and cannot be rehabilitated and requires full replacement.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
\$50,000		\$300,000		\$350,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2019		\$350,000			<input type="checkbox"/>
2020					<input type="checkbox"/>
2021					<input type="checkbox"/>
2022					<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$350,000			

**Other Funding Source Description**

**Operating Budget Impact**

**Project Title** ID 141794

Stormwater Infrastructure Improvements

**Water Resources**

**Division** Stormwater

**Classification** Streets/Sidewalks

**Project Description**

The project would involve the design and construction of added storm drainage piping, catch basins and other improvements addressing neighborhood street and property flooding issues as well as stormwater pipe failures. Project funds would be used within public rights of way, and within private property affecting public right of way, where existing drainage systems are inadequate.

**Project Justification**

The project funds would address on going complaints about drainage system deficiencies within the City's storm drainage system and addresses neighborhood issues that the Department receives request to correct from residents, City Councilors and or staff. The proposed storm water utility program if adopted would fund improvements and system corrections on a sustained basis.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
		\$1,600,000		\$1,600,000

**Funding Source**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>City Mgr Recommended</u>	<u>Funding Type</u>	<u>Approved</u>
2019		\$200,000			<input type="checkbox"/>
2020		\$200,000			<input type="checkbox"/>
2016		\$200,000	\$200,000		<input checked="" type="checkbox"/>
2017		\$200,000	\$200,000		<input checked="" type="checkbox"/>
2018		\$200,000	\$200,000		<input checked="" type="checkbox"/>
2021		\$200,000			<input type="checkbox"/>
2022		\$200,000			<input type="checkbox"/>
2023		\$200,000			<input type="checkbox"/>
<b>Total</b>		\$1,600,000	\$600,000		

**Other Funding Source Description**

**Operating Budget Impact**

**Project Title** ID 141056

wr1 Street Sweepers Replacement

**Vehicle Maintenance**

**Division** Sewer Fund

**Classification** Vehicles

**Project Description**

Must replace 1 street sweeper per year to maintain the fleet

**Project Justification**

scheduled replacements

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
			\$1,780,000	\$1,780,000

**Funding Request**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>Approved Funding</u>	<u>Funding Type</u>	<u>Approved</u>
2015		\$175,000	\$175,000		<input checked="" type="checkbox"/>
2016		\$175,000	\$175,000		<input checked="" type="checkbox"/>
2017		\$195,000	\$195,000		<input checked="" type="checkbox"/>
2018		\$215,000	\$215,000		<input checked="" type="checkbox"/>
2019		\$270,000			<input type="checkbox"/>
2014		\$165,000	\$165,000		<input checked="" type="checkbox"/>
2020		\$195,000			<input type="checkbox"/>
2021		\$195,000			<input type="checkbox"/>
2022		\$195,000			<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$1,780,000	\$925,000		

**Other Funding Source Description**

**Operating Budget Impact**

Decreased maintenance costs

**Project Title** ID 141209

wr2 Catch Basin Cleaning Vehicle Replacement - Sewer 3127

**Vehicle Maintenance**

**Division** Sewer Fund

**Classification** Vehicles

**Project Description**

2001, 35000 gvw truck w/ stetco, plow

**Project Justification**

scheduled replacement

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
			\$200,000	\$200,000

**Funding Request**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>Approved Funding</u>	<u>Funding Type</u>	<u>Approved</u>
2017		\$100,000			<input checked="" type="checkbox"/>
2019		\$100,000			<input type="checkbox"/>
2020					<input type="checkbox"/>
2021					<input type="checkbox"/>
2022					<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$200,000			

**Other Funding Source Description**

**Operating Budget Impact**

**Project Title** ID 194951

Back Cove South Storage Tank

**Water Resources**

**Division** Sewer

**Classification** Wastewater

**Project Description**

A storage tank to be installed in the fields at Back Cove Park to capture and hold combined sewer overflow during rain events, for treatment after the storm subsides.

**Project Justification**

The installation of a storage conduit or tank is required by the Maine Department of Environmental Protection through the Combined Sewer Overflow permit issued to the City of Portland.

**5 Year Cost Summary**

<u>Planning</u>	<u>Land</u>	<u>Construction</u>	<u>Equipment</u>	<u>Est Total Cost</u>
		\$8,000,000		\$8,000,000

**Funding Request**

<u>Year</u>	<u>Other Funding</u>	<u>Requested Funding</u>	<u>Approved Funding</u>	<u>Funding Type</u>	<u>Approved</u>
2019					<input type="checkbox"/>
2020		\$8,000,000			<input type="checkbox"/>
2021					<input type="checkbox"/>
2022					<input type="checkbox"/>
2023					<input type="checkbox"/>
<b>Total</b>		\$8,000,000			

**Other Funding Source Description**

**Operating Budget Impact**