# City of Benicia



# **Capital Improvement Program**

Fiscal Years 2019/20 - 2023/ 24









Public Works Engineering Division Adopted – May 28, 2019



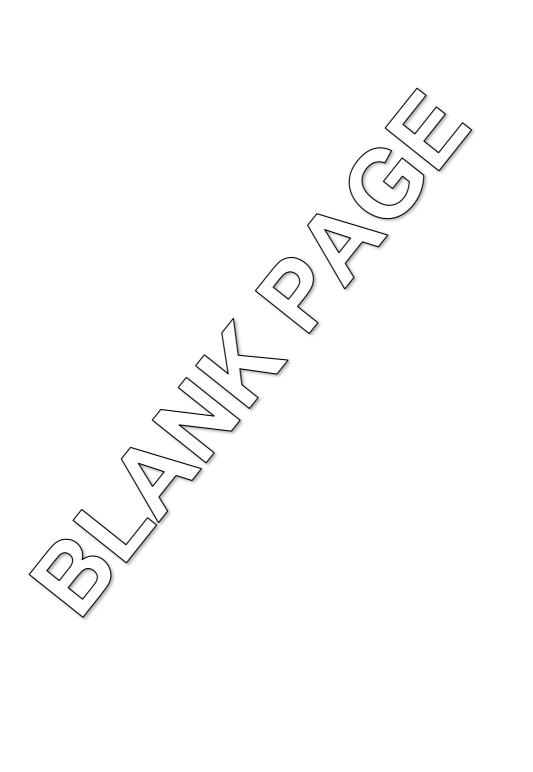
### FY19/20 - 23/24 CAPITAL IMPROVEMENT PROGRAM

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#### Section 1 – Introduction

The Capital Improvement Program (CIP) document is a planning tool used to identify, anticipate, and prioritize capital projects and associated funding needs over a five-year period. It provides information to decision-makers that allows them to review, coordinate and approve the funding and timing of needed improvements in a way that maximizes the efficient utilization of public funds.

#### A CIP provides the following benefits:

- Allows systematic evaluation of all potential projects at the same time.
- Assists City staff in projecting future requirements for personnel and equipment in the development of department programs and the City's operating budget.
- Consolidates projects and budget for CIP projects.
- Educates the public regarding capital improvement needs, costs and timing.
- Identifies potential funding gaps for projects needed to ensure the proper care, improvement and safety of the City's infrastructure.
- Identifies the various revenue sources to be used for funding the projects. (e.g.-General Fund, grants, developer fees, etc.)
- Prioritizes the City of Benicia's infrastructure needs while ensuring the efficient use of public funds.
- Provides an opportunity to foster cooperation among departments and an ability to inform other units of government such as Solano Transportation Authority (STA) of the City of Benicia's priorities.
- Provides information needed to meet the requirements of Federal and State laws and grants.
- Provides the basis and information needed for establishing water and wastewater rates.

The CIP is a dynamic document that will be updated every two years, by adding two program years, identifying new projects, and re-prioritizing all projects. The Engineering Division has developed this update to the CIP project list with input from the various City Departments through meetings and discussions. The identified projects were selected to make the best use of the City's limited resources.

The CIP includes projects which are not fully funded. These projects include various maintenance, parks, City facilities, and construction projects. The unfunded projects highlight the need to identify additional or supplemental funding sources, or to defer the projects until funding is identified and approved. Potential supplemental funding sources include donations from user groups, grants, Measure C or the General Fund.

#### Relationship between CIP and the Biennial Operating Budget

The CIP is used to inform the approval of capital projects as part of the two-year budget process. The first two years of the CIP are incorporated into the Biennial Budget as the Capital Budget, which appropriates funds for specific facilities, improvements, and studies. Projects identified in the first two years of the CIP are approved and funded by a separate City Council action approving the Biennial Operating Budget.

Projects identified in years three to five of the CIP are informational and intended to provide a forecast for projects and funding that will be requested in future budget cycles. They are approved for planning purposes only and do not receive expenditure authority until they are eventually incorporated into a Biennial Operating Budget. Biennially when the CIP is reviewed, the CIP projects are updated and moved forward two years and the previous third and fourth years of the CIP, as modified and after review and approval, are incorporated into the new Biennial Operating Budget.

#### Relationship Between Operating and Capital Budgets

The Operating Budget is distinguished from the Capital Budget in that it only includes expenses that are generally of a recurring nature. It provides for the provision of all services, but does not result in construction of any major physical assets. Year-to-year changes in the operating budget are expected to be fairly stable, and represent incremental changes in the cost of doing business, and in the types and levels of services provided. Resources for the operating budget are generally provided by taxes, user fees, and intergovernmental payments that generally recur from year to year.

In contrast, the Capital Budgets are one-time in nature and as such may fluctuate over time as available revenues and needs change.

The operating and capital budgets are closely linked. The most obvious connection is the fact that the operating budget assumes the cost of maintaining and operating new facilities and improvements that are built under the Capital Budget. Some capital improvements may also decrease annual maintenance costs.

# Section 2 – Capital Improvement Program Goals, Objectives, and Guidelines

City of Benicia's Vision: To work together to build a sustainable community and enhance the City's overall quality of life. The CIP strives to promote the City's Vision by enhancing the quality of community living, providing asset management and discretionary capital projects that support the following strategic goals:

- Protect community and environment health and safety
- Protect and enhancing the environment
- Strengthen economic and fiscal conditions
- Preserve and enhancing infrastructure
- Maintain and enhance a high quality of life

The following guidelines are considered when deciding whether or not to include a project within the CIP:

- It has a long, useful life (over five years) or significantly extends the useful life of an existing fixed asset.
- It has a cost of over \$50,000 and is not of a routine nature.
- It serves an essential public purpose.
- It is fixed in place or stationary (equipment and vehicles that are mobile would usually not be included in the CIP).
- It is related to government functions and expenditures.
- It is a usual responsibility of a local government.



#### Section 3 – CIP Details

<u>Proposed FY19/20-23/24 CIP Projects</u>
The detailed lists of proposed Capital projects by categories is provided in Table 1-5. (Projects with no budget shown for all five years is a place holder).

Table 1 – Facilities & Parks 19/20-23/24 CIP Detail

Facilities & Parks	Droiget	FV 10/20	EV 20/21	FV 21/22	EV 22/22	EV 22/24	Total
Project Name	Project No.	FY 19/20	FY 20/21	FY 21/22	FY 22/23	FY 23/24	Total
Vacille Asil' 'La Osadan	DD 001	Φ0	Φ0	Φ0	Φ0	<b># 40,000</b>	# 40 000
Youth Activity Center Improvements	BR-001	\$0	\$0	\$0	\$0	\$40,000	\$40,000
New Police Facility	BR-004	\$0	\$0	\$0	\$0	\$0	\$0
Library Basement Completion	BR-006	\$598,000	\$0	\$0	\$0	\$0	\$598,000
City Gym Improvements (next to Police Station)	BR-008	\$0	\$0	\$0	\$0	\$550,000	\$550,000
Community Center-Play Yard	BR-010	\$60,000	\$0	\$0	\$0	\$0	\$60,000
James Lemos Swim Center - Boiler Replacement	BR-26	\$240,300	\$0	\$0	\$0	\$0	\$240,300
City Hall Exterior Paint	BR-27	\$0	\$0	\$60,000	\$0	\$0	\$60,000
Community Park Ballfield Lights	BR-28	\$0	\$0	\$540,000	\$0	\$0	\$540,000
Fitzgerald Field Bleachers	MC-016	\$0	\$1,150,000	\$0	\$0	\$0	\$1,150,000
Library Exterior Improvement	MC-017	\$95,520	\$955,200	\$0	\$0	\$0	\$1,050,720
Gazebo Replacement Project	MC-019	\$175,000	\$0	\$0	\$0	\$0	\$175,000
Benicia Community Park- Pathway Improvement Project	P-006	\$0	\$0	\$0	\$0	\$500,000	\$500,000
Willow Glen Park-Pathway Improvement Project	P-009	\$0	\$0	\$0	\$100,000	\$0	\$100,000
West Ninth Street Park- Pathway Improvement Project	P-010	\$0	\$0	\$150,000	\$0	\$0	\$150,000
Parks Master Plan Update	P-012	\$0	\$0	\$250,000	\$0	\$0	\$250,000
Civic Center Park-Restroom Replacement Project	P-016	\$0	\$0	\$0	\$175,000	\$0	\$175,000
City Cemetery-Fence Improvement Project	P-020	\$0	\$0	\$0	\$200,000	\$0	\$200,000
Matthew Turner Park- Parking Lot Resurfacing	P-033	\$0	\$0	\$0	\$0	\$350,000	\$350,000
Urban Waterfront Enhancement and Master Plan	P-042	\$0	\$0	\$700,000	\$0	\$0	\$700,000
Replacement of Softball Light Poles at BMS	P-048	\$0	\$0	\$500,000	\$0	\$0	\$500,000
Fire Station 11 Flooring (Upstairs & Downstairs)	FD-003	\$0	\$0	\$50,000	\$0	\$0	\$50,000
Replace Bauer Compressor at Fire Station 11	FD-004	\$0	\$0	\$65,000	\$0	\$0	\$65,000
Fire Station 11 & 12 Floor Epoxy	FD-005	\$0	\$0	\$65,000	\$0	\$0	\$65,000
Total		\$1,168,820	\$2,105,200	\$2,380,000	\$475,000	\$1,440,000	\$7,569,020

Table 2 – Information Technology 19/20-23/24 CIP Detail

Information Technology										
Project Name	Project No.	FY 19/20	FY 20/21	FY 21/22	FY 22/23	FY 23/24	Total			
Broadcast Studio Upgrade to Council Chambers	MP-019	\$0	\$0	\$150,000	\$0	\$0	\$150,000			
Replace Backup Server Barracuda - City Hall	MP-022	\$50,000	\$0	\$0	\$0	\$0	\$50,000			
Centralized UPS for City Hall Server Room	MP-023	\$60,000	\$0	\$0	\$0	\$0	\$60,000			
Total		\$110,000	\$0	\$150,000	\$0	\$0	\$260,000			

Table 3 - Streets 19/20-23/24 CIP Detail

Streets							
Project Name	Project No.	FY 19/20	FY 20/21	FY 21/22	FY 22/23	FY 23/24	Total
Citywide Street	MC-028	\$646,500	\$1,939,500	\$1,192,500	\$3,577,500	\$1,222,500	\$8,578,500
Resurfacing Program							
Paint Benches & Street Lights at First Street	MP-126	\$0	\$0	\$0	\$0	\$88,000	\$88,000
Columbus Parkway	T-009	\$0	\$0	\$900,000	\$0	\$0	\$900,000
Widening							
E. B St. Improvements (East of E. 2nd St.)	T-011	\$0	\$0	\$0	\$0	\$800,000	\$800,000
W. 7th St./Military West Intersection Modification	T-041	\$253,080	\$0	\$0	\$0	\$0	\$253,080
East 5th Street at Vecino Roadway Improvements	T-065	\$369,000	\$0	\$0	\$0	\$0	\$369,000
ATP Funded Safe Routes to School Project	T-115	\$904,314	\$0	\$0	\$0	\$0	\$904,314
OBAG2 Park Road Improvement Project	T-120	\$395,308	\$4,804,692	\$0	\$0	\$0	\$5,200,000
Storm Damage Repair Projects	T-122	\$0	\$184,031	\$1,042,843	\$0	\$0	\$1,226,874
Grant Street Bridge Repairs	T-123	\$0	\$0	\$0	\$50,000	\$0	\$50,000
Sidewalk Program & ADA Upgrade	T-124	\$75,000	\$75,000	\$75,000	\$75,000	\$75,000	\$375,000
Annual Traffic Calming Projects	T-126	\$0	\$0	\$125,000	\$125,000	\$125,000	\$375,000
East 2nd St. Bridge Repair	T-132	\$0	\$0	\$0	\$0	\$1,650,000	\$1,650,000
Park Road Bridge Repair	T-133	\$0	\$0	\$0	\$0	\$1,650,000	\$1,650,000
West Channel Bridge Repair	T-135	\$0	\$0	\$0	\$0	\$1,650,000	\$1,650,000
HSIP Pedestrian Crossing Improvement Project	T-137	\$259,100	\$0	\$0	\$0	\$0	\$259,100
HSIP Guardrail Replacement Project	T-138	\$135,000	\$861,000	\$0	\$0	\$0	\$996,000
Total		\$3,037,302	\$7,864,223	\$3,335,343	\$3,827,500	\$7,260,500	\$25,324,868

**Table 4 – Water 19/20-23/24 CIP Detail** 

Water										
Project Name	Project No.	FY 19/20	FY 20/21	FY 21/22	FY 22/23	FY 23/24	Total			
Master Plan Update	WO-016	\$275,000	\$0	\$0	\$0	\$0	\$275,000			
P-2 Pump Station Motor Control Center Replacement	WO-024	\$300,000	\$0	\$0	\$0	\$0	\$300,000			
Treated Water Flowmeter Replacement Project	WO-059	\$200,000	\$0	\$0	\$0	\$0	\$200,000			
Drolette Way 8-inch Reliability Loop	WO-081	\$0	\$51,000	\$0	\$0	\$0	\$51,000			
W 7th St 12-inch Water Main & PRV Imprv (50%)	WO-082	\$145,000	\$812,000	\$0	\$0	\$0	\$957,000			
Recoating of R2 Reservoir	WO-091	\$462,000	\$0	\$0	\$0	\$0	\$462,000			
Chlorine Gas Conversion Project	WO-101	\$1,600,000	\$0	\$0	\$0	\$0	\$1,600,000			
Water Line Replacement Program	WO-102	\$460,000	\$460,000	\$460,000	\$460,000	\$460,000	\$2,300,000			
Cordelia Transmission Main Replacement	WO-109	\$0	\$0	\$0	\$350,000	\$4,350,000	\$4,700,000			
Cordelia 24" Transmission Main Isolation Valves	WO-117	\$0	\$150,000	\$0	\$0	\$0	\$150,000			
Raw Water Transm. Line Air Relief Valves (27)	WO-120	\$0	\$0	\$0	\$0	\$75,000	\$75,000			
Backwash Pump #3, 200HP motor, 12,000 gpm pump	WO-121	\$0	\$0	\$0	\$0	\$20,000	\$20,000			
Valero Magmeter Flow Meters	WO-122	\$0	\$105,000	\$0	\$0	\$0	\$105,000			
12" Water Main in West 7th for Zone 3	WO-139	\$0	\$0	\$0	\$0	\$220,000	\$220,000			
Water Treatment Plant Ozone Treatment	WO-141	\$0	\$0	\$1,000,000	\$3,500,000	\$23,100,000	\$27,600,000			
Total		\$3,442,000	\$1,578,000	\$1,460,000	\$4,310,000	\$28,225,000	\$39,015,000			

Table 5 - Wastewater 19/20-23/24 CIP Detail

Wastewater							
Project Name	Project No.	FY 19/20	FY 20/21	FY 21/22	FY 22/23	FY 23/24	Total
Water Reuse Project	WWO-010	\$0	\$0	\$0	\$0	\$33,100,000	\$33,100,000
Sewer Master Plan Update	WWO-013	\$275,000	\$0	\$0	\$0	\$0	\$275,000
Cathodic Protection Improvements	WWO-014	\$100,000	\$440,000	\$0	\$0	\$0	\$540,000
Digester Cleaning	WWO-018	\$0	\$200,000	\$0	\$0	\$0	\$200,000
Modify Belt Filter Press	WWO-021	\$0	\$0	\$100,000	\$0	\$0	\$100,000
Overhaul Natural Gas Genset	WWO-025	\$0	\$0	\$0	\$100,000	\$0	\$100,000
E. 7th St. Sewerline Replacement	WWO-032	\$276,000	\$0	\$0	\$0	\$0	\$276,000
Boiler Replacement	WWO-046	\$0	\$0	\$540,000	\$0	\$0	\$540,000
Bayshore Road Gravity Main Rehabilitation	WWO-052	\$911,000	\$0	\$0	\$0	\$0	\$911,000
Chemical Tank Replacement at WWTP	WWO-058	\$0	\$0	\$100,000	\$0	\$0	\$100,000
Influent Pumps Rehabilitation	WWO-060	\$0	\$0	\$100,000	\$520,000	\$0	\$620,000
Bayshore Road Forcemain Sanitary Sewer Crossovers	WWO-061	\$560,000	\$0	\$0	\$0	\$0	\$560,000
East Channel Road Sewerline Improvement Project	WWO-063	\$230,000	\$3,490,000	\$0	\$0	\$0	\$3,720,000
Recoat Concrete Channels	WWO-076	\$487,000	\$0	\$0	\$0	\$0	\$487,000
West H Pipeline Replacement	WWO-080	\$283,000	\$0	\$0	\$0	\$0	\$283,000
El Bonito Way Force Main Replacement	WWO-081	\$60,000	\$0	\$0	\$0	\$0	\$60,000
Sewer Line Replacement Program	WWO-082	\$200,000	\$650,000	\$650,000	\$650,000	\$650,000	\$2,800,000
Lift Station Upgrades	WWO-090	\$0	\$90,000	\$504,000	\$0	\$0	\$594,000
Gas Box	WWO-091	\$0	\$0	\$125,000	\$700,000	\$0	\$825,000
Solids Building Platforms (Belt Press & Cyclones)	WWO-092	\$211,000	\$0	\$0	\$0	\$0	\$211,000
Digester Gas Line above ground (digester to flare)	WWO-093	\$0	\$40,000	\$280,000	\$0	\$0	\$320,000
Rake Shaftless Screw	WWO-095	\$0	\$0	\$75,000	\$0	\$0	\$75,000
Total		\$3,593,000	\$4,910,000	\$2,474,000	\$1,970,000	\$33,750,000	\$46,697,000

#### Project Code

BR	Building Renovations
FD	Fire Department
MC	Measure C
MP	Misc. Project
Р	Parks
T	Transportation
WO	Water Operation
WWO	Wastewater Operation

#### **Section 4 – Funding Sources**

The Capital Improvement Program has been historically financed by a combination of development impact fees, State allocated gas tax funds, State and Federal grants, various other intergovernmental funding, and, internal interfund borrowing. The funding sources consist of the following:

- Gas Tax (GAS): consists of funds provided to the City through tax revenues for roadway improvements throughout the City.
- **General Fund (GF)**: consists of funds from the City's general funds collected through daily operations and property taxes, etc.
- Grant or Funded by Third Party (G): Safety Improvement Program (HSIP), Safe Routes to School (SR2S) and Surface Transportation Program (STP); Transportation Demand Act (TDA) Grant; Metropolitan Transportation Commission Planned Development Area (PDA) Grant; One Bay Area Grant (OBAG); and Stormwater Funds (National Pollutant Discharge Elimination System).
- Landscape and Lighting Assessment District Fund (LL): consists of funds
  collected from residents and businesses of Benicia as an assessment through
  property taxes for use in specific zones as well as the City's overall medians and
  public right-of-way as defined by the Assessment Districts.
- **Measure C (MC)**: consists of funds provided to the City through voter approved sales tax measure for general improvements throughout the City.
- Other (O): Miscellaneous funds or one-time monies.
- Park Dedication Fee Fund (P): consists of funds collected from developers for mitigation measures to alleviate the impact of the new development to be used for improvements and maintenance of City Parks.
- **Senate Bill 1/RMRA (SB1)**: consists of funds provided to the City through Senate Bill 1 for roadway improvements throughout the City.
- Traffic Impact Fee Fund (TIF): consists of funds collected from developers for mitigation measures to alleviate the impact of the new development and used for roadway and traffic circulation and traffic signal improvements throughout the City.
- Unfunded (UF): consists of projects that currently do not have any funding identified.
- Wastewater Operations Fund (WWO): consists of wastewater enterprise fund.
- Wastewater Capacity Fees (WWC): consists of developer impact fees.
- Water Operations Fund (WO): consists of water enterprise fund.
- Water Capacity Fund (WC): consists of developer impact fees.

#### FY19/20 – 23/24 Capital Improvement Program by Different Funding Source

Capital Improvement Projects are funded either from a single funding source or from a variety of funding sources. Table 6. Below shows Capital Improvement Projects funded from the different sources.

Table 6 - Projecto	4 EV10/20-23/24	CIP Spending	by Funding Source
Table 6 - Projecte	U F119/20-23/24	CIP Spending	by runding Source

Funding Source Summary FY'19/20-23/24										
Source	'19/20	'20/21	'21/22	'22/23	'23/24	Total				
Gas Tax (GAS)	\$289,100	\$575,000	\$225,000	\$625,000	\$225,000	\$1,939,100				
General Fund (GF)	\$410,300	\$0	\$150,000	\$0	\$0	\$560,300				
Grant or Funded by Third Party (G)	\$2,181,394	\$3,951,031	\$927,121	\$25,000	\$25,000	\$7,109,546				
Measure C (MC)	\$822,328	\$4,498,392	\$850,000	\$2,025,000	\$675,000	\$8,870,720				
Other (O)	\$378,000	\$240,000	\$80,000	\$240,000	\$80,000	\$1,018,000				
Senate Bill 1/RMRA (SB1)	\$235,000	\$705,000	\$262,500	\$787,500	\$292,500	\$2,282,500				
Traffic Impact Fee Fund (TIF)	\$0	\$0	\$700,000	\$0	\$0	\$700,000				
Unfunded (UF)	\$0	\$0	\$3,670,722	\$4,450,000	\$67,953,000	\$76,073,722				
Wastewater Capacity Fund (WWC)	\$367,500	\$3,580,000	\$629,000	\$700,000	\$0	\$5,276,500				
Wastewater Operations Fund (WWO)	\$3,225,500	\$1,330,000	\$1,845,000	\$1,270,000	\$650,000	\$8,320,500				
Water Capacity Fund (WC)	\$210,000	\$406,000	\$0	\$0	\$0	\$616,000				
Water Operations Fund (WO)	\$3,232,000	\$1,172,000	\$460,000	\$460,000	\$775,000	\$6,099,000				
Grand Total	\$11,351,122	\$16,457,423	\$9,799,343	\$10,582,500	\$70,675,500	\$118,865,888				

The Five Year CIP total cost in the amount of \$118,865,888 is funded by the sources as shown in the above table and graph below. Of the \$118.9 million in identified capital projects, funding sources have been identified for \$42.6 million of the project costs leaving a current project funding shortfall of \$76.3 million. Two projects in the undetermined funding category, the Water Treatment Plant Ozone Project (\$27.8 million) and the Water Reuse Project (\$33.1 million) account for nearly 80% of the \$76.3 million funding shortfall.

#### CIP BY FUNDING SOURCE FY19/20 - 23/24

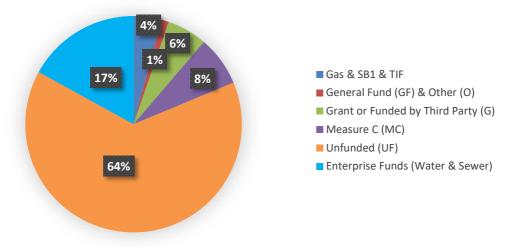


Figure 1. CIP by Funding Sources for FY 19/20-23/24 (\$118,865,888)

#### FY19/20 – 20/21 Capital Improvement Program by Different Funding Source

The total expenditures for the first two years of the CIP (FY19/20 and FY 20/21) are \$27,443,245. Of the \$27,443,245 identified capital projects, funding sources have been identified for the projects as shown in the table and graph below.

Table 7 - Projected FY19/20-20/21 CIP Spending by Funding Source

Funding Source Summary FY'19/20-22/21										
Source	'19/20	'20/21	Total							
Gas & SB1 & TIF	\$524,100	\$1,280,000	\$1,804,100							
General Fund (GF) & Other (O)	\$788,300	\$240,000	\$788,000							
Grant or Funded by Third Party (G)	\$2,181,394	\$3,951,031	\$6,132,425							
Measure C (MC)	\$822,328	\$4,498,392	\$5,320,720							
Enterprise Funds (Water & Sewer)	\$7,035,000	\$6,488,000	\$13,523,000							
Unfunded (UF)	\$0	\$0	\$0							
Grand Total	\$11,351,122	\$16,457,423	\$27,808,545							

Figure 2 below, shows that in the funded years (first two years) 49% of \$27.6M are from Enterprise Funds (Water and Wastewater Funds) while the remaining 51% are from grants, Measure C, General Fund, and Other Fund.

#### CIP BY FUNDING SOURCE FY19/20 - 20/21

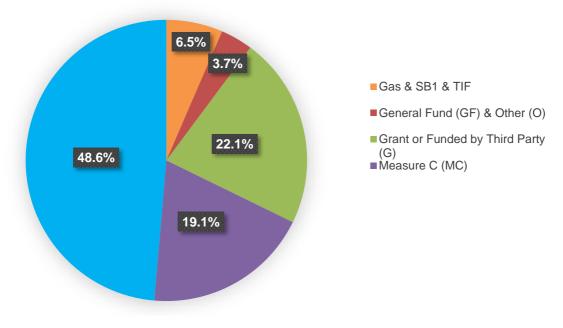


Figure 2. CIP by Funding Sources for FY 19/20-20/21 (\$27,808,545)

#### FY19/20 - 23/24 Informational Technology CIP by Different Funding Source

The total CIP cost for Information Technology in FY19/20 – FY23/24 is \$260,000 and is 100% funded by General Fund as shown in the table and graph below.

Table 8 – Information Technology by Funding Source for FY19/20-23/24

Information Technology	'19/20	'20/21	'21/22	'22/23	'23/24	Total
General Fund (GF)	\$110,000	\$0	\$150,000	\$0	\$0	\$260,000
Total	\$110,000	\$0	\$150,000	\$0	\$0	\$260,000

Figure 3 below, shows the funding sources for Information Technology projects in the next five years. The figure illustrates that 100% of the Information Technology project costs have funding and no funding shortfall.

#### IT CIP BY FUNDING SOURCE FY19/20 - 23/24

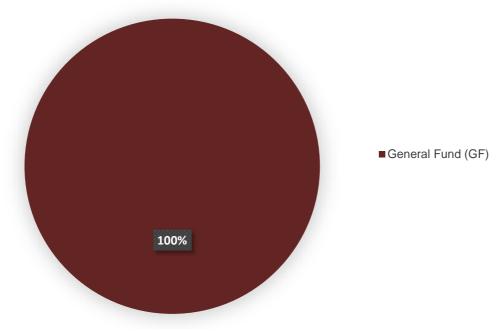


Figure 3. IT CIP by Funding Sources for FY 19/20-23/24 (\$260,000)

#### FY19/20 - 23/24 Facilities and Parks CIP by Different Funding Source

The total CIP cost for Facilities and Parks in FY19/20 – FY23/24 is \$7,569,020 and is funded by the sources as shown in the table and graph below.

Table 9 – Facilities & Parks by Funding Source for FY19/20-23/24

Facilities & Parks	'19/20	'20/21	'21/22	'22/23	'23/24	Total
General Fund (GF)	\$300,300	\$0	\$0	\$0	\$0	\$60,000
Grant or Funded by Third Party (G)	\$300,000	\$150,000	\$0	\$0	\$0	\$450,000
Measure C (MC)	\$270,520	\$1,955,200	\$175,000	\$0	\$0	\$2,225,720
Other (O)	\$298,000	\$0	\$0	\$0	\$0	\$298,000
Unfunded (UF)	\$0	\$0	\$2,205,000	\$475,000	\$1,440,000	\$4,360,300
Total	\$1,168,820	\$2,105,200	\$2,380,000	\$475,000	\$1,440,000	\$7,569,020

Figure 4 below, shows the funding sources for Facilities and Parks projects in the next five years. The figure illustrates that 43% of the Facilities and Parks project costs have funding, while 57% are unfunded.

# FACILITIES AND PARKS CIP BY FUNDING SOURCE FY19/20 - 23/24

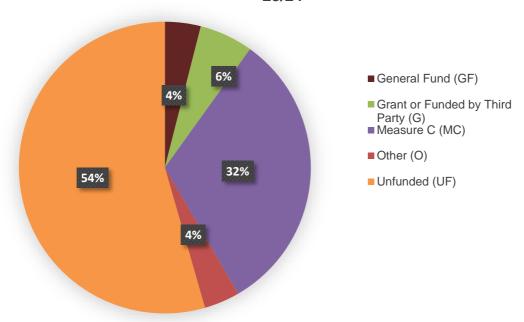


Figure 4. Facilities & Parks CIP by Funding Sources for FY 19/20-23/24 (\$7,569,020)

#### FY19/20 - 23/24 Streets CIP by Different Funding Source

The total CIP cost for Streets in FY19/20 – FY23/24 is \$25,342,868 and is funded by the sources as shown in the table and graph below.

Table 10 - Streets by Funding Source for FY19/20-23/24

Streets	'19/20	'20/21	'21/22	'22/23	'23/24	Total
Gas Tax (GAS)	\$289,100	\$575,000	\$225,000	\$625,000	\$225,000	\$1,939,100
Grant or Funded by Third Party (G)	\$1,881,394	\$3,801,031	\$927,121	\$25,000	\$25,000	\$6,659,546
Measure C (MC)	\$551,808	\$2,543,192	\$675,000	\$2,025,000	\$675,000	\$6,470,000
Other (O)	\$80,000	\$240,000	\$80,000	\$240,000	\$80,000	\$720,000
Senate Bill 1/RMRA (SB1)	\$235,000	\$705,000	\$262,500	\$787,500	\$292,500	\$2,282,500
Traffic Impact Fee Fund (TIF)	\$0	\$0	\$700,000	\$0	\$0	\$700,000
Unfunded (UF)	\$0	\$0	\$465,722	\$125,000	\$5,963,000	\$6,553,722
Total	\$3,037,302	\$7,864,223	\$3,335,343	\$3,827,500	\$7,260,500	\$25,324,868

Figure 5 below, shows the funding sources for Streets projects in the next five years. The figure illustrates that 74% of the Street project costs have funding, while 26% are unfunded.

#### STREETS CIP BY FUNDING SOURCE FY19/20 - 23/24

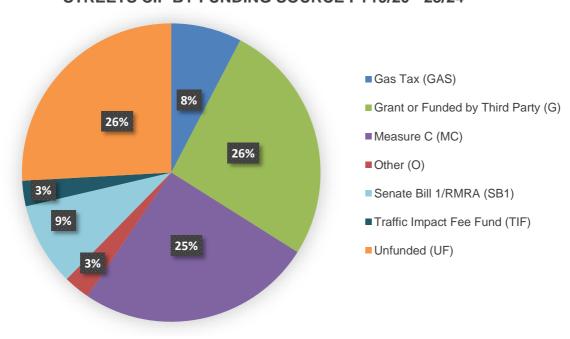


Figure 5. Streets CIP by Funding Sources for FY 19/20-23/24 (\$25,324,868)

#### FY19/20 - 23/24 Wastewater CIP by Different Funding Source

The total CIP cost for Wastewater in FY19/20 – FY23/24 is \$46,972,000 and is funded by the sources as shown in the table and graph below.

Table 11 - Wastewater by Funding Source for FY19/20-23/24

Wastewater	'19/20	'20/21	'21/22	'22/23	'23/24	Total
Wastewater Capacity Fund (WWC)	\$367,500	\$3,580,000	\$629,000	\$700,000	\$0	\$5,276,500
Wastewater Operations Fund (WWO)	\$3,225,500	\$1,330,000	\$1,845,000	\$1,270,000	\$650,000	\$8,320,500
Unfunded (UF)	\$0	\$0	\$0	\$0	\$33,100,000	\$33,100,000
Total	\$3,593,000	\$4,910,000	\$2,474,000	\$1,970,000	\$33,750,000	\$46,697,000

Figure 6 below, shows the funding sources for wastewater projects in the next five years. The figure illustrates that 29% of the wastewater project costs have funding, while 71% are unfunded.

#### WASTEWATER CIP BY FUNDING SOURCE FY19/20 - 23/24

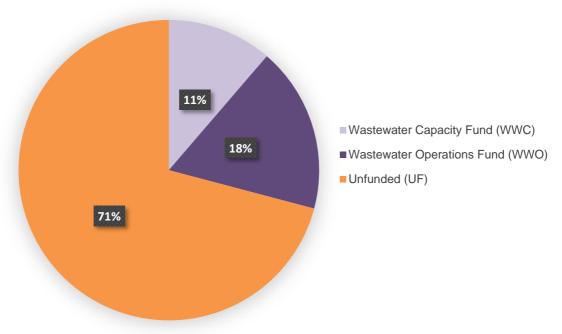


Figure 6. Wastewater CIP by Funding Sources for FY 19/20-23/24 (\$46,972,000)

#### FY19/20 - 23/24 Water CIP by Different Funding Source

The total CIP cost for Water in FY19/20 – FY23/24 is \$38,740,000 and is funded by the sources as shown in the table and graph below.

Figure 7 below, shows the funding sources for water projects in the next five years. The figure illustrates that 17% of the water project costs have funding, while 83% are unfunded.

Table 12 - Water by Funding Source for FY19/20-23/24

Water	'19/20	'20/21	'21/22	'22/23	'23/24	Total
Water Capacity Fund (WC)	\$210,000	\$406,000	\$0	\$0	\$0	\$616,000
Water Operations Fund (WO)	\$3,232,000	\$1,172,000	\$460,000	\$460,000	\$775,000	\$6,099,000
Unfunded (UF)	\$0	\$0	\$1,000,000	\$3,850,000	\$27,450,000	\$32,300,000
Total	\$3,442,000	\$1,578,000	\$1,460,000	\$4,310,000	\$28,225,000	\$39,015,000

#### WATER CIP BY FUNDING SOURCE FY19/20 - 23/24

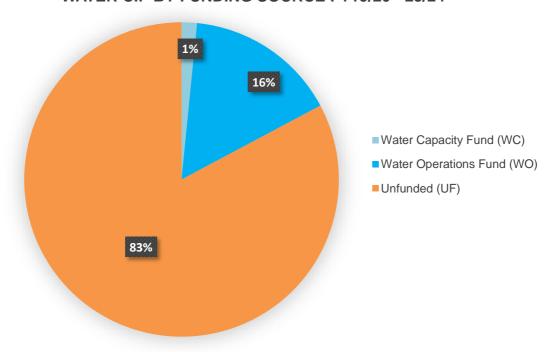


Figure 7. Water CIP by Funding Sources for FY 19/20-23/24 (\$38,740,000)

#### Section 5 - CIP Project Categories

The capital projects proposed for the next five years are organized into five categories of capital projects. The cost estimates developed for all capital projects are in 2019 dollars and are summarized by project category in Table 8. Of the total capital projects in the next five, over 70% of the proposed costs are from Water and Wastewater projects as shown in Figure 8. In the funded years (first two years), enterprise (Water and Wastewater) and Streets projects account for approximately 50% and 40% of the project cost, respectively as shown in Figure 9.

Table 13 - Projected 19/20-23/24 CIP Needs by Categories

Capital Improvement Program by Category						
Category	'19/20	'20/21	'21/22	'22/23	'23/24	Total
Facilities & Parks	\$1,168,820	\$2,105,200	\$2,380,000	\$475,000	\$1,440,000	\$7,569,020
Informational Technology	\$110,000	\$0	\$150,000	\$0	\$0	\$260,000
Streets	\$3,037,302	\$7,864,223	\$3,335,343	\$3,827,500	\$7,260,500	\$25,324,868
Water	\$3,442,000	\$1,578,000	\$1,460,000	\$4,310,000	\$28,225,000	\$39,015,000
Wastewater	\$3,593,000	\$4,910,000	\$2,474,000	\$1,970,000	\$33,750,000	\$46,697,000
Grand Total	\$11,351,122	\$16,457,423	\$9,799,343	\$10,582,500	\$70,675,500	\$118,865,888

#### CIP PROJECT CATEGORIES BY PERCENT FY 19/20 - 23/24

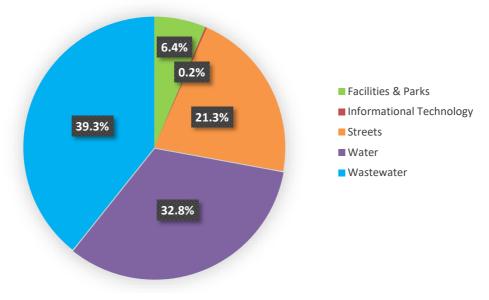


Figure 8. CIP by Category for FY 19/20-23/24 (\$)

#### CIP PROJECT CATEGORIES BY PERCENT FY 19/20 - 20/21

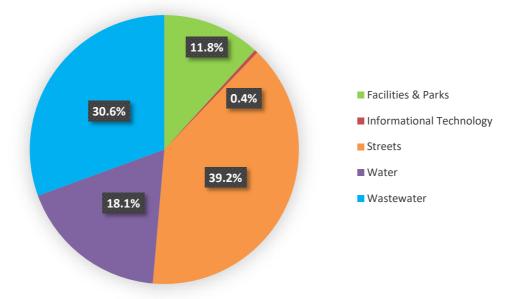


Figure 9. CIP by Category for FY 19/20-20/21 (\$27,808,545)

#### Facilities & Parks

Facilities and Parks projects preserve the value of the City's prior capital investments, providing long-term programmed maintenance of City infrastructure and facilities. These assets include 35 City-owned buildings of varying sizes and complexity, 211 developed park and landscaped areas, one 577-acre community park, one City-owned cemetery, one aquatic facility, and one community center, 68 open space assess areas, and five landscape and lighting districts.

Proper preservation of the City's existing assets is a priority, because preserving these major investments in facilities allows our programs of service to the community to continue successfully while providing long-term savings.

Asset management projects funded by the CIP are differentiated from more regular maintenance projects funded by the City's operating budget in accordance with the capital project guidelines discussed in Section 2.

Facilities and Parks funding sources include the General Fund, Measure C, and grant funds.

#### Informational Technology

Informational Technology projects include maintaining network connectivity, hardware and software upgrades, and network security. Informational Technology funding sources include the General Fund and Measure C.

#### Streets Projects

Streets projects include street construction or reconstruction, traffic management improvements, signal improvements, pedestrian accessibility, and bicycle facility upgrades. Transportation funding sources include the Gas Tax & Senate Bill 1, Measure C, Traffic Impact Fees, Safety Improvement Program (HSIP), Safe Routes to School (SR2S) and Surface Transportation Program (STP); Transportation Demand Act (TDA) Grant; Metropolitan Transportation Commission Planned Development Area

(PDA) Grant; One Bay Area Grant (OBAG), and other similar transportation grant funds.

#### **Water**

Water Projects include construction, reconstruction, master planning and equipment replacements for the City's water treatment plant, transmission system, and distribution system. The City owns and operate one water treatment plant with the capacity to treat 12 million gallons per day, 18 miles of transmission line with two pump stations, and approximately 150 miles of pipeline with three pump stations and eight pressure-reducing valve stations. The City also owns and operates a water storage system consisting of five treated water reservoirs and Lake Herman with a capacity of 1,800 acre-feet. Water funding sources include the Water Capacity and Water Operation Fund.

#### **Wastewater**

Wastewater Projects include construction, reconstruction, master planning, and equipment replacements for the City's wastewater treatment plant and collection system. The City owns and operates one wastewater treatment plant with over four hundred major plant process equipment components, approximately 150 miles of sewer pipelines, 24 lift stations, three miles of wet weather relief (interceptor) pipeline, and six wet weather control structures. The discharge system consists of a 1,100-foot long outfall pipeline and a 150-foot long outfall diffuser pipeline. Wastewater funding sources include the Wastewater Capacity and Wastewaters Operations Fund.



#### **Section 6 - Highlighted Projects**

The following projects are anticipated to be completed in FY 19/20 and 20/21 for each of the five categories.

#### Facilities & Parks

The CIP identifies two building and three city park related projects for FY 19/20 and 20/21 totaling \$928,520 and \$2,105,200 respectively. The projects are as follows:

Table 14 - Facilities & Parks CIP for FY 19/20 - 20/21

Facilities & Parks				
Project Name	Project No.	FY 19/20	FY 20/21	Total
Library Basement Completion	BR-006	\$598,000	\$0	\$598,000
Community Center-Play Yard	BR-010	\$60,000	\$0	\$60,000
James Lemos Swim Center - Boiler Replacement	BR-26	\$240,300	\$0	\$240,300
Fitzgerald Field Bleachers	MC-016	\$0	\$1,150,000	\$1,150,000
Library Exterior Improvement	MC-017	\$95,520	\$955,200	\$1,050,720
Gazebo Replacement Project	MC-019	\$175,000	\$0	\$175,000
Total		\$1,168,820	\$2,105,200	\$3,274,020

- The Library Basement Completion Project is a top priority for the Board of Library and library staff. The project consists of completing approximately 8,000 square feet of unfinished library space in the basement by installing interior walls, a drop ceiling, flooring, electrical work, heating/cooling, computer cables, conference rooms, a literacy center, book storage, and a Friends of the Benicia Library book sale area.
- The Community Center-Play Yard Project consists of replacing the play yard for the Tiny Tots Preschool.
- The James Lemos Swim Center Boiler Replacement Project consists of replacing the boilers at the swimming pool.
- The Fitzgerald Field Bleachers Project consists of removing and replacing of the existing bleachers and restrooms. New bleachers and restrooms will be installed to meet current accessibility requirements.
- The **Library Exterior Improvement Project** consists of exterior improvements to the Library. New paint to the exterior walls was done in FY 17/18 and a new roof will be installed in FY 19/20.
- The Gazebo Replacement Project consists of replacing the gazebo in City Park on First Street and provide accessibility upgrades.

#### Information Technology

The CIP identifies one IT project for FY 19/20 and 20/21 totaling \$60,000 and \$0 respectively. The project is as follows:

Table 15 - Information Technology CIP for FY 19/20 - 20/21

Informational Technology				
Project Name	Project No.	FY 19/20	FY 20/21	Total
Replace Backup Server Barracuda - City Hall	MP-022	\$50,000	\$0	\$50,000
Centralized UPS for City Hall Server Room	MP-023	\$60,000	\$0	\$60,000
Total		\$110,000	\$0	\$110,000

- The Replace Backup Server Barracuda City Hall Project consists of replacing the current backup server Barracuda at City Hall.
- The Centralized UPS for City Hall Server Room Project consists of providing a robust backup battery power system that sits between City data center and PG&E. In case of PG&E power loss, the centralized UPS system will continue to provide power to the data center until the backup generator is turned on.

#### **Streets**

The CIP identifies ten streets related projects/programs for FY 19/20 and 20/21 totaling \$3,037,302 and \$7,864,223 respectively. The projects are as follows:

Table 16 - Streets CIP for FY 19/20 - 20/21

Streets				
Project Name	Project No.	FY 19/20	FY 20/21	Total
Citywide Street Resurfacing Program	MC-028	\$646,500	\$1,939,500	\$2,586,000
Columbus Parkway Widening	T-009	\$0	\$0	\$0
E. B St. Improvements (East of E. 2nd St.)	T-011	\$0	\$0	\$0
W. 7th St./Military West Intersection Modification	T-041	\$253,080	\$0	\$253,080
East 5th Street at Vecino Roadway Improvements	T-065	\$369,000	\$0	\$369,000
ATP Funded Safe Routes to School Project	T-115	\$904,314	\$0	\$904,314
OBAG2 Park Road Improvement Project	T-120	\$395,308	\$4,804,692	\$5,200,000
Storm Damage Repair Projects	T-122	\$0	\$184,031	\$184,031
Sidewalk Program & ADA Upgrade	T-124	\$75,000	\$75,000	\$150,000
HSIP Pedestrian Crossing Improvement Project	T-137	\$259,100	\$0	\$259,100
HSIP Guardrail Replacement Project	T-138	\$135,000	\$861,000	\$996,000
Total		\$3,037,302	\$7,864,223	\$10,901,525

- The Citywide Street Resurfacing Program consists of grinding and overlaying, rubber cape sealing, and microsurfacing streets throughout the city. The program will maximize the available funding and strive to improve pavement condition.
- The Columbus Parkway Widening Project consists of widening of westbound Columbus Parkway to extend the existing through/right turn lane 700 ft. east

from the intersection.

- The West 7<sup>th</sup> Street/Military West Intersection Modification Project consists of replacing the traffic signal to add protected left turns on Military West; upgrading five (5) pedestrian crosswalks to improve visibility, and upgrading the controller cabinet to improve signal timing.
- The East 5th Street at Vecino Roadway Improvement Project consists of constructing a bulb-out and crosswalk with flashing beacons on East 5th Street and Vecino Street and extend the eastern sidewalk of East 5th Street to I-780 along with installing two street lights.
- The ATP Funded Safe Routes to School Project consists of improving pedestrian infrastructures at five schools.
  - Joe Henderson Elementary School widen the sidewalk in front of the school and north of the school along Hasting Drive.
  - Mary Farmar Elementary School upgrade the accessibility curb ramps at the driveway into the school and at Drolette Way to meet current accessibility standards and install a pedestrian crosswalk with flashing beacons on West Military.
  - Robert Semple Elementary School refresh the traffic and crosswalk striping, install sidewalk on East S Street and East 5th Street, upgrade the tunnel lighting under I-780, and replace the sidewalk approach to the tunnel to meet current accessibility standards.
  - Benicia Middle School widen and/or replace existing sidewalk along Southampton Road along the frontage of the school and replace accessibility curb ramps to meet current standards.
  - St. Dominic School install a pedestrian activated flashing beacons at East J Street and East 5th Street.
- The OBAG2 Park Road Improvement Project consists of widening Park Road from I-780 overcrossing to Bayshore Road to install bike lanes, improve drainage, and repair Park Road.
- The **Storm Damage Repair Projects** consist of repairing three damaged areas as a result of the January 2017 storm. The locations and repairs are as follows.
  - East 2nd Street repair and stabilize slide area near 5300 East 2nd Street.
  - Lake Herman Road repair the damaged drain and pavement on Lake Herman Road.
  - West 7th Street repair and reinforce the eroded area next to the sidewalk.
- The Sidewalk Program & ADA Upgrade consists of annually repairing sidewalks throughout the City by following the City's Sidewalk Management Program and replacing non-compliance accessibility curb ramps.
- The HSIP Pedestrian Crossing Improvement Project consists of enhancing pedestrian crossings by installing accessibility curb ramps, Rectangular Rapid Flashing Beacon (RRFB) system, median island, and sidewalk, and other relevant elements at the intersections of Military West & West 5th Street and Hastings Drive & London Drive.

• The **HSIP Guardrail Replacement Project** consists of upgrading existing guardrails and end treatments at 28 locations in the city.

#### Water

The CIP identifies ten water projects for FY 19/20 and 20/21 totaling \$3,442,000 and \$1,578,000 respectively. The projects are as follows:

Table 17 - Water CIP for FY 19/20 - 20/21

Water				
Project Name	Project No.	FY 19/20	FY 20/21	Total
Master Plan Update	WO-016	\$275,000	\$0	\$275,000
P-2 Pump Station Motor Control Center Replacement	WO-024	\$300,000	\$0	\$300,000
Treated Water Flowmeter Replacement Project	WO-059	\$200,000	\$0	\$200,000
Drolette Way 8-inch Reliability Loop	WO-081	\$0	\$51,000	\$51,000
W 7th St 12-inch Water Main & PRV Imprv (50%)	WO-082	\$145,000	\$812,000	\$957,000
Recoating of R2 Reservoir	WO-091	\$462,000	\$0	\$462,000
Chlorine Gas Conversion Project	WO-101	\$1,600,000	\$0	\$1,600,000
Water Line Replacement Program	WO-102	\$460,000	\$460,000	\$920,000
Cordelia 24" Transmission Main Isolation Valves	WO-117	\$0	\$150,000	\$150,000
Valero Magmeter Flow Meters	WO-122	\$0	\$105,000	\$105,000
Total		\$3,442,000	\$1,578,000	\$5,020,000

- The Master Plan Update consists of updating the 2012 Water System Master Plan that provides information on construction, operation, and maintenance of the water treatment, storage, and distribution systems through 2040.
- The P-2 Pump Station Motor Control Center Replacement Project consists
  of replacing the Motor Control Center (MCC) at the P-2 Pump Station. The
  original pump station was constructed in 1969 with two pumps. The station was
  expanded to four pumps in 1971 during the building of the three-million-gallon
  reservoir (R-3B).
- The Treated Water Flowmeter Replacement Project consists of replacing the existing flow meter at the Water Treatment Plant with a magnetic meter.
- The Drolette Way 8-Inch Reliability Loop Project consists of installing 250 linear feet of new 8-inch water line to loop Drolette Way with Corrigan Court.
   The loop pipe will be constructed in the existing easement to improve water quality and address low pressures and velocities to provide fire flow capacity.
- The West 7<sup>th</sup> Street 12-Inch Water Main & Pressure Reducing Valve (PRV)
   Improvement Project consists of replacing 3,600 linear feet of 8-inch pipe
   between West 6th Street and Plaza del Oro to bolster flows at Benicia High
   School and the west side of Zone 1 to address low residual pressures and
   improve capacity.
- The Recoating of R2 Reservoir Project consists of recoating the treated water

reservoir located on East Second Street, across from the City's Corporation Yard. R2 was last recoated in 1995.

- The **Chlorine Gas Conversion Project** consists of pursuing alternate disinfection via either bulk storage or on-site generation. Maintaining compliance with chlorine gas disinfection processes is becoming increasingly more stringent and onerous from a regulatory perspective.
- The Water Line Replacement Program consists of unanticipated repairs not covered within the maintenance budget. Unused funds carry over into the next fiscal year. An example of a project that would be undertaken in this program is the replacement of the Cordelia 24-inch transmission main isolation valve.
- The Cordelia 24-Inch Transmission Main Isolation Valves Project consists of installing a new isolation valve at the Cordelia Pump Station.
- The Valero Magmeter Flow Meter Project consists of replacing the two existing raw water meters to Valero.

#### **Wastewater**

The CIP identifies fifteen sewer projects for FY 19/20 and 20/21 totaling \$3,593,000 and \$4,910,000 respectively. The projects are as follows:

Table 18 – Wastewater CIP for FY 19/20 - 20/21

Wastewater				
Project Name	Project No.	FY 19/20	FY 20/21	Total
Sewer Master Plan Update	WWO-013	\$275,000	\$0	\$275,000
Cathodic Protection Improvements	WWO-014	\$100,000	\$440,000	\$540,000
Digester Cleaning	WWO-018	\$0	\$200,000	\$200,000
E. 7th St. Sewerline Replacement	WWO-032	\$276,000	\$0	\$276,000
Boiler Replacement	WWO-046	\$0	\$0	\$0
Bayshore Road Gravity Main Rehabilitation	WWO-052	\$911,000	\$0	\$911,000
Chemical Tank Replacement at WWTP	WWO-058	\$0	\$0	\$0
Bayshore Road Forcemain Sanitary Sewer Crossovers	WWO-061	\$560,000	\$0	\$560,000
East Channel Road Sewerline Improvement Project	WWO-063	\$230,000	\$3,490,000	\$3,720,000
Recoat Concrete Channels	WWO-076	\$487,000	\$0	\$487,000
West H Pipeline Replacement	WWO-080	\$283,000	\$0	\$283,000
El Bonito Way Force Main Replacement	WWO-081	\$60,000	\$0	\$60,000
Sewer Line Replacement Program	WWO-082	\$200,000	\$650,000	\$850,000
Lift Station Upgrades	WWO-090	\$0	\$90,000	\$90,000
Solids Building Platforms (Belt Press & Cyclones)	WWO-092	\$211,000	\$0	\$211,000
Digester Gas Line above ground (digester to flare)	WWO-093	\$0	\$40,000	\$40,000
Total		\$3,593,000	\$4,910,000	\$8,503,000

 The Sewer Master Plan Update consists of updating the 2011 Wastewater System Plan that would provide information on construction, operation, and

maintenance of the wastewater collection and treatment facilities through 2040.

- The Cathodic Protection Improvements Project consists of conducting a pipe corrosion assessment at the Wastewater Treatment Plant and installing a new cathodic protection system.
- The **Digester Cleaning Project** consists of cleaning all three digesters to remove grit, rags, and plastics.
- The East 7th Street Sewerline Replacement Project consists of installing 510-feet of form in place liner from 616 East K Street to Manhole #12256, Manhole #12255, Manhole #12254, and Manhole #0 at 645 East J Street. An assessment of the eastern contributor to 7th Street Lift Station will also be conducted as part of this pipeline rehabilitation project.
- The Boiler Replacement Project consists of replacing both boilers used to heat the anaerobic digesters at the WWTP with higher efficiency and Bay Area Air Quality Management District (BAAQMD) compliant units.
- The Bayshore Road Gravity Main Rehabilitation Project consists of realigning the sanitary sewer main along Bayshore Road from Jackson Street to the City's Waste Water Treatment Plant due to sewer gas corrosion of pipeline materials.
- The Chemical Tank Replacement at WWTP Project consists of replacing the two original chemical tanks at the Wastewater Treatment Plant (WWTP) that have reached the end of their useful life cycle.
- The Bayshore Road Forcemain Crossovers Project consists of crossing over connections from an 8" force main (FM) to the 12" FM. The City installed a 12" FM that runs along Bayshore from the Park lift station to E 7th St. A redundant 8" FM was installed in the late 1950's that runs parallel to the 12" FM. The 8" FM has reached its useful life. All connections to 8" FM must be transferred to the 12" FM prior to decommissioning.
- The East Channel Road Sewerline Improvement Project consists of replacing the existing 12-inch pipe with a 15-inch pipe from East 2nd Street to the extension of Industrial Court; and 18-inch pipe from that point to Industrial Way; and protecting the new sewerline by repaving the deteriorating roadway.
- The Recoat Concrete Channels Project consists of recoating the concrete structure (headworks through primary clarifiers) to protect these structures from corrosion.
- The West H Pipeline Replacement Project consists of an assessment and mitigation of a sewer pipeline on West H Street. This pipeline is exposed due to the shoreline eroding. An assessment will be conducted first to determine the impact to the pipeline by erosion. Both the assessment and mitigation are planned for Fiscal Year 2018/19.
- The El Bonito Way Force Main Replacement Project consists of installing a new 4-inch sewer force main approximately 626 feet in length from the future

sidewalk stub at Highlands Lift Station (107 El Bonito) to manhole #11914 at the intersection of El Bonito Way and Corte Dorado.

- The Sewer Line Replacement Program consists of unanticipated repairs not covered within the maintenance budget. Unused funds carry over into the next fiscal year.
- The **Lift Station Upgrades Project** consists of increasing the lift station size at the East 7<sup>th</sup> Street and East B Street Lift Station Wet Wells.
- The Solids Building Platforms (Belt Press & Cyclones) Project consists of designing and constructing a new solids building platform for accessing the belt filter presses and the grit cyclones.
- The Digester Gas Line Above Ground (Digester to Flare) Project consists of replacing the existing underground digester gas line that services the pressure relief system.



#### **APPENDIX 1 – PROJECT WORKSHEETS**

# FY19/20-23/24 CAPITAL INVESTMENT PROGRAM PROJECT DESCRIPTION WORKSHEETS



## **Information Technology Projects**

No.	Project Name	Project No.
1	Broadcast Studio Upgrade to Council Chambers	MP-019
2	Replace Backup Server Barracuda - City Hall	MP-022
3	Centralized UPS for City Hall Server Room	MP-023

#### Project Code

BR	Building Renovations
FD	Fire Department
MC	Measure C
MP	Misc. Project
Р	Parks
Т	Transportation
WO	Water Operation
WWO	Wastewater Operation



#### '19/'20 thru '23/'24

### City of Benicia, California

Project # MP-019

Project Name Broadcast Studio Upgrade to Council Chambers

Type Improvement Department Finance/IT/CMO

Useful Life 15 Contact

Category Miscellaneous Projects Priority Level 2 - Unfunded

Account No.

Status Active



#### Description

This project consists of the following:

Phase 1 - Replace broadcast equipment that is over 15 years old. Install new equipment to support City Council, Planning Commission, and other Special meetings broadcast to the public. Also, have the capability to broadcast special meetings and press conferences from other City locations (Community Center, Library, PD and Fire Station 11).

Phase 2 - Improve the sound quality, replace video camera, install sound damper foams, LCD screens for better visual, improve AV technology, and improve presentation technology in the Council Chambers.

#### Justification

Upgrade equipment that is over 15 years old.

City of Benicia Strategic Plan

Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.				5,000				5,000
Construction Costs				125,000				125,000
Construction Management				10,000				10,000
Contingency				10,000				10,000
Total				150,000				150,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
General Fund (GF)				150,000				150,000
Total			·	150,000	·			150,000

#### **Budget Impact/Other**

Approximately \$90,000 is budgeted in the the PEG Fund.

Project # MP-022

Project Name Replace Backup Server Barracuda - City Hall

Type Replacement Department Finance/IT/CMO

Useful Life 6 years Contact

Category Miscellaneous Projects Priority Level 1 - Funded

Account No.

Status Active



## Description

This project consists of replacing the current backup serve Barracuda at City Hall.

#### Justification

Replace current backup appliance.

City of Benicia Strategic Plan

Strategic Issue 3: Strengthening Economic and Fiscal Conditions

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Furnishings & Equipment		50,000						50,000
Total		50,000						50,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
General Fund (GF)		50,000						50,000
Total		50,000						50,000

Project # MP-023

Project Name Centralized UPS for City Hall Server Room

Type Improvement Department Finance/IT/CMO

Useful Life 15 Contact

Category Miscellaneous Projects Priority Level 1 - Funded

Account No.

Status Active



#### Description

Centralized UPS (Uninterruptable Power Suppy) is a robust battery power system that sits in between City data center and PG&E. In case of PG&E power loss, the centralized UPS system will continue to provide power to the data center until the backup generator kicks in. Then, at that point, the backup generator will provide power until PG&E power is restored.

Our City data is housed in three major locations:

- 1. City Hall
- 2. police Dispatch
- 3. Fire Station 11

Currently, we have rack mounted smaller UPS systems in each server room. These units need constant maintenance as batteries fail. A centralized UPS system will elinimate the need to place small UPS systems in each location. A centralized UPS system at each location can be easily maintained through regular preventative maintenance (PM's). This eliminates the unnecessary down time and also prolongs the life of server equipment.

#### Justification

CRITICAL that this project be done in FY 19/20 or 20/21 at the latest.

Install centralized UPS system in the server room.

City of Benicia Strategic Plan

Strategic Issue 3: Strengthening Economic and Fiscal Conditions

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Furnishings & Equipment		60,000						60,000
Total		60,000						60,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
General Fund (GF)		60,000						60,000
Total		60,000						60,000

# **Facilities & Parks Projects**

No.	Project Name	Project No.
1	Youth Activity Center Improvements	BR-001
2	New Police Facility	BR-004
3	Library Basement Completion	BR-006
4	City Gym Improvements (next to Police Station)	BR-008
5	Community Center-Play Yard	BR-010
6	James Lemos Swim Center - Boiler Replacement	BR-26
7	City Hall Exterior Paint	BR-27
8	Community Park Ballfield Lights	BR-28
9	Fitzgerald Field Bleachers	MC-016
10	Library Exterior Improvement	MC-017
11	Gazebo Replacement Project	MC-018
11	Benicia Community Park-Pathway Improvement Project	P-006
12	Willow Glen Park-Pathway Improvement Project	P-009
13	West Ninth Street Park-Pathway Improvement Project	P-010
14	Parks Master Plan Update	P-012
15	Civic Center Park-Restroom Replacement Project	P-016
16	City Cemetery-Fence Improvement Project	P-020
17	Matthew Turner Park-Parking Lot Resurfacing	P-033
18	Urban Waterfront Enhancement and Master Plan	P-042
19	Replacement of Softball Light Poles at BMS	P-048
20	Fire Station 11 Flooring (Upstairs & Downstairs)	FD-003
21	Replace Bauer Compressor at Fire Station 11	FD-004
22	Fire Station 11 & 12 Floor Epoxy	FD-005

### Project Code

BR	Building Renovations
FD	Fire Department
MC	Measure C
MP	Misc. Project
Р	Parks
Т	Transportation
WO	Water Operation
WWO	Wastewater Operation



Project # BR-001

Project Name Youth Activity Center Improvements

Type Maintenance Department Parks & Community Services

Useful Life Contact PCS

Category Buildings & Building Infrastruct Priority Level 2 - Unfunded

Account No.

Status Active



#### Description

This project consists of painting of exterior building in 2017.

ADA improvements include installation of elevator to second floor to meet ADA standards in FY 2024/25.

#### Justification

General Plan Goal(s):

Goal 2.28: Improve and maintain public facilities and services.

Goal 4.5: Establish after-school programs and other constructive activities for youth.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.						40,000		40,000
Construction Costs	25,000						400,000	425,000
Total	25,000					40,000	400,000	465,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)	25,000					40,000	400,000	465,000
Total	25,000					40,000	400,000	465,000

Project # BR-004

Project Name New Police Facility

Type Replacement Department Parks & Community Services

Useful Life 30 years Contact Police

Category Buildings & Building Infrastruct Priority Level 2 - Unfunded

Account No.

Status Active



### Description

This project consists of building a new police facility to meet the needs of the Police Department.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety;

Strategic Issue 4: Preserving and Enhancing Infrastructure;

General Plan Goals, Programs, and Policies:

Goal 2.16: Ensure access needs of individuals with disabilities.

Goal 2.28: Improve and maintain public facilities and services.

Goal 3.27: Improve energy efficiency.

Goal 4.1: Make community health and safety a high priority for Benicia.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.						0		0
Construction Costs							0	0
Total						0	0	0
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)						0		0
Total						0		0

Project # BR-006

Project Name Library Basement Completion

Type Improvement Department Parks & Community Services
Useful Life 30 years Contact Public Works Director
Category Buildings & Building Infrastruct Priority Level 1 - Funded

Account No.

Status Active



#### Description

The project consists of completing the 8,000 square feet of unfinished library space in the base area by installing interior walls, drop ceiling, flooring, electricity, heating/cooling, computer cable, conference rooms, a literacy center, book storage, and Friends' book sale area., and other misc. improvements.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 3.4: Support the library and the services it provides to the community.

Policy 3.4.1: Maintain and expand library services.

Policy 3.4. B: Plan for expanding library services into existing unfinished lower level, with space allocated according to the needs of the community.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.		89,700						89,700
Construction Costs		388,700						388,700
Construction Management		59,800						59,800
Contingency		59,800						59,800
Total		598,000						598,000
_								
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Grant or Funded by Third Party (G)		300,000						300,000
Other (O)		298,000						298,000
Total		598,000	•	•			•	598,000

Project # BR-008

Project Name City Gym Improvements (next to Police Station)

Type Improvement Department Parks & Community Services
Useful Life 30 years Contact Public Works Director
Category Buildings & Building Infrastruct Priority Level 2 - Unfunded

Account No.

Status Active



## Description

This project consists of upgrading the men's and women's restroom to meet the needs of the Police Department and current ADA standards.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure; and Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.16: Ensure access needs of individuals with disabilities.

Goal 2.28: Improve and maintain public facilities and services.

Goal 4.1: Make community health and safety a high priority for Benicia.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.						50,000		50,000
Construction Costs						500,000		500,000
Total						550,000		550,000
_								
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)						550,000		550,000
Total						550,000		550,000

Project # BR-010

Project Name Community Center-Play Yard

Type Maintenance Department Parks & Community Services
Useful Life 20 years Contact Public Works Director
Category Buildings & Building Infrastruct Priority Level 2 - Unfunded

Account No.

Status Active



### Description

This project consists of replacing asphalt play yard for Tiny Tots preschool (\$60,000).

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure; and Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.30: Maintain and improve existing parks and recreation programs.

Policy 2.30.1: Enhance existing city recreation facilities and programs.

Goal 2.31: Maintain safety at parks/open space.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Construction Costs		60,000						60,000
Total		60,000						60,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
General Fund (GF)		60,000						60,000
Total		60,000						60,000

Project # BR-26

Project Name James Lemos Swim Center - Boiler Replacement

Type Maintenance Department Parks & Community Services

Useful Life 15 Contact PCS

Category Parks & Recreation Facilities Priority Level 2 - Unfunded

Account No.

Status Active



### Description

Replace boilers at swimming pool.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies

Goal 2.28: Improve and maintain public facilities and services

Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
	26,700						26,700
	178,000						178,000
	17,800						17,800
	17,800						17,800
	240,300						240,300
Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
	040.000						240,300
	240,300						240,300
		26,700 178,000 17,800 17,800 <b>240,300</b> Prior '19/'20	26,700 178,000 17,800 17,800 <b>240,300</b> Prior '19/'20 '20/'21	26,700 178,000 17,800 17,800 <b>240,300</b> Prior '19/'20 '20/'21 '21/'22	26,700 178,000 17,800 17,800 <b>240,300</b> Prior '19/'20 '20/'21 '21/'22 '22/'23	26,700 178,000 17,800 17,800 <b>240,300</b> Prior '19/'20 '20/'21 '21/'22 '22/'23 '23/'24	26,700 178,000 17,800 17,800 <b>240,300</b> Prior '19/'20 '20/'21 '21/'22 '22/'23 '23/'24 Future

Project # BR-27

Project Name City Hall Exterior Paint

Type Maintenance Department Parks & Community Services

Useful Life 6 years Contact PCS

Category Parks & Recreation Facilities Priority Level 2 - Unfunded

Account No.

Status Active



## Description

Paint the exterior of City Hall.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policieis

Goal 2.28: Improve and maintain public facilities and services

Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
			50,000				50,000
			5,000				5,000
			5,000				5,000
			60,000				60,000
Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
			60,000				60,000
			60,000				60,000
				Frior '19/'20 '20/'21 '21/'22 60,000	50,000 5,000 5,000 60,000 Prior '19/'20 '20/'21 '21/'22 '22/'23 60,000	50,000 5,000 5,000 60,000 Prior '19/'20 '20/'21 '21/'22 '22/'23 '23/'24 60,000	50,000 5,000 5,000 60,000 Prior '19/'20 '20/'21 '21/'22 '22/'23 '23/'24 Future 60,000

Project # BR-28

Project Name Community Park Ballfield Lights

Type Improvement Department Parks & Community Services

Useful Life 30 years Contact PCS

Category Parks & Recreation Facilities Priority Level 2 - Unfunded

Account No.

Status Active



# Description

Install lights on Field #1 and Field #3 at Benicia Community Park.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs and Policies

Goal 2.28: Improve and maintain public facilities and services

Goal 2.31 Maintain safety at Parks/Open Space

Goal 2.32: Expand the City's Park system to accommodate future community needs

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.				60,000				60,000
Construction Costs				400,000				400,000
Construction Management				40,000				40,000
Contingency				40,000				40,000
Total				540,000				540,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)				540,000				540,000
Total				540,000				540,000
Budget Impact/Other	7							

### Capital Improvement Plan

### City of Benicia, California

Project # MC-016

Project Name Fitzgerald Field Bleachers

Type Improvement Department Parks & Community Services

Useful Life 30 years Contact PCS

Category Parks & Recreation Facilities Priority Level 1 - Funded

Account No.

Status Active



#### Description

This project consists of removing and replaceing of the existing bleachers and restrooms. New bleachers and restrooms will be installed to meet current ADA requirements.

#### Justification

Bleachers were in need of replacement.

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure; and

Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.30: Maintain and improve existing parks and recreation programs.

Policy: 2.30.1: Enhance existing city recreational facilities and programs.

Goal 2.31: Maintain safety at parks/open space.

Goal 2.32: Expand the City's park system to accommodate future community needs.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.			130,000					130,000
Construction Costs			1,020,000					1,020,000
Total			1,150,000					1,150,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Grant or Funded by Third Party (G)			150,000					150,000
Measure C (MC)			1,000,000					1,000,000
Total			1,150,000					1,150,000

#### Budget Impact/Other

\$750,000 Budget with Measure C - Bid in Spring 2019 and Construction in Fall/Winter 19/20

Project # MC-017

Project Name Library Exterior Improvement

Type Maintenance Department Parks & Community Services

Useful Life 20 years Contact PCS

Category Buildings & Building Infrastruct Priority Level 1 - Funded

Account No.

Status Active



# Description

This project consists of exterior improvements to Library. New paint to the exterior walls will be done in FY 17/18 and a new roof will be installed in FY 19/20.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 3.4: Support the library and the services it provides to the community.

Policy 3.4.1: Maintain and expand library services.

Expenditures		Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design	and Eng.	49,900							49,900
Construction Cos	sts			955,200					955,200
Contingency			95,520						95,520
	Total	49,900	95,520	955,200					1,100,620
Funding Sour	CAS	Prior	'19/'20	'20/'21	'21/'22	122/123	123/124	Futura	Total
Funding Sour	ces	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Funding Sour Measure C (MC)		Prior 49,900	'19/'20 95,520	'20/'21 955,200	'21/'22	'22/'23	'23/'24	Future	Total

#### Budget Impact/Other

Estimated Cost \$1,100,000

Project # MC-019

Project Name Gazebo Replacement Project

Type Replacement Department Parks & Community Services

Useful Life Contact PCS

Category Parks & Recreation Facilities Priority Level 1 - Funded

Account No.

Status Active



## Description

This project consists of the gazebo replacement in City Park on First Street and accessibility upgrades.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure; and

Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.30: Maintain and improve existing parks and recreation programs.

Policy: 2.30.1: Enhance existing city recreational facilities and programs.

Goal 2.31: Maintain safety at parks/open space.

Goal 2.32: Expand the City's park system to accommodate future community needs.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Construction Costs		175,000						175,000
Total		175,000						175,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Measure C (MC)		175,000						175,000
Total		175,000						175,000

#### Budget Impact/Other

Estimated cost \$175,000

### Capital Improvement Plan

## City of Benicia, California

Project # P-006

Project Name Benicia Community Park-Pathway Improvement Project

Type Maintenance Department Parks & Community Services
Useful Life 30 years Contact Public Works Director
Category Parks & Recreation Facilities Priority Level 2 - Unfunded

Account No.

Status Active



## Description

This project consists of repairing and replacing the asphalt pathway for better accessibility.

#### Justification

City of Benicia Strategic Plan

4. Strategic Issue 4: Preserving and Enhancing Infrastructure; and

5. Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.30: Maintain and improve existing parks and recreation programs.

Policy 2.30.5: Design park improvements to facilitate accessibility and maintenance.

Goal 2.31: Maintain safety at parks/open space.

Goal 2.32: Expand the City's park system to accommodate future community needs.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.						75,000		75,000
Construction Costs						325,000		325,000
Construction Management						50,000		50,000
Contingency						50,000		50,000
Total						500,000		500,000
_								
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)								=00.000
· · · · · · · · · · · · · · · · · · ·						500,000		500,000
Total						500,000 <b>500,000</b>		500,000

Project # P-009

Project Name Willow Glen Park-Pathway Improvement Project

Type Replacement Department Parks & Community Services
Useful Life 30 years Contact Public Works Director
Category Parks & Recreation Facilities Priority Level 2 - Unfunded

Account No.

Status Active



#### Description

This project consists of repairing and replacing the asphalt pathway for better accessibility with other permeable material, such as decomposed granite..

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure; and

Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.30: Maintain and improve existing parks and recreation programs.

Policy 2.30.5: Design park improvements to facilitate accessibility and maintenance.

Goal 2.31: Maintain safety at parks/open space.

Goal 2.32: Expand the City's park system to accomdate future community needs.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.					15,000			15,000
Construction Costs					75,000			75,000
Contingency					10,000			10,000
Total					100,000			100,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
		17/ 20	20/ 21	21/ 22	22/ 23	23/ 21	1 00010	
Unfunded (UF)		19, 20	20, 21	21, 22	100,000	23, 21	1 40410	100,000
Unfunded (UF)  Total		17/ 20	20, 21	21/ 22		23/ 21	1 0002	

### Capital Improvement Plan

## City of Benicia, California

Project # P-010

Project Name West Ninth Street Park-Pathway Improvement Project

Type Replacement Department Parks & Community Services
Useful Life 30 years Contact Public Works Director
Category Parks & Recreation Facilities Priority Level 2 - Unfunded

Account No.

Status Active



### Description

This project consists of relocating the pathway to the east for better accessibility.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure; and

Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.30: Maintain and improve existing parks and recreation programs.

Policy 2.30.5 Design park improvements to facilitate accessibility and maintenance.

Goal 2.31: Maintain safety at parks/open space.

Goal 2.32: □ Expand the City's park system to accommodate future community needs.

Goal 3.13: Improve urban design qualities of the waterfront and public access to the shoreline.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Construction Costs				120,000				120,000
Construction Management				15,000				15,000
Contingency				15,000				15,000
Total				150,000				150,000
F. 11. G								
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)	Prior	'19/'20	'20/'21	'21/'22 150,000	'22/'23	'23/'24	Future	Total 150,000

Project # P-012

Project Name Parks Master Plan Update

Type Improvement Department Parks & Community Services

Useful Life Varies Contact PCS

Category Parks & Recreation Facilities Priority Level 2 - Unfunded

Account No.

Status Active



### Description

This project consists of updating the Parks, Trails, and Open Space Masterplan.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 2: Protecting and Enhancing the Environment;

Strategic Issue 4: Preserving and Enhancing Infrastructure; and

Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.30: Maintain and improve existing parks and recreation programs.

Goal 2.31: Maintain safety at parks/open space.

Goal 2.32: Expan the City's park system to accommodate future community needs.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.				250,000				250,000
Total				250,000				250,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)				250,000				250,000
Total				250,000				250,000

Project # P-016

Project Name Civic Center Park-Restroom Replacement Project

Type Replacement Department Parks & Community Services
Useful Life 30 years Contact Public Works Director
Category Parks & Recreation Facilities Priority Level 2 - Unfunded

Account No.

Status Active



### Description

This project consists of replacing the existing restroom with a new restroom, which will meet current ADA standards.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure; and

Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.16: Ensure access needs of individuals with disabilities.

Program 2.16.1: Provide for adequate public access in all forms (walks, buildings, transportation) in conformance with the Americans for Disabilities Act (ADA).

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.30: Maintain and improve existing parks and recreation programs.

Policy 2.30.5: Design park improvements to facilitate accessibility and maintenance.

Goal 2.31: Maintain safety at parks/open space.

Goal 2.32: Expand the City's park system to accommodate futrue community needs.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.					26,250			26,250
Construction Costs					113,750			113,750
Construction Management					17,500			17,500
Contingency					17,500			17,500
Total					175,000			175,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)					175,000			175,000
Total					175,000			175,000

Project # P-020

Project Name City Cemetery-Fence Improvement Project

Type Replacement Department Parks & Community Services
Useful Life 20 years Contact Public Works Director
Category Parks & Recreation Facilities Priority Level 2 - Unfunded

Account No.

Status Active



### Description

This project consists of replacing the existing perimeter fence and installing new perimeter fence to maintain and beautify the facility.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.31: Maintain safety at parks/open space.

Goal 3.1: Maintain and enhance Benicia's historic character.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.					30,000			30,000
Construction Costs					150,000			150,000
Contingency					20,000			20,000
Total					200,000			200,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)					200,000			200,000
Gill dilided (GI)					200,000			200,000

Project # P-033

Project Name Matthew Turner Park-Parking Lot Resurfacing

Type Maintenance Department Parks & Community Services
Useful Life 30 years Contact Public Works Director

Category Parks & Recreation Facilities Priority n/a

Account No.

Status Active



## Description

This project consists of resurfacing the parking lot and restriping the parking spaces.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.30: Maintain and improve existing parks and recreation programs.

Goal 2.31: Maintain safety at parks/open space.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.						52,500		52,500
Construction Costs						227,500		227,500
Construction Management						35,000		35,000
Contingency						35,000		35,000
Total						350,000		350,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)						350,000		350,000
Total						350,000		350,000

Project # P-042

Project Name Urban Waterfront Enhancement and Master Plan

Type Improvement Department Parks & Community Services

Useful Life Varies Contact PCS

Category Parks & Recreation Facilities Priority Level 2 - Unfunded

Account No.

Status Active



#### Description

The project consists of designing details of the Urban Waterfront Park design. Subsequent implementation to be completed in 2-3 phases (Master Plan has been completed).

#### Justification

City of Benicia Strategic Plan

Strategic Issue 2: Protecting and Enhancing the Environment;

Strategic Issue 4: Preserving and Enhancing Infrastructure; and

Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.12: ☐ Strengthen the Downtown as the City's central commercial zone.

Program 2.12. J: Maintain public parks, streets, and sidewalks located Downtown in a clean and safe condition.

Program 2.12. L: Use the Urban Waterfront Restoration Plan to guide the planning and development of public waterfront improvements;

when siting private development; and when designing public access between commercial uses and the waterfront.

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.30: Maintain and improve existing parks and recreation programs.

Goal 2.32: Expand the City's park system to accommodate future community needs.

Goal 3.13: Improve urban design qualities of the waterfront and public access to the shoreline.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.				700,000				700,000
Construction Costs						0		0
Construction Management						0		0
Contingency						0		0
Total				700,000		0		700,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Measure C (MC)				175,000				175,000
Unfunded (UF)				525,000				525,000
Total				700,000				700,000

#### Budget Impact/Other

A Master Plan was completed in 2014. Grant funding being sought to supplement City funding for detailed design and engineering of the Master Plan.

Project # P-048

Project Name Replacement of Softball Light Poles at BMS

Type Replacement Department Parks & Community Services

Useful Life Contact PCS

Category Parks & Recreation Facilities Priority Level 2 - Unfunded

Account No.

Status Active



### Description

Replace softball light poles and foundations located at Benicia Middle School (approximately 16 poles).

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure

Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.30: Maintain and improve existing parks and recreation programs.

Policy 2.30.1: Enhance existing city recreation facilities and programs.

Goal 2.31: Maintain safety at parks/open space.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.				75,000				75,000
Construction Costs				325,000				325,000
Construction Management				50,000				50,000
Contingency				50,000				50,000
Total				500,000				500,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)				500,000				500,000
Total				500,000				500,000

Project # FD-003

Project Name Fire Station 11 Flooring (Upstairs & Downstairs)

Type Maintenance Department Public Safety ful Life 20 years Contact Fire

Useful Life 20 years Contact Fire
Category Buildings & Building Infrastruct Priority Level 2 - Unfunded

Account No.

Status Active



#### Description

This project consists of replacing the upstairs/downstairs flooring at Station 11. New flooring will provide longevity and minimize overall maintenance.

#### Justification

Replacement of upstairs/downstairs flooring at Station 11.

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Construction Costs				50,000				50,000
Total				50,000				50,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)				50,000				50,000
Total				50,000				50,000

Project # FD-004

Project Name Replace Bauer Compressor at Fire Station 11

Type Replacement Department Public Safety
Useful Life 20 years Contact Fire

Category Miscellaneous Projects Priority Level 2 - Unfunded

Account No.

Status Active



## Description

This project consists of replacement of existing compressor at Fire Station 11.

#### Justification

Replacement of existing compressor.

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Furnishings & Equipment				65,000				65,000
Total				65,000				65,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)				65,000				65,000
Total				65,000				65,000

Project # FD-005

Project Name Fire Station 11 & 12 Floor Epoxy

Type Replacement Department Public Safety

Useful Life Contact

Category Buildings & Building Infrastruct Priority Level 2 - Unfunded

Account No.

Status Active



## Description

Epoxy the station floors at Fire Station 11 and 12.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals:

Goal 2.28: Improve and maintain public facilities and services.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Construction Costs				65,000				65,000
Total				65,000				65,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)				65,000				65,000
Total				65,000				65,000

# **Street Projects**

No.	Project Name	Project No.
1	Citywide Street Resurfacing Program	MC-028
2	Paint Benches & Street Lights at First Street	MP-126
3	Columbus Parkway Widening	T-009
4	E. B St. Improvements (East of E. 2nd St.)	T-011
5	W. 7th St./Military West Intersection Modification	T-041
6	East 5th Street at Vecino Roadway Improvements	T-065
7	ATP Funded Safe Routes to School Project	T-115
8	OBAG2 Park Road Improvement Project	T-120
9	Storm Damage Repair Projects	T-122
10	Grant Street Bridge Repairs	T-123
11	Sidewalk Program & ADA Upgrade	T-124
12	Annual Traffic Calming Projects	T-126
13	East 2nd St. Bridge Repair	T-132
14	Park Road Bridge Repair	T-133
15	West Channel Bridge Repair	T-135
16	HSIP Pedestrian Crossing Improvement Project	T-137
17	HSIP Guardrail Replacement Project	T-138

### Project Code

BR	Building Renovations
FD	Fire Department
MC	Measure C
MP	Misc. Project
Р	Parks
Т	Transportation
WO	Water Operation
WWO	Wastewater Operation



### Capital Improvement Plan

### City of Benicia, California

Project # MC-028

Project Name Citywide Street Resurfacing Program

Type Maintenance Department Public Works
Useful Life 15-20 years Contact Public Works Director
Category Local Roads and Streets Priority Level 1 - Funded

Account No. 017-8705-9711

Status Active



#### Description

Project consists of overlaying, rubber cape sealing, and slurry sealing city streets. The streets and pavement treatment will be selected based on the pavement management program. Two years of funding will be used to gain economies of scale cost savings. Upgrade ada curb ramps along street resurfacing streets.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure; and

Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.6: Attract and retain a balance of different kinds of industrial uses to Benicia.

Goal 2.7: Attract and retain industrial facilities that provide fiscal and economic benefits to - and meet the present and future needs of Benicia

Goal 2.11: Encourage the retention and continued evolution of the lower Arsenal into a historic/cultural/commercial/industrial center of mutually compatible uses.

Goal 2.16: Ensure access needs of individuals with disabilities.

Goal 2.20: Provide a balanced street system to serve automobiles, pedestrians, bicycles, and transit, balancing vehicle-flow improvements with multi-modal considerations.

Program 2.20. J: Develop adequate funding for keeping streets, alleys and sidewalks in good repair.

Program 2.20. K: Identify and prioritize transportation facilities maintenance projects for roadways, sidewalks, and off-street trails and paths.

Goal 2.24: Continue to provide safe and direct access to the Industrial Park.

Goal 2.28: Improve and maintain public facilities and services.

Goal 3.12: Improve the appearance of the Industrial Park.

Goal 4.1: Make community health and safety a high priority for Benicia.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.		32,325	193,950	59,625	357,750	61,125		704,775
Construction Costs		484,875	1,357,650	894,375	2,504,250	916,875		6,158,025
Construction Management		64,650	193,950	119,250	357,750	122,250		857,850
Contingency		64,650	193,950	119,250	357,750	122,250		857,850
Total		646,500	1,939,500	1,192,500	3,577,500	1,222,500		8,578,500
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Gas Tax (GAS)		175,000	525,000	175,000	525,000	175,000		1,575,000
Measure C (MC)		156,500	469,500	675,000	2,025,000	675,000		4,001,000
Other (O)		80,000	240,000	80,000	240,000	80,000		720,000
Senate Bill 1/RMRA (SB1)		235,000	705,000	262,500	787,500	292,500		2,282,500
Total	•	646,500	1,939,500	1,192,500	3,577,500	1,222,500		8,578,500

#### Budget Impact/Other

FY 2021-2024 we are assuming that PW continue to receive 26% of Measure C (\$1.350M per yr minus any roadway projects), Gas Tax (\$350K per yr), and Allied Waste Funds (\$160K per yr) every year.

# Capital Improvement Plan

'19/'20 thru '23/'24

# City of Benicia, California

25% of funds will be used for microsurfacing in FY20/21 and FY 22/23. 75% of funds will be used for street resurfacing in FY 21/22 and FY 23/24.

Project # MP-126

Project Name Paint Benches & Street Lights at First Street

Type Maintenance Department Public Works
Useful Life 15-20 years Contact Public Works Director
Category Miscellaneous Projects Priority Level 2 - Unfunded

Account No.

Status Active



# Description

This project consists of painting street lights and benches on First Street.

#### Justification

Repaint street light poles and benches on First Street.

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure; and

Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.12: Strengthen the Downtown as the City's central commercial zone.

Goal 2.14: Enhance Benicia's small-town atmosphere of pedestrian-friendly streets and neighborhoods.

Goal 2.28: Improve and maintain public facilities and services.

Goal 3.8: Preserve First Street as the community focal point of Benicia.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Construction Costs						80,000		80,000
Contingency						8,000		8,000
Total						88,000		88,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)						88,000		88,000
Total						88,000		88,000

Project # T-009

Project Name Columbus Parkway Widening

Type Improvement
Useful Life 30 years
Category Intersections

Department Public Works

Contact Public Works Director

Priority Level 2 - Unfunded

Account No.

Status Active



#### Description

The project includes the widening of westbound Columbus Parkway to extend the existing through/right turn lane 700 ft east from the intersection. The project is funded through the Traffic Impact Fee Program.

Funding:Benicia Traffic Impact Fees

Schedule:Resume design in Summer 2016. Construction planned for 2017-18.

Status: Contract was awarded in October 2015. Project currently on hold due to lack of resources.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety;

Strategic Issue 4: Preserving and Enhancing Infrastructure; and

Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goal(s):

Policy 2.20.1: Maintain at least Level of Service D on all city roads, street segments, and intersections.

Program 2.20.I: Coordinate traffic signal improvements and synchronization and continue to implement timing changes.

Program 2.20 J: Develop adequate funding for keeping streets, alleys and sidewalks in good repair.

Program 2.20.K: Identify and prioritize transportation facilities maintenance projects for roadways, sidewalks, and off-street trails and paths.

Goal 2.28: Improve and maintain public facilities and services.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.	247,894							247,894
Construction Costs				700,000				700,000
Construction Management				100,000				100,000
Contingency				100,000				100,000
Total	247,894			900,000				1,147,894
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Traffic Impact Fee Fund (TIF)	247,894			700,000				947,894
Unfunded (UF)				200,000				200,000
Total	247,894			900,000				1,147,894

#### Budget Impact/Other

0.2 Eng FTE in FY 16/17 and 0.3 Eng FTE in FY 17/18.

Requesting Finance to carryover \$262,995 from FY 15/16 to FY 16/17 (memo dated 6/3/16).

Project # T-011

Project Name E. B St. Improvements (East of E. 2nd St.)

Type Unassigned Department Public Works
Useful Life 20 years Contact Public Works Director
Category Local Roads and Streets Priority Level 2 - Unfunded

Account No.

Status Active



## Description

This project consists of constructing a full roadway section from intersection with East Second Street to turnaround by Harbormaster's office including drainage and parking amenities. Project may be performed in conjunction with TR16.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure; and

Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.6: Attract and retain a balance of different kinds of industrial uses to Benicia.

Goal 2.7: Attract and retain industrial facilities that provide fiscal and economic benefits

General Plan Goal(s):

Program 2.12.J: Maintain public parks, streets, and sidewalks located Downtown in a clean and safe condition.

Program 2.20.J: Develop adequate funding for keeping streets, alleys and sidewalks in good repair.

Program 2.20.K: Identify and prioritize transportation facilities maintenance projects for roadways, sidewalks, and off-street trails and paths.

Goal 2.28: Improve and maintain public facilities and services.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.						100,000		100,000
Construction Costs						500,000		500,000
Construction Management						100,000		100,000
Contingency						100,000		100,000
Total						800,000		800,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)						800,000		800,000
Total						800,000		800,000

# City of Benicia, California

Project # T-041

Project Name W. 7th St./Military West Intersection Modification

Type Improvement Department Public Works
Useful Life 20 years Contact Public Works Director
Category Transportation Related Priority Level 1 - Funded

Account No. 034-8705-9762

Status Active



#### Description

The Project consists of replacing traffic signal to add protected left turns on Military West; upgrading five (5) pedestrian crosswalks to improve visibility, and upgrading controller cabinet to improve signal timing.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety; Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.16: Ensure access needs of individuals with disabilities.

Goal 2.20: Provide a balanced street system to serve automobiles, pedestrians, bicycles, and transit, balancing vehicle-flow improvements with multi-modal considerations.

Goal 2.28: Improve and maintain public facilities and services.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.	28,120							28,120
Construction Costs		227,772						227,772
Contingency		25,308						25,308
Total	28,120	253,080						281,200
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Grant or Funded by Third Party (G)		253,080						253,080
Traffic Impact Fee Fund (TIF)	28,120							28,120
Total					·	·	<u> </u>	281,200

### Budget Impact/Other

Funding: HSIP Grant and TIF

Budget: Total cost is \$281,200. HSIP grant will pay for 90% or \$253,080 and the City will pay for 10% or \$28,120 from Acct. No. 034-8705-9762 where \$25,000 is budgeted in FY 17/18.

# City of Benicia, California

Project # T-065

Project Name East 5th Street at Vecino Roadway Improvements

Type Improvement Department Public Works
Useful Life 20 years Contact Public Works Director
Category Transportation Related Priority Level 1 - Funded

Account No. 017-8705-9711



City of Science | B. 506 Scient & Proces Street Science & Improvements: property by Science & Science

#### Description

This project consists of constructing of a bulb-out and crosswalk with flashing beacons on East 5th Street @ Vecino Street and extend the eastern sidewalk of East 5th Street to I-780 along with adding 2 new streetlights.

Status Active

#### Justification

Pedestrian improvements to area.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety;

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.16: Ensure access needs of individuals with disabilities.

Goal 2.20: Provide a balanced street system to serve automobiles, pedestrians, bicycles, and transit, balancing vehicle-flow improvements with multi-modal considerations.

Goal 2.28: Improve and maintain public facilities and services.

Goal 3.11: Enhance the East Side.

Goal 4.1: Make community health and safety a high priority for Benicia.

Expenditures		Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design ar	nd Eng.	101,600							101,600
Construction Costs			332,100						332,100
Contingency			36,900						36,900
	Total	101,600	369,000						470,600
Funding Source	es	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Gas Tax (GAS)		101,600							101,600
Grant or Funded by (G)	Third Party		369,000						369,000
	Total	101,600	369,000						470,600

### Budget Impact/Other

Funding: HSIP Grant and Gas Tax

Budget: Total cost is \$470,600. HSIP grant will pay for 90% or \$423,540 and the City will pay for 10% or \$47,060.

# City of Benicia, California

Project # T-115

Project Name ATP Funded Safe Routes to School Project

Type Improvement Department Public Works
Useful Life 20 years Contact Public Works Director
Category Transportation Related Priority Level 1 - Funded

Account No.

Status Active



#### Description

The project consists of the following improvements:

Joe Henderson: Widen sidewalk along Hastings Dr. adjacent to and north of school.

Mary Farmar: Remove and replace ada curb ramps at the driveway to the school and at Drolette and add a pedestrian crosswalk on Military with flashing beacons.

Robert Semple: Install high visibility yellow crosswalk, refresh all pavement markings and stripings around the school, widen and install sidewalks on East S St and East 3rd St., upgrade lighting in tunnel under I-780, replace sidewalk approach and retrofit pathway for accessibility and install accessible curb ramps.

Benicia Middle School: Widen sidewalks on north side of Southampton Road at Turner Drive and on southern side of intersection along school frontage. Install sidewalk along Panorma Dr. to James Ct., widen sidewalks west of school driveway entrance at the bus stop and install high visibility crosswalk.

St. Dominic School: Installation of a pedestrian-actuated flashing beacon at East J and East 5th St.

#### Justification

Pedestrian improvements near schools.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety;

Strategic Issue 4: Preserving and Enhancing Infrastructure; and Strategic Issue 5: Maintain and Enhance a High Quality of Life

Strategic issue 5: Maintain and Emiance a riigh Quanty of i

General Plan Goals, Programs, and Policies:

Goal 2.14: Enchance Benicia's small-town atmoshpere of pedestrian-friendly streets and neighborhoods.

Goal 2.15: Provide a comprehensive system of pedestrian and bicycle routes which link the various components of the community: employment centers, residential areas, commercial areas, schools, parks, and open space.

Policy 2.15.1: Make pedestrian and bicycle circulation, and safety improvements a high priority for transportation funding, utilizing locally generated revenues and State and federal grants.

Program 2.15. A: Construct public improvements that accommodate and enhance pedestrian and bicycle access.

Program 2.15. J: Improve pedestrian and bike access between Downtown and Southampton.

Goal 2.16: Ensure access needs of individuals with disabilities.

Program 2.16.1 Provide for adequate public access in all forms (walks, buildings, transportation) in conformance with the Americans for Disabilities Act (ADA).

Goal 2.20: Provide a balanced street system to serve automobiles, pedestrians, bicycles, and transit, balancing vehicle-flow improvements with multi-modal considerations.

Goal 2.21: Encourage Benicia residents and employees to use alternatives to the single-occupant automobile.

Goal 2.22: Alleviate traffic congestion near school sites.

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.34: Ensure adequate school facilities to serve all residential areas.

Goal 4.1: Make community health and safety a high priority for Benicia.

Goal 4.9: Ensure clean air for Benicia residents.

Goal 4.10: Support improved regional air quality.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.		97,435						97,435
Construction Costs		726,179						726,179
Contingency		80,700						80,700
Total		904,314						904,314
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Gas Tax (GAS)		55,000						55,000
Grant or Funded by Third Party		849,314						849,314
(G)								

### Budget Impact/Other

Solano Transportation Authority (STA) applied for and received a \$3,067,000 grant for infrastructure improvements at seven schools in Benicia (5), Vallejo (1) and Rio Vista (1) along with education programs. STA will take the lead on this project.

# City of Benicia, California

Project # T-120

Project Name OBAG2 Park Road Improvement Project

Type Improvement Department Public Works
Useful Life 20 years Contact Public Works Director
Category Measure C Priority Level 1 - Funded

Account No.

Status Active



## Description

This proejct consists of widening Park Road from I-780 overcrossing to Bayshore Road to install bike lanes, improve drainage, and repair Park Road.

#### Justification

Improvements to street and installation of bike lanes.

City of Benicia Strategic Plan

Strategic Issue 4: Preserving and Enhancing Infrastructure; and

Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.6: Attract and retain a balance of different kinds of industrial uses to Benicia.

Goal 2.7: Attract and retain industrial facilities that provide fiscal and economic benefits to - and meet the present and future needs of Benicia.

Goal 2.11: Encourage the retention and continued evolution of the lower Arsenal into a historic/cultural/commercial/industrial center of mutually compatible uses.

Goal 2.15: Provide a comprehensive system of pedestrian and bicycle routes which link the various components of the community: employment centers, residential areas, commercial areas, schools, parks, and open space.

Policy 2.15.1: Make pedestrian and bicycle circulation, and safety improvements a high priority for transportation funding, utilizing locally generated revenues and State and federal grants.

Program 2.15. A: Construct public improvements that accommodate and enhance pedestrian and bicycle access.

Goal 2:17: Provide an efficient, reliable, and convenient transit system.

Goal 2.20: Provide a balanced street system to serve automobiles, pedestrians, bicycles, and transit, balancing vehicle-flow improvements with multi-modal considerations.

Goal 2.21: Encourage Benicia residents and employees to use alternatives to the single-occupant automobile.

Goal 2.24: Continue to provide safe and direct access to the Industrial Park.

Goal 2.25: Improve auto and non-auto access into the Old Arsenal, without disrupting existing neighborhood, historic, and environmental values.

Goal 2.28: Improve and maintain public facilities and services.

Goal 3.11: Enhance the East Side.

Goal 3.12: Improve the appearance of the Industrial Park.

Goal 4.1: Make community health and safety a high priority for Benicia.

Goal 4.9: Ensure clean air for Benicia residents.

Goal 4.10: Support improved regional air quality.

Policy 4.10.2: Encourage designs and land use strategies that reduce automobile use and promote mixed use, jobs/housing balance, telecommuting, bicycle, and pedestrian facilities, and transit.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.		395,308						395,308
Construction Costs			3,843,754					3,843,754
Construction Management			480,469					480,469
Contingency			480,469					480,469
Total		395,308	4,804,692					5,200,000

'19/'20 thru '23/'24

# City of Benicia, California

Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Grant or Funded by Third Party (G)			2,731,000					2,731,000
Measure C (MC)		395,308	2,073,692					2,469,000
Total		395,308	4,804,692					5,200,000

### Budget Impact/Other

Local Fund (Measure C): \$2,469,000 CMQA-T5-OBAG-CO: \$2,000,000 STP-T5-OBAG2-CO: \$731,000

Staff Reports that support funding and/or approval of funding:

June 27, 2017 November 20, 2018

# City of Benicia, California

Project # T-122

Project Name Storm Damage Repair Projects

Type Replacement Department Public Works
Useful Life 30 years Contact Public Works Director
Category Transportation Related Priority Level 1 - Funded

Account No.

Status Active



#### Description

This project consists of storm damage repairs from the January 2017 storms, which resulted in three locations that need to be repaired. Currently working with Caltrans Office of Local Assistance for Federal Highway Agency assistance in funding these projects.

East 2nd Street - Repair and stablilize the slide area near 5300 East 2nd St.

Lake Herman Road near East 2nd Street - Overside drain failure, repair the damaged drain and pavement on Lake Herman Road.

West 7th Street - repair and reinforce the eroded area next to the sidewalk.

#### Justification

Repair storm damage resulting from 2017 Winter storms.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety;

Strategic Issue 2: Protecting and Enhancing the Environment;

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.6: Attract and retain a balance of different kinds of industrial uses to Benicia.

Goal 2.7: Attract and retain industrial facilities that provide fiscal and economic benefits to - and meet the present and future needs of Benicia.

Goal 2.24: Continue to provide safe and direct access to the Industrial Park.

Goal 2.28: Improve and maintain public facilities and services.

Goal 3.9: Protect and enhance scenic roads and highways.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.			184,031					184,031
Construction Costs				834,843				834,843
Construction Management				104,000				104,000
Contingency				104,000				104,000
Total			184,031	1,042,843				1,226,874
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Grant or Funded by Third Party (G)			184,031	902,121				1,086,152
Unfunded (UF)				140,722				140,722
Total	•		184,031	1,042,843		•		1,226,874

#### Budget Impact/Other

Funds to be approved by FHWA and administer by Caltrans.

Project # T-123

Project Name Grant Street Bridge Repairs

Type Maintenance Department Public Works
Useful Life Varies Contact Public Works Director
Category Transportation Related Priority Level 2 - Unfunded

Account No.

Status Active



# Description

This project consists of repairs to the Grant Street Bridge - Retrofit per CalTrans annual bridge inspection

#### Justification

Based on Caltrans Bridge Inspection Report, the bridge is functionally obsolete/structurally deficient and needs replacement.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety;

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.11: Encourage the retention and continued evolution of the lower Arsenal into a historic/cultural/commercial/industrial center of mutually compatible uses.

Goal 2.15: Provide a comprehensive system of pedestrian and bicycle routes which link the various components of the community: employment centers, residential areas, commercial areas, schools, parks, and open space.

Goal 2.16: Ensure access needs of individuals with disabilities.

Goal 2.20: Provide a balanced street system to serve automobiles, pedestrians, bicycles, and transit, balancing vehicle-flow improvements with multi-modal considerations.

Goal 2.25: Improve auto and non-auto access into the Old Arsenal, without disrupting existing neighborhood, historic, and environmental values.

Goal 2.28: Improve and maintain public facilities and services.

Goal 3.11: Enhance the East Side.

Goal 4.1: Make community health and safety a high priority for Benicia.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.					50,000			50,000
Total					50,000			50,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Gas Tax (GAS)					50,000			50,000
Total					50,000			50,000

# City of Benicia, California

Project # T-124

Project Name Sidewalk Program & ADA Upgrade

Type Maintenance Department Public Works
Useful Life 15-20 years Contact Public Works Director
Category Transportation Related Priority Level 2 - Unfunded

Account No.

Status Active



## Description

This project consists of the annual sidewalk repairs and/or remove or replace non-compliance ADA curb ramps without the City.

#### Justification

Annual sidewalk repair and/or remove or replace accessible curb ramps.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety;

Strategic Issue 4: Preserving and Enhancing Infrastructure; and

Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.4: Ensure that development pays its own way.

Goal 2.12: Strengthen the Downtown as the City's central commercial zone.

Program 12.12. J: Maintain public parks, streets, and sidewalks located Downtown in a clean and safe condition.

Goal 2.14: Enchance Benicia's small-town atmoshpere of pedestrian-friendly streets and neighborhoods.

Goal 2.15: Provide a comprehensive system of pedestrian and bicycle routes which link the various components of the community:

employment centers, residential areas, commercial areas, schools, parks, and open space.

Goal 2.16: Ensure access needs of individuals with disabilities.

Program 2.16.1: Provide for adequate public access in all forms (walks, buildings, transportation) in conformance with the Americans for Disabilities Act (ADA).

Goal 2:17: Provide an efficient, reliable, and convenient transit system.

Goal 2.20: Provide a balanced street system to serve automobiles, pedestrians, bicycles, and transit, balancing vehicle-flow improvements with multi-modal considerations.

Goal 2.21: Encourage Benicia residents and employees to use alternatives to the single-occupant automobile.

Goal 2.22: Alleviate traffic congestion near school sites.

Goal 2.25: Improve auto and non-auto access into the Old Arsenal, without disrupting existing neighborhood, historic, and environmental values.

Goal 2.28: Improve and maintain public facilities and services.

Goal 3.8: Preserve First Street as the community focal point of Benicia.

Goal 3.11: Enhance the East Side.

Goal 4.9: Ensure clean air for Benicia residents.

Goal 4.10: Support improved regional air quality.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Construction Costs	75,000	75,000	75,000	75,000	75,000	75,000		450,000
Total	75,000	75,000	75,000	75,000	75,000	75,000		450,000
_								
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Gas Tax (GAS)	50,000	50,000	50,000	50,000	50,000	50,000		300,000
Grant or Funded by Third Party (G)	25,000	25,000	25,000	25,000	25,000	25,000		150,000
Total	75,000	75,000	75,000	75,000	75,000	75,000		450,000

'19/'20 thru '23/'24

# City of Benicia, California

Bud	get	Im	pact/	O	thei
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\$25K is funded annually from ABAG (City Attorney).

\$100K is unfunded (Measure C is a possible funding source)

#### '19/'20 thru '23/'24

# Capital Improvement Plan

# City of Benicia, California

Project # T-126

Project Name Annual Traffic Calming Projects

Type Improvement Department Public Works
Useful Life 20 years Contact Public Works Director
Category Transportation Related Priority Level 2 - Unfunded

Account No.

Status Active



#### Description

This project consists of addressing traffic calming projects from the Traffic Pedestrian & Bicycle Safety (TPBS) Committee throughout the citywide.

#### Justification

Address traffic calming projects from the Traffic Pedestrian & Bicycle Safety (TPBS) Committee throughout the citywide.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety; Strategic Issue 4: Preserving and Enhancing Infrastructure; and Strategic Issue 5: Maintain and Enhance a High Quality of Life

General Plan Goals, Programs, and Policies:

Goal 2.14: Enchance Benicia's small-town atmoshpere of pedestrian-friendly streets and neighborhoods.

Goal 2.15: Provide a comprehensive system of pedestrian and bicycle routes which link the various components of the community: employment centers, residential areas, commercial areas, schools, parks, and open space.

Goal 2.16: Ensure access needs of individuals with disabilities.

Goal 2.20: Provide a balanced street system to serve automobiles, pedestrians, bicycles, and transit, balancing vehicle-flow improvements with multi-modal considerations.

Program 2.20. E: Identify streets where traffic should be slowed.

Program 2.20. F: Consider lane narrowing, driver education, traffic speed alert trailers, and other traffic calming remedies.

Goal 2.21: Encourage Benicia residents and employees to use alternatives to the single-occupant automobile.

Goal 2.22: Alleviate traffic congestion near school sites.

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.34: Ensure adequate school facilities to serve all residential areas.

Goal 4.1: Make community health and safety a high priority for Benicia.

Goal 4.9: Ensure clean air for Benicia residents.

Goal 4.10: Support improved regional air quality.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.				25,000	25,000	25,000		75,000
Construction Costs				100,000	100,000	100,000		300,000
Total				125,000	125,000	125,000		375,000
							_	m . 1
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Funding Sources Unfunded (UF)	Prior	'19/'20	'20/'21	'21/'22 125,000	'22/'23 125,000	'23/'24 125,000	Future	Total 375,000

### Budget Impact/Other

Measure C can be a potential funding source.

#### '19/'20 thru '23/'24

# City of Benicia, California

Project # T-132

Project Name East 2nd St. Bridge Repair

Type Maintenance
Useful Life 15-20 years
Category Bridges

Department Public Works

Contact Public Works Director

Priority Level 2 - Unfunded

Account No.

Status Active



# Description

Repair two sections of the East 2nd Street bridge per 2016 CalTrans Bridge Report.

Bridge #23C0068 & #23C0069

#### Justification

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety;

Strategic Issue 4: Preserving and Enhancing Infrastructure.

General Plan Goal(s), Program(s), and Policies:

Goal 2.28:Improve and maintain public facilities and services.

Goal 3.9:Protect and enhance scenic roads and highways.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.						200,000		200,000
Construction Costs						1,000,000		1,000,000
Construction Management						200,000		200,000
Contingency						250,000		250,000
Total						1,650,000		1,650,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)						1,650,000		1,650,000
Total						1,650,000		1,650,000

### Budget Impact/Other

State Bridge Program is a potential funding source.

Project # T-133

Project Name Park Road Bridge Repair

Type Maintenance
Useful Life 15-20 years
Category Bridges

Department Public Works

Contact Public Works Director

Priority Level 2 - Unfunded

Account No.

Status Active



# Description

Repair and maintenance of Park Road bridge #23C0155 per CalTrans Bridge Report.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety;

Strategic Issue 4: Preserving and Enhancing Infrastructure.

General Plan Goal(s), Program(s), and Policies:

Goal 2.28:Improve and maintain public facilities and services.

Goal 3.9:Protect and enhance scenic roads and highways.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.						200,000		200,000
Construction Costs						1,000,000		1,000,000
Construction Management						200,000		200,000
Contingency						250,000		250,000
Total						1,650,000		1,650,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)						1,650,000		1,650,000
Total						1,650,000		1,650,000

### Budget Impact/Other

State Bridge Program is a potential funding source.

# City of Benicia, California

Project # T-135

Project Name West Channel Bridge Repair

Type Maintenance
Useful Life 15-20 years
Category Bridges

Department Public Works

Contact Public Works Director

Priority Level 2 - Unfunded

'19/'20 thru '23/'24

Account No.

Status Active



# Description

Repair and maintenance of West Channel bridge #23C0213 per CalTrans bridge report.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety;

Strategic Issue 4: Preserving and Enhancing Infrastructure.

General Plan Goal(s), Program(s), and Policies:

Goal 2.28:Improve and maintain public facilities and services.

Goal 3.9:Protect and enhance scenic roads and highways.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.						200,000		200,000
Construction Costs						1,000,000		1,000,000
Construction Management						200,000		200,000
Contingency						250,000		250,000
Total						1,650,000		1,650,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)						1,650,000		1,650,000
Total						1,650,000		1,650,000

### Budget Impact/Other

State Bridge Program is a potential funding source.

Project # T-137

Project Name HSIP Pedestrian Crossing Improvement Project

Type Replacement Department Public Works
Useful Life 20 years Contact Public Works Director
Category Transportation Related Priority Level 1 - Funded

Account No.

Status Active



### Description

The HSIP Pedestrian Crosssing Improvement Project consist enhancing pedestrian crossings by installing ADA curb ramps, RRFB system, median island, and sidewalk, and other relevant elements at the intersections of Military West & West 5th Street and Hasting Drive & London Drive

#### Justification

Pedestrian improvements to area.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety;

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.16: Ensure access needs of individuals with disabilities.

Goal 2.20: Provide a balanced street system to serve automobiles, pedestrians, bicycles, and transit, balancing vehicle-flow improvements with multi-modal considerations.

Goal 2.28: Improve and maintain public facilities and services.

Goal 3.11: Enhance the East Side.

Goal 4.1: Make community health and safety a high priority for Benicia.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.		28,000						28,000
Construction Costs		184,605						184,605
Construction Management		28,000						28,000
Contingency		18,495						18,495
Total		259,100						259,100
Funding Sources								
I unumg Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Gas Tax (GAS)	Prior	9,100	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total 9,100
	Prior		'20/'21	'21/'22	'22/'23	'23/'24	Future	

### Budget Impact/Other

100% funded by HSIP Cycle 9 (no local match)

# City of Benicia, California

Project # T-138

Project Name HSIP Guardrail Replacement Project

Type Replacement

Department Public Works

Useful Life

Contact Public Works Director

Category Transportation Related

Priority Level 1 - Funded

Account No.

Status Active



# Description

The HSIP Guardrail Replacement Project consists of upgrading existing guardrails and end treatments at 28 locations in the City.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety;

Strategic Issue 2: Protecting and Enhancing the Environment;

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.24: Continue to provide safe and direct access to the Industrial Park.

Goal 2.28: Improve and maintain public facilities and services.

Goal 3.9: Protect and enhance scenic roads and highways.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.		135,000						135,000
Construction Costs			761,000					761,000
Construction Management			100,000					100,000
Total		135,000	861,000					996,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Grant or Funded by Third Party (G)		135,000	861,000					996,000
Total		135,000	861,000					996,000

### Budget Impact/Other

100% funded by HSIP Cycle 9 (no local match)

# **Water Projects**

No.	Project Name	Project No.
1	Master Plan Update	WO-016
2	P-2 Pump Station Motor Control Center Replacement	WO-024
3	Treated Water Flowmeter Replacement Project	WO-059
4	Drolette Way 8-inch Reliability Loop	WO-081
5	W 7th St 12-inch Water Main & PRV Imprv (50%)	WO-082
6	Recoating of R2 Reservoir	WO-091
7	Chlorine Gas Conversion Project	WO-101
8	Water Line Replacement Program	WO-102
9	Cordelia Transmission Main Replacement	WO-109
10	Cordelia 24" Transmission Main Isolation Valves	WO-117
11	Raw Water Transm. Line Air Relief Valves (27)	WO-120
12	Backwash Pump #3, 200HP motor, 12,000 gpm pump	WO-121
13	Valero Magmeter Flow Meters	WO-122
14	12" Water Main in West 7th for Zone 3	WO-139
15	Water Treatment Plant Ozone Treatment	WO-141

### Project Code

BR	Building Renovations
FD	Fire Department
MC	Measure C
MP	Misc. Project
Р	Parks
Т	Transportation
WO	Water Operation
WWO	Wastewater Operation



Project # WO-016

Project Name Water Master Plan Update

Type Replacement

Department Public Works

Useful Life

Contact Public Works Director

Category Water Operations

Priority Level 1 - Funded

Account No.

Status Active



#### Description

The update will evaluate the City's water treatment, storage, and distribution systems and make recommendations for needed improvements over the next ten years.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Progams, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.36: Ensure an adequate water supply for current and future residents and businesses.

Goal 2.38: Protect water quality.

Goal 2.39: Provide safe drinking water and improve its taste and odor.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.	150,000	275,000						425,000
Total	150,000	275,000						425,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Capacity Fund (WWC)	75,000	137,500						212,500
Wastewater Operations Fund (WWO)	75,000	137,500						212,500
Total	150,000	275,000						425,000

# City of Benicia, California

Project # WO-024

Project Name P-2 Pump Station Motor Control Center Replacement

Type Replacement Department Public Works
Useful Life 20 years Contact Public Works Director
Category Water Line Projects (Raw Water Priority Level 1 - Funded

Account No. 760-8021-9999

Status Active



### Description

The P-2 Pump Station Motor Control Center Replacement Project consists of replacing the Motor Control Center (MCC) at the P-2 Pump Station. The original pump station was constructed in 1969 with two pumps. The station was expanded to 4 pumps in 1971 during the building of the 3 million gallon reservoir (R-3B).

Recommended in 2012 Water Master Plan.

#### Justification

The MCCs were upgraded to soft start in 2000, but the main electrical breakers, relays, and starters have reached the end of their useful life.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Progams, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.36: Ensure an adequate water supply for current and future residents and businesses.

Goal 2.38: Protect water quality.

Goal 2.39: Provide safe drinking water and improve its taste and odor.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.		60,000						60,000
Furnishings & Equipment		240,000						240,000
Total		300,000						300,000
_								
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Water Operations Fund (WO)		300,000						300,000
Total		300,000						300,000

#### Budget Impact/Other

One-time replacement project; no design.

Project # WO-059

Project Name Treated Water Flowmeter Replacement Project

Type Replacement

Department Public Works

Useful Life

Contact Public Works Director

Category Water Operations

Priority Level 1 - Funded

Account No.

Status Active



#### Description

Purchase WTP Production Magnetic Meter Replacement

Previous Description:

Installation of an insertion probe magmeter to measure total flow from raw water pumping stations before diversion structure; and the installation of a flow control valve after the diversion structure to adjust applied water level within water treatment plant.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Progams, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.36: Ensure an adequate water supply for current and future residents and businesses.

Goal 2.39: Provide safe drinking water and improve its taste and odor.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Construction Costs		200,000						200,000
Total		200,000						200,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Water Operations Fund (WO)		200,000						200,000
Total		200,000						200,000

Project # WO-081

Project Name Drolette Way 8-inch Reliability Loop

Type Improvement Department Public Works

Useful Life 60 years Contact Public Works Director

Category Water Line Projects (Treated Wa Priority Level 1 - Funded

Account No. 760-8021-9999

Status Active



### Description

The Drolette Way 8-inch Reliability Loop Project consists of a new 8-inch Water Line to Loop Drolette Way with Corrigan Court. The loop pipe will be constructed in the existing easement to improve water quality and address low pressures and velocities to provide fireflow capacity. Installation of 250 linear feet.

### Justification

This project is needed to improve water quality and address low pressures and velocities to provide improved capacity.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.36: Ensure an adequate water supply for current and future residents and businesses.

Goal 2.38: Protect water quality.

Goal 2.39: Provide safe drinking water and improve its taste and odor.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.			8,000					8,000
Construction Costs			40,000					40,000
Construction Management			3,000					3,000
Total			51,000					51,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
i diidiig bodi ees	F 1 101	19/ 20	20/ 21	21/22	22/ 23	23/ 24	ruture	1 Otal
Water Operations Fund (WO)	71101	19/ 20	51,000	21/ 22	221 23	23/ 24	Future	51,000

#### Budget Impact/Other

Rate funded.

## City of Benicia, California

Project # WO-082

Project Name W 7th St 12-inch Water Main & PRV Imprv (50%)

Type Improvement Department Public Works
Useful Life 60yrs pipe 20yrs PR Contact Public Works Director
Category Water Line Projects (Treated Wa Priority Level 1 - Funded

Account No. 770-8022-999 & TBD

Status Active



### Description

The West 7th Street 12-inch Water Main & Pressure Reducing Valve (PRV) Improvement Project is required to address low residual pressures to provide improved capacity, based on Water Master Plan. Also addresses operational reliability issue. Replaces 3,600 linear feet of 8-inch pipe between West 6th Street and Plaza del Oro to bolster flows at Benicia High School and the west side of Zone 1.

#### Justification

This project will improve capacity.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.36: Ensure an adequate water supply for current and future residents and businesses.

Goal 2.38: Protect water quality.

Goal 2.39: Provide safe drinking water and improve its taste and odor.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.		145,000						145,000
Construction Costs			580,000					580,000
Construction Management			87,000					87,000
Contingency			145,000					145,000
Total		145,000	812,000					957,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Water Capacity Fund (WC)		72,500	406,000					478,500
Water Operations Fund (WO)		72,500	406,000					478,500
Total		145,000	812,000					957,000

### Budget Impact/Other

This CIP would require a budget adjustment.

\$40K assessment, \$80K design, \$500K construction

10/10/18 Notes: This CIP was not in the 2016 rate study. PW Staff added it to the CIP in January 2018 and it was part of a 4/17/18 City Council report with revised CIPs (see Attachment 3, Table B.) At that time the cost shown was \$20K for an assessment in FY 19/20, \$290 for design and construction in FY 20/21 (\$40K design and \$250 construction.) This project is split 50% operations/rates and 50% capacity. So the other 50% funded from capacity did not show on the "rate-funded water CIP" on 4/17/18.

On 10/10/18 changed design from \$40K to \$145K, added 25% or \$145K contingency; and added 15% or \$87K construction management.

# City of Benicia, California

Project # WO-091

Project Name Recoating of R2 Reservoir

Type Maintenance Department Public Works
Useful Life 15-20 years Contact Public Works Director
Category Water Operations Priority Level 1 - Funded

Account No. 760-8021-9999

Status Active



### Description

The Recoating of the "R2" (Reservoir #2) Reservoir consists of recoating the treated water reservoir located on East Second Street, across from the City's Corporation Yard. R2 was last recoated in 1995. The tank is inspected and cleaned every 3 years. The past 3 inspections have recommended a new interior coating. Useful coating life is approximately 15-20 years.

#### Justification

New coating is required since paint is scaling.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.36: Ensure an adequate water supply for current and future residents and businesses.

Goal 2.38: Protect water quality.

Goal 2.39: Provide safe drinking water and improve its taste and odor.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.		70,000						70,000
Construction Costs		280,000						280,000
Construction Management		42,000						42,000
Contingency		70,000						70,000
Total		462,000						462,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
		400,000						
Water Operations Fund (WO)		462,000						462,000
Total		462,000						462,000

### Budget Impact/Other

Rate funded.

One-time recoating project; no design.

10/11/18 added 25% or \$70K contingency and 15% or \$42K construction management.

# City of Benicia, California

Project # WO-101

Project Name Chlorine Gas Conversion Project

Type Improvement Department Public Works
Useful Life 20 years Contact Public Works Director
Category Water Operations Priority Level 1 - Funded

Account No. 760-8021-9999

Status Active



### Description

The Chlorine Gas Conversion Project consists of pursuing disinfection via bulk storage. Maintaining compliance with chlorine gas disinfection processes is becoming increasingly stringent and onerous from a regulatory perspective.

#### Justification

Increasing regulatory demands is encouraging staff to migrate away to bulk hypochlorite.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety Strategic Issue 2: Protecting and Enhancing the Environment

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.36: Ensure an adequate water supply for current and future residents and businesses.

Goal 2.38: Protect water quality.

Goal 2.39: Provide safe drinking water and improve its taste and odor.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.	420,000							420,000
Construction Costs		1,200,000						1,200,000
Construction Management		200,000						200,000
Furnishings & Equipment		200,000						200,000
Total	420,000	1,600,000						2,020,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Water Operations Fund (WO)	420,000							420,000
Total	420,000	1,600,000						2,020,000

#### **Budget Impact/Other**

This CIP requires a budget adjustment.

On February 20, 2018 City Council approved an Architect/Engineer Agreement with West Yost Associates at a cost not-to-exceed \$419,614 for the Chlorine Gas Conversion Project.

10/11/18 moved all costs from FY 18/19 to FY 19/20.

Project # WO-102

Project Name Water Line Replacement Program

Type Maintenance Department Public Works
Useful Life 60-80 years Contact Public Works Director
Category Water Operations Priority Level 1 - Funded

Account No. 750-8021-7087

Status Active



### Description

The Water Line Replacement Program consists of anticipated repairs not covered within the maintenance budget. Unused funds carry over into the next fiscal year.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.36: Ensure an adequate water supply for current and future residents and businesses.

Goal 2.38: Protect water quality.

Goal 2.39: Provide safe drinking water and improve its taste and odor.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.	92,000	92,000	92,000	92,000	92,000	92,000	276,000	828,000
Construction Costs	368,000	368,000	368,000	368,000	368,000	368,000	1,104,000	3,312,000
Total	460,000	460,000	460,000	460,000	460,000	460,000	1,380,000	4,140,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Water Operations Fund (WO)	460,000	460,000	460,000	460,000	460,000	460,000	1,380,000	4,140,000
Total	460,000	460,000	460,000	460,000	460,000	460,000	1,380,000	4,140,000

### Budget Impact/Other

Rate funded.

# City of Benicia, California

Project # WO-109

Project Name Cordelia Transmission Main Replacement

Type Replacement

Department Public Works

Useful Life

Contact Public Works Director

Category Water Operations

Priority Level 2 - Unfunded

Account No.

Status Active



### Description

The existing 24-inch Cordelia Transmission Main (CTM) was built in 1968. The main was installed as a temporary conduit until the North Bay Aqueduct was built in 1988. The CTM has suffered three failures in recent years: 2014, South Napa Earthquake, leak located under I-80; and 2017, leak located under Hwy 12. The overall condition of the CTM is suspect, and prior repairs have put the CTM out of commission for months at a time while repairs are coordinated and completed.

#### Justification

This pipeline is impaired. The proposed line replacement realigns the CTM away from Hwy 12 and ties in to the NBA line east of the I-80/I-680 junction as a new 30-inch pipeline.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

#### General Plan Goals:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.36: Ensure an adequate water supply for current and future residents and businesses.

Goal 2.38: Protect water quality.

Goal 2.39: Provide safe drinking water and improve its taste and odor.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.					350,000			350,000
Construction Costs						4,250,000		4,250,000
Construction Management						100,000		100,000
Total					350,000	4,350,000		4,700,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)					350,000	4,350,000		4,700,000
Total					350,000	4,350,000		4,700,000

### Budget Impact/Other

FY 18/19 cost is for emergency repair work by Ghilotti Construction. \$75K is a placeholder.

Pursue SRF Loan for this CIP (not rate funded.)

10/10/18 Moved project forward two years (from FY 20-22 to FY 22-24.)

# City of Benicia, California

Project # WO-117

Project Name Cordelia 24" Transmission Main Isolation Valves

Type Improvement

Department Public Works

Useful Life

Contact Public Works Director

Category Water Operations

Priority Level 1 - Funded

Account No. 750-8021-7087

Status Active



## Description

Install new isolation valve at Cordelia Pump Station.

#### Justification

Prevent the need to drain ~3,000 feet in order to do work.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Progams, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.36: Ensure an adequate water supply for current and future residents and businesses.

Goal 2.38: Protect water quality.

Goal 2.39: Provide safe drinking water and improve its taste and odor.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Construction Costs			150,000					150,000
Total			150,000					150,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Water Operations Fund (WO)			150,000					150,000
Total			150,000					150,000

#### Budget Impact/Other

10/11/18 Increased the cost from \$65K to \$150K and moved from FY 19/20 to 21/22.

Project # WO-120

Project Name Raw Water Transm. Line Air Relief Valves (27)

Type Replacement

Department Public Works

Useful Life

Contact Public Works Director

Category Water Operations

Priority Level 1 - Funded

Account No. 750-8021-7087

Status Active



### Description

Replace existing raw water line air relief valves and existing drain valves.

### Justification

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Contingency						75,000		75,000
Other					0			0
Total					0	75,000		75,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Water Operations Fund (WO)						75,000		75,000
Total						75,000		75,000

# City of Benicia, California

Project # WO-121

Project Name Backwash Pump #3, 200HP motor, 12,000 gpm pump

Type Replacement

Department Public Works

Useful Life

Contact Public Works Director

'19/'20 thru '23/'24

Category Water Operations

Priority Level 1 - Funded

Account No.

Status Active



## Description

Design a pump and motor control system to incorporate redundancy with two-pump system. Include soft-start technology with tank level controls, or a variable frequency drive system.

#### Justification

Using water from the BW P#3 is regulatory compliant for drinking water at the WTP site. The existing system does not provide adequate pressure for drinking water.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, Policies:

Goal 2.28: Improve and maintain public facilities and services.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Contingency						20,000		20,000
Other					0			0
Total					0	20,000		20,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Water Operations Fund (WO)						20,000		20,000
Total	·	·	·	·	·	20,000	·	20,000

Project # WO-122

Project Name Valero Magmeter Flow Meters

Type Replacement

Department Public Works

Useful Life Category Water Operations Contact Public Works Director

Priority Level 2 - Unfunded

Account No.

Status Active



## Description

Replace existing raw water meters (2) to Valero.

#### Justification

To improve water quantity measurement.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, Policies:

Goal 2.28: Improve and maintain public facilities and services.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Construction Costs			60,000					60,000
Construction Management			9,000					9,000
Furnishings & Equipment			30,000					30,000
Contingency			6,000					6,000
Total			105,000					105,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Water Operations Fund (WO)			105,000					105,000
Total	·	·	105,000	·	·	·	·	105,000

### Budget Impact/Other

10/11/18 Increased cost from \$15K to \$105K (\$30K for meters, \$60K for construction, 10% or \$6K for contingency and \$15% or \$9K for construction management) and moved up from FY 23/24 to FY 19/20. Put as "undetermined" funding for now (could be funded from preventative maintenance.)

Project # WO-139

Project Name 12" Water Main in West 7th for Zone 3

Type Improvement Department Public Works
Useful Life Contact Public Works Director
Category Water Line Projects (Treated Wa Priority Level 1 - Funded

Account No.

Status Active



### Description

Install a new 1,300 foot long, 12-inch diameter pipeline from Southampton Road to Lori Drive across I-780 to provide additional capacity for Zone 3-A. This pipeline will also provide redundancy in source to Zone 3-A.

This project is identified in the 2012 Water Master Plan (Project #7 for \$190,000.) The cost has been inflated to \$220,000.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, Policies:

Goal 2.28: Improve and maintain public facilities and services.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Construction Management						220,000		220,000
Other					0			0
Total					0	220,000		220,000
_								
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Water Operations Fund (WO)						220,000		220,000
Total						220,000		220,000

## City of Benicia, California

Project # WO-141

Project Name Water Treatment Plant Ozone Treatment

Type Improvement Department Public Works
Useful Life Contact Public Works Director
Category Water Operations Priority Level 2 - Unfunded

Account No.

Status Active



#### Description

The City currently experiences poor water quality (tastes and odors) from seasonal fluctuations in raw water quality. This project would include Ozone as a treatment Chemical. Ozone is the most powerful oxidant available; ozone has a greater disinfection effectiveness against bacteria and viruses compared to chlorination, and can be applied to the pre-treatment process in two-stages, as a pre-oxidant for coagulation, and added to the water after it has settled during the flocculation/sedimentation process. Ozone can also be added to post-filtration treatment, significantly reducing the amount of chlorine needed to maintain an active disinfectant residual in the water distribution system.

#### Justification

Ozone is a valid treatment technique, a powerful oxidant that can be used to destroy the parasites, bacteria, viruses, and even residual pesticides that are often present in surface water sources and improves water quality by removing taste and odor.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, Policies:

Goal 2.28: Improve and maintain public facilities and services.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.				1,000,000	3,500,000			4,500,000
Construction Costs						23,100,000		23,100,000
Other							170,000	170,000
Total				1,000,000	3,500,000	23,100,000	170,000	27,770,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)				1,000,000	3,500,000	23,100,000	170,000	27,770,000
Total				1,000,000	3,500,000	23,100,000	170,000	27,770,000

#### Budget Impact/Other

Not rate-funded. Could potentially obtain an SRF Loan.

10/10/18 \$1M for feasibility in FY 20/21; increased design from \$1.4M to 3.5M and moved from FY 21/22 to FY 22/23; increased construction from \$14M to \$23.1M and moved from FY 22/23 to FY 23/24.

What is the \$85K for in FY 25 and 26? (I moved them from FY 23/24 and 24/25 to FY 24/25 and 25/26.)

# **Wastewater Projects**

No.	Project Name	Project No.
1	Water Reuse Project	WWO-010
2	Sewer Master Plan Update	WWO-013
3	Cathodic Protection Improvements	WWO-014
4	Digester Cleaning	WWO-018
5	Modify Belt Filter Press	WWO-021
6	Overhaul Natural Gas Genset	WWO-025
7	E. 7th St. Sewerline Replacement	WWO-032
8	Boiler Replacement	WWO-046
9	Bayshore Road Gravity Main Rehabilitation	WWO-052
10	Chemical Tank Replacement at WWTP	WWO-058
11	Influent Pumps Rehabilitation	WWO-060
12	Bayshore Road Forcemain Sanitary Sewer	WWO-061
	Crossovers	
13	East Channel Road Sewerline Improvement Project	WWO-063
14	Recoat Concrete Channels	WWO-076
15	West H Pipeline Replacement	WWO-080
16	El Bonito Way Force Main Replacement	WWO-081
17	Sewer Line Replacement Program	WWO-082
18	Lift Station Upgrades	WWO-090
19	Gas Box	WWO-091
20	Solids Building Platforms (Belt Press & Cyclones)	WWO-092
21	Digester Gas Line above ground (digester to flare)	WWO-093
22	Rake Shaftless Screw	WWO-095

## Project Code

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BR	Building Renovations
FD	Fire Department
MC	Measure C
MP	Misc. Project
Р	Parks
Т	Transportation
WO	Water Operation
WWO	Wastewater Operation



## City of Benicia, California

Project # WWO-010

Project Name Water Reuse Project

Type Improvement

Department Public Works

Useful Life

Contact Public Works Director

Category Wastewater Operations

Priority Level 2 - Unfunded

Account No. 725-8032-9999

Status Active



## Description

The City has hired a consultant to prepare a feasibility study and environmental documents for the project that would further treat Wastewater Treatment Plant (WWTP) effluent to tertiary recycled water standards and provide recycled water to Valero for use in cooling towers. If constructed, this project could reduce the City's need for imported water by more than 20%, allowing the banking of water during wet years for use in future droughts.

The feasibility study is complete. With the selection of the preferred conveyance alignment, work on the CEQA part of the project has started, which is the critical path for the project to meet the target of submitting a completed application for State grants and loans by the end of 2016. The City Council will be presented with options before the Project moves to the design phase. More information is available at www.ci.benicia.ca.us/waterreuse project.

Funding: Wastewater Capacity Fund

Budget: \$901,545 FY 15/16 and \$200,000 FY 16/17 Schedule: Notice to Proceed - August 25, 2015

Completion of Feasibility Study - June 2016

Completion of Environmental Review - November 2016 Submit complete Application for State grant funding - TBD

Design - TBD

Construction -- TBD

City Council approved the consultant contract on 8/18/15 with a request for review of the project scope. Effluent characterization study started 9/14/15.

The project will provide up to 2 million gallons per day of treated effluent from the City's wastewater treatment plant.

FY 15/16 through 18/19 expenditures were for the feasibility study and environmental documents. The future years expenditures are for design, construction, 35% contingency, construction management (including pilot testing).

#### Justification

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

General Plan Goals, Progams, and Policies:

Goal 2.36: Ensure an adequate water supply for current and future residents and businesses.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.	1,106,545					4,600,000		5,706,545
Construction Costs						17,300,000		17,300,000
Construction Management						5,200,000		5,200,000
Contingency						6,000,000		6,000,000
Total	1,106,545					33,100,000		34,206,545
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Unfunded (UF)						33,100,000		33,100,000

Wastewater Capacity Fund	1,106,545	1,106,545
(WWC)		

Total 1,106,545 33,100,000 34,206,545

## Budget Impact/Other

As of June 2016, the construction estimate is \$27,300,000.

As of Nov 2017, the construction estimate is \$28,600,000.

1/11/19 Construction-related costs were increased by 3% for 5 years for escalation for a revised construction estimate of \$33.1M.

FY 18/19 USBR required an additional \$5,000 for finalizing the environmental documents.

Additionally, this project requires ongoing operating costs. The estimated annual operating costs were \$1.25 as of Nov 2017. Assuming 3% escalation for 5 years the revised estimate is \$1.45M.

Project # WWO-013

Project Name Sewer Master Plan Update

Type Improvement

Department Public Works

Useful Life

Contact Public Works Director

Category Wastewater Operations

Priority Level 1 - Funded

Account No.

Status Active



## Description

An update of the 2011 Wastewater System Master Plan is recommended. The Plan would provide information on the construction, operation and maintenance of the wastewater collection and treatment facilities through 2035. It would include the use of a sewer model to identify and analyze required capacity improvements for major sewer pipelines and Capital Improvement Projects are recommended based on the results.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.	150,000	275,000						425,000
Total	150,000	275,000						425,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Capacity Fund (WWC)	75,000	137,500						212,500
Wastewater Operations Fund (WWO)	75,000	137,500						212,500
Total	150,000	275,000						425,000

## Budget Impact/Other

Project # WWO-014

Project Name Cathodic Protection Improvements

Type Improvement Department Public Works
Useful Life 30 years Contact Public Works Director
Category Wastewater Operations Priority Level 1 - Funded

Account No. 720-8031-9999

Status Active



#### Description

Conduct a pipe assessment in FY 18/19. Design cathodic protection in FY 19/20. A large portion of the cathodic protection system installed during the WWTP Improvement Project (yr. 2000) has failed. This system minimizes pipe and system corrosion. A system evaluation and recommendations report was issued and corrective actions are necessary.

#### Justification

This project minimizes pipe and system corrosion.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.		100,000						100,000
Construction Costs			400,000					400,000
Construction Management			40,000					40,000
Assessment	100,000							100,000
Total	100,000	100,000	440,000					640,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Operations Fund (WWO)	100,000	100,000	440,000					640,000
Total	100,000	100,000	440,000					640,000

#### Budget Impact/Other

Rate funded.

10/4/18 added \$100K in FY 18/19 for pipe assessment.

## City of Benicia, California

Project # WWO-018

Project Name Digester Cleaning

Type Maintenance

Department Public Works

Useful Life

Contact Public Works Director

Category Wastewater Operations

Priority Level 1 - Funded

Account No. 710-8030-7087

Status Active



## Description

The WWTP has three digesters. Digesters #2 and #3 are used to treat waste solids. These digesters should be cleaned to remove grit, rags and plastics every 10 years. Digester #1 is a backup unit and does not require cleaning at this time.

#### Justification

Equipment has reached the end of its usefule life cycle.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Contingency			200,000				120,000	320,000
Total			200,000				120,000	320,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Operations Fund (WWO)			200,000				120,000	320,000
Total	•		200.000			•	120.000	320,000

## Budget Impact/Other

Rate funded.

\$200,000 is budgeted in FY 18/19 014-8305-8800. Defer to FY 2019-2021 budget cycle.

No design; this project is for cleaning.

#### '19/'20 thru '23/'24

## Capital Improvement Plan

## City of Benicia, California

Project # WWO-021

Project Name Modify Belt Filter Press

Type Maintenance

Department Public Works

Useful Life

Contact Public Works Director

Category Wastewater Operations

Priority Level 1 - Funded

Account No. 710-8030-7087

Status Active



## Description

Modify the 2.0 meter and 1.5 meter belt filter presses to enhance operational efficiencies.

#### Justification

Equipment modifications to optimize efficiencies.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total	
Furnishings & Equipment		100,000 100,000							
Total				100,000			100,000	200,000	
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total	
Wastewater Operations Fund (WWO)				100,000			100,000	200,000	
Total				100,000			100,000	200,000	

## Budget Impact/Other

Rate funded.

\$100,000 is budgeted in FY 18/19. Defer to FY 21/22.

Material only; no design necessary.

Project # WWO-025

Project Name Overhaul Natural Gas Genset

Type Maintenance Department Public Works

Useful Life Contact Public Works Director
Category Wastewater Operations Priority Level 1 - Funded

Thorny Boton Tund

Account No. 710-8030-7087

Status Active



## Description

Major overhaul of the 1000 kW backup generator at the WWTP based on usage runtime.

#### Justification

Equipment needs to be upsized because of load requirements.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total		
Contingency					100,000			100,000		
Total		100,000								
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total		
Wastewater Operations Fund (WWO)					100,000			100,000		
Total					100,000			100,000		

#### Budget Impact/Other

Rate funded.

Re-build project; no design necessary.

## City of Benicia, California

Project # WWO-032

Project Name E. 7th St. Sewerline Replacement

Type Replacement Department Public Works
Useful Life 60 years Contact Public Works Director
Category Wastewater Line Projects Priority Level 1 - Funded

Account No. 720-8031-9999

Status Active



#### Description

The East 7th Street Sewerline Replacement Project consists of form in place liner 510-feet in length from 616 East K Street to Manhole #12256, Manhole #12255, Manhole #12254, and Manhole #0 at 645 East J Street. An assessment of the eastern contributor to 7th Street Lift Station will also be conducted as part of this pipeline rehabilitation project.

Note: Fold And Form

#### Justification

Regular on-going pipeline rehabilitation.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.		43,000						43,000
Construction Costs		173,000						173,000
Construction Management		17,000						17,000
Contingency		43,000						43,000
Assessment	30,000							30,000
Total	30,000	276,000						306,000
							_	
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Operations Fund (WWO)	30,000	276,000						306,000
Total	30,000	276,000						306,000

## Budget Impact/Other

Rate funded.

FY 18/19 is for TV assessment.

10/4/18 moved \$173,000 construction cost from FY 18/19 to FY 19/20 and added soft costs (25% design, 25% contingency and 10% construction management).

Project # WWO-046

Project Name Boiler Replacement

Type Replacement

Department Public Works

Useful Life

Contact Public Works Director

Category Wastewater Operations

Priority Level 1 - Funded

Account No. 710-8030-7087

Status Active



## Description

Replace both boilers used to heat the anaerobic digesters at the WWTP with higher efficiency and BAAQMD compliant units.

#### Justification

Replace boilers to comply with air regulations.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.				150,000				150,000
Construction Costs				300,000				300,000
Construction Management				45,000				45,000
Contingency				45,000				45,000
Total				540,000				540,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Operations Fund (WWO)				540,000				540,000
Total				540,000				540,000

#### Budget Impact/Other

Rate funded.

10/4/18 increased design from \$20K to \$75K for both boilers; moved \$150K for construction of one of the boilers from 19/20 to 20/21; added 15% contingency or \$45K (for above-ground); and added 15% construction management or \$45K.

## City of Benicia, California

Project # WWO-052

Project Name Bayshore Road Gravity Main Rehabilitation

Type Improvement Department Public Works
Useful Life 60-80 years Contact Public Works Director
Category Wastewater Line Projects Priority Level 1 - Funded

Account No. 720-8031-9999

Status Active



#### Description

•The Bayshore Road Gravity Main Rehabilitation Project consists of realigning the sanitary sewer main along Bayshore Road from Jackson Street to the City's Waste Water Treatment Plant due to sewer gas corrosion of pipeline materials.

#### Justification

Regular on-going pipeline replacement/rehabilitation cycle.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.	180,000							180,000
Construction Costs		650,000						650,000
Construction Management		98,000						98,000
Contingency		163,000						163,000
Assessment	20,000							20,000
Total	200,000	911,000						1,111,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Operations Fund (WWO)	200,000	911,000						1,111,000
Total	200,000	911,000						1,111,000

#### **Budget Impact/Other**

Rate funded.

10/4/18 Split \$200K in FY 18/19 to \$20K for pipe assessment and \$180K for design. Added soft costs to FY 19/20 (25% contingency and 15% for construction management for an underground project.)

Project # WWO-058

Project Name Chemical Tank Replacement at WWTP

Type Maintenance Department Public Works

Useful Life Contact Public Works Director
Category Wastewater Operations Priority Level 1 - Funded

Account No. 710-8030-7087

Status Active



#### Description

Two of the original chemical tanks that were installed during the 1998 WWTP Improvement Project have reached the end of their useful life cycle and need to be replaced. These two tanks store chemicals used in the WWTP odor scrubber system.

#### Justification

Tanks have reached the end of their useful life cycle.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Furnishings & Equipment				100,000				100,000
Total				100,000				100,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Operations Fund (WWO)				100,000				100,000
Total				100,000				100,000

## Budget Impact/Other

Rate funded.

Replacement project; no design necessary.

10/4/18 Increased cost from \$50K to \$100K and moved from FY 18/19 to FY 20/21. The 100K includes everything.

Project # WWO-060

Project Name Influent Pumps Rehabilitation

Type Maintenance

Useful Life Contact Public Works Director
Category Wastewater Operations Priority Level 2 - Unfunded

Thorny Ector 2 Children

Account No. 710-8030-7087

Status Active

Department Public Works



## Description

Replace each of the 3 influent pumps.

#### Justification

Pumps have reached the end of their useful life.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety Strategic Issue 4: Preserving and Enhancing Infrastructure

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.				100,000				100,000
Construction Management					60,000			60,000
Furnishings & Equipment					400,000			400,000
Contingency					60,000			60,000
Total				100,000	520,000			620,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Operations Fund (WWO)				100,000	520,000			620,000
Total				100,000	520,000			620,000

#### Budget Impact/Other

Rate funded.

Replacement project; no design necessary.

10/4/18 added \$100K (25%) for design in FY 21/22; added 15% or \$60K for contingency (above-ground), and added 15% or \$60K for construction management.

## City of Benicia, California

Project # WWO-061

Project Name Bayshore Road Forcemain Sanitary Sewer Crossovers

Type Replacement Department Public Works
Useful Life 60 years Contact Public Works Director
Category Wastewater Line Projects Priority Level 1 - Funded

Account No. 720-8031-9999

Status Active

#### Description

The Bayshore Road Forcemain Crossovers Project consists of crossing over connections from an 8" force main (FM) to the 12"/14" FM. The City installed a 12"/14" FM that runs along Bayshore from the Park lift station to E 7th St. A redundant 8" FM was installed in the late 1950's that runs parallel to the 12"/14" FM. The 8" FM has reached its useful life. All connections to 8" FM must be transferred to the 12"/14" FM prior to decommissioning.

#### Justification

Regular on-going pipeline replacement/rehabilitation cycle.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures		Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng	g.	150,000							150,000
Construction Costs			400,000						400,000
Construction Managemen	nt		60,000						60,000
Contingency			100,000						100,000
Tot	al	150,000	560,000						710,000
	_								
Funding Sources		Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Operations F (WWO)	und	150,000	560,000						710,000
Tot	al	150,000	560,000						710,000

#### Budget Impact/Other

Rate funded. No design.

Previous note: \$350K in FY 18/19 is for cleanouts (was \$400K.)

10/4/18 changed total project cost of \$515K in FY 18/19 to \$710K over FY 18/19 and 19/20. Breakout as follows: FY 18/19 \$50K crossover design and \$100K cleanout design. FY 18/19 \$200K crossover construction and \$200K cleanout construction; \$50K crossover contingency and \$50K cleanout contingency; \$30K crossover CM and \$30K cleanout CM.

## City of Benicia, California

Project # WWO-063

Project Name East Channel Sewerline Improvement Project

Type Replacement

Department Public Works

Useful Life

Contact Public Works Director

Category Wastewater Line Projects

Priority Level 1 - Funded

Account No. 725-8032-9999

Status Active



#### Description

The East Channel Sewerline Improvement Project consists of replacing the existing 12-inch pipe with 15-inch pipe from East 2nd Street to extension of Industrial Court; and 18-inch pipe from that point to Industrial Way; and protect the new sewerline by repaving the deteriorating roadway.

#### Justification

The 2011 Wastewater System Master identified the need to increase pipe size.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.		230,000						230,000
Construction Costs			2,910,000					2,910,000
Construction Management			230,000					230,000
Contingency			350,000					350,000
Total		230,000	3,490,000					3,720,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Capacity Fund (WWC)		230,000	3,490,000					3,720,000
Total		230,000						3,720,000

#### Budget Impact/Other

Water Capacity Fund

Project # WWO-076

Project Name Recoat Concrete Channels

Type Maintenance

Department Public Works

Useful Life

Contact Public Works Director

Category Wastewater Operations

Priority Level 1 - Funded

Account No. 710-8030-7087

Status Active



## Description

Recoat the concrete structure (headworks through primary clarifiers) to protect these structures from corrosion.

#### Justification

Rate funded. Part of ongoing plant maintenance activities.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures		Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Construction Cost	S	125,000	375,000						500,000
Construction Mana	agement	19,000	56,000						75,000
Contingency		19,000	56,000						75,000
	Total	163,000	487,000						650,000
Funding Source	es	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Opera (WWO)	ations Fund	163,000	487,000						650,000
	Total	163,000	487,000						650,000

#### Budget Impact/Other

\$125,000 budgeted in FY 17/18 014-8305-8800 and \$375,000 bugeted in FY 18/19 014-8305-8800.

No design necessary; this project is a spec bid.

10/4/18 added 15% contingency to each project/FY; and added 15% construction management to each project/FY.

Project # WWO-080

Project Name West H Pipeline Replacement

Type Replacement Department Public Works
Useful Life 60-80 years Contact Public Works Director
Category Wastewater Line Projects Priority Level 1 - Funded

Account No. 720-8031-9999

Status Active



#### Description

The West H Pipeline Replacement Project consists of an assessment and mitigation of a sewer pipeline on West H Street. This pipeline is exposed due to the shoreline eroding. An assessment will be conducted first to determine the impact to the pipeline by erosion. Both the assessment and mitigation are planned for Fiscal Year 2018/19.

#### Justification

Addresses manhole that may be impacted by erosion of the shoreline.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.	50,000							50,000
Construction Costs		202,000						202,000
Construction Management		30,000						30,000
Contingency		51,000						51,000
Total	50,000	283,000						333,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Operations Fund (WWO)	50,000	283,000						333,000
Total	50,000	283,000						333,000

#### Budget Impact/Other

Rate funded.

10/4/18 Moved construction and CM from FY 18/19 (\$303K) to FY 19/20 (\$283K), and changed FY 18/19 \$30K design to \$50K to include both design and permitting. No net cost increase. Used 25% contingency and 15% construction management.

## City of Benicia, California

Project # WWO-081

Project Name El Bonito Way Force Main Replacement

Type Replacement Department Public Works
Useful Life 60-80 years Contact Public Works Director
Category Wastewater Line Projects Priority Level 1 - Funded

Account No. 518-5357-9960

Status Active



## Description

The El Bonito Way Force Main Replacement Project consists of Installing a new 4-inch sewer force main approximately 626-feet in length from future sidewalk stub at Highlands lift station (107 El Bonito) to manhole #11914 at the intersection of El Bonito and Corte Dorado.

#### Justification

Ongoing replacement/rehabilitation of the City's sewer collection system.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.		60,000						60,000
Total		60,000						60,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Operations Fund (WWO)		60,000						60,000
Total		60,000						60,000

#### Budget Impact/Other

Rate funded.

Originally was \$35K for an assessment.

10/4/18 changed to \$60K for design engineering of a 4"x650' forcemain in the street.

Project # WWO-082

Project Name Sewer Line Replacement Program

Type Maintenance Department Public Works
Useful Life 60-80 years Contact Public Works Director
Category Wastewater Line Projects Priority Level 1 - Funded

Account No. 710-8031-7087

Status Active



#### Description

The Sewer Line Replacement Program consists of unanticipated repairs not covered within the maintenance budget. Unused funds carry over into the next fiscal year. The City spent \$16,000 in Fiscal Year 2017/18 on Cannon's assessment on the Manhole Relocation on West 10th Street (approved at 11/7/17 City Council meeting.)

#### Justification

Ongoing proactive replacement/rehabilitation of the City's 150-mile sewer collection system.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals, Programs, and Policies:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures		Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Construction Costs		1,300,000	200,000	650,000	650,000	650,000	650,000	2,200,000	6,300,000
	Total	1,300,000	200,000	650,000	650,000	650,000	650,000	2,200,000	6,300,000
Funding Sources		Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Operation (WWO)	ons Fund	1,300,000	200,000	650,000	650,000	650,000	650,000	2,200,000	6,300,000
	Total	1,300,000	200.000	650.000	650,000	650,000	650,000	2,200,000	6,300,000

## Budget Impact/Other

Rate funded.

#### '19/'20 thru '23/'24

## City of Benicia, California

Project # WWO-090

Project Name Lift Station Upgrades

Type Improvement Department Public Works
Useful Life 30 years Contact Public Works Director
Category Wastewater Operations Priority Level 1 - Funded

Account No. 725-8032-9999

Status Active



## Description

Increase the size of East 7th Street and East B Street Lift Station Wet Wells.

#### Justification

Increased capacity needs.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.			90,000					90,000
Construction Costs				360,000				360,000
Construction Management				54,000				54,000
Contingency				90,000				90,000
Total			90,000	504,000				594,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Capacity Fund (WWC)			90,000	504,000				594,000
Total			90,000	504,000				594,000

#### Budget Impact/Other

10/4/18 Changed FY 20/21 \$60K design to \$90K and FY 21/22 \$300K construction to \$90K and \$360K respectively to account for a 20% CPI since the figures were projected three years ago. Soft costs were added - 25% contingency and 15% construction management.

## City of Benicia, California

Project # WWO-091 Project Name Gas Box

Useful Life

Type Improvement

Category Wastewater Operations

Department Public Works

Contact Public Works Director

'19/'20 thru '23/'24

Priority Level 1 - Funded

Account No. 044-8044-9896

Status Active



## Description

Purchase and install a gas box that generates electricity using digester methane gas as a fuel source.

#### Justification

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.				125,000				125,000
Construction Costs					500,000			500,000
Construction Management					75,000			75,000
Contingency					125,000			125,000
Total				125,000	700,000			825,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Capacity Fund (WWC)				125,000	700,000			825,000
Total				125,000	700,000			825,000

#### Budget Impact/Other

10/4/18 Added \$125K design to FY 21/22 and added soft costs to FY 22/23 (25% contingency and 15% construction management.)

#### '19/'20 thru '23/'24

## City of Benicia, California

Project # WWO-092

Project Name Solids Building Platforms (Belt Press & Cyclones)

Type Maintenance

Department Public Works

Useful Life

Contact Public Works Director

Category Wastewater Operations

Priority Level 1 - Funded

Account No. 710-8030-7087

Status Active



#### Description

Design and construct a new solids building platform for accessing the belt filter presses and the grit cyclones. The existing structures were identified as needing repairs/replacement in a recent safety audit.

#### Justification

Hydrogen Sulfide has corroded the solids platform.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.	24,600							24,600
Construction Management		23,000						23,000
Furnishings & Equipment		150,000						150,000
Contingency		38,000						38,000
Total	24,600	211,000						235,600
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Operations Fund (WWO)	24,600	211,000						235,600
Total	24,600	211,000						235,600

#### Budget Impact/Other

Rate funded.

Use savings from CIPs WWO-015, WO-007 & WWO-076.

Cannon Task Order #7 - Engineering Design - Wastewater Facilities Solids Handling Platform \$24,600 FY 17/18.

10/4/18 moved \$150K for equipment from FY 18/19 to FY 19/20; added 25% or \$38K for contingency; and 15% or \$23K for construction management.

## City of Benicia, California

Project # WWO-093

Project Name Digester Gas Line above ground (digester to flare)

Type Improvement Department Public Works
Useful Life Contact Public Works Director

Category Wastewater Operations Priority Level 1 - Funded

Account No. 710-8030-7087

Status Active



#### Description

Replace existing underground digester gas line that services the pressure relief system (flare). The existing line is exposed to moving earth and corrosive soils and cannot be inspected. Installing a new line will enhance reliability and safety.

#### Justification

Enhance efficiencies and address corrosion of line.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Planning, Design and Eng.			40,000					40,000
Construction Costs				200,000				200,000
Construction Management				30,000				30,000
Contingency				50,000				50,000
Total			40,000	280,000				320,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Operations Fund (WWO)			40,000	280,000				320,000
Total			40,000	280,000				320,000

#### **Budget Impact/Other**

Rate funded.

10/4/18 added 25% or \$50K contingency; and 15% or \$30K construction management.

Project # WWO-095

Project Name Rake Shaftless Screw

Type Maintenance

Department Public Works

Useful Life

Contact Public Works Director

Category Wastewater Operations

Priority Level 1 - Funded

Account No. 710-8030-7087

Status Active



## Description

Replace the headworks washer/compactor shaftless screw system.

#### Justification

This system was originally installed in 2003 and is reaching the end of its useful life.

City of Benicia Strategic Plan

Strategic Issue 1: Protecting Community Health and Safety

Strategic Issue 4: Preserving and Enhancing Infrastructure

General Plan Goals:

Goal 2.28: Improve and maintain public facilities and services.

Goal 2.38: Protect water quality.

Goal 4.7: Ensure that existing and future neighborhoods are safe from risks to public health that could result from exposure to hazardous materials.

Goal 4.8: Protect sensitive receptors from hazards.

Goal 4.16: Require hazardous materials and hazardous waste management handling and disposal procedures that are protective of human health and the environment.

Goal 4.20: Reduce health and safety hazards associated with hazardous materials users, hazardous waste generators, and hazardous waste disposal sites and toxic air contaminants.

Goal 4.21: Reduce significant hazards associated with pipelines, and high voltage transmission lines.

Expenditures	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Furnishings & Equipment	75,000						75,000	
Total				75,000				75,000
Funding Sources	Prior	'19/'20	'20/'21	'21/'22	'22/'23	'23/'24	Future	Total
Wastewater Operations Fund (WWO)	75,000						75,000	
Total				75,000				75,000

## Budget Impact/Other

Rate funded.

Material only; no design necessary. City staff to install.

# APPENDIX 2 – CIP REVIEW AND APPROVAL PROCESS



## CIP REVIEW AND APPROVAL PROCESS

The annual process of reviewing and approving the CIP consists of the following basic steps:

- 1. Every year the Engineering Division sends out a "Call for New Projects" which provides each City department with a formal means for submitting new projects. The project submittal shall include project scope, preliminary cost estimate, priority level (a high priority new project may require the postponement of an existing project), and recommendation of how the new project will be integrated with the projects that are already planned.
- 2. Engineering Division reviews the project submittals to ensure projects meet the definition of a capital project and the projects are added to the CIP in Plan-It Software.
- 3. Engineering Division and City staff prepares the CIP proposed documents.
- 4. The Finance Committee reviews the proposed CIP for budget purposes.
- 5. Planning Commission reviews the CIP annually to determine consistency with the General Plan.
- 6. The City Council reviews the CIP.

The City Council adopts the first two years "Annual Capital Budget" portion of the CIP in a regular meeting along with the annual City budget





# **CIP Project Request Form**

For Internal Use	
Project ID:	

Please reference the document titled "INSTRUCTIONS FOR COMPLETING CAPITAL IMPROVEMENTS PROJECTS (CIP) REQUESTS" for guidance on the application.

Project Title:							
Location:							
Date:			Department:				
Employee Submitting Request:	Is the pr	Yes 🗌 No 🗌					
Department Priority No.:	If yes, v						
Proposed Schedule/Cost							
Date Improvements Begin:	Design/Engineering Cost:						
Date Improvements Completed:			Construction Cost:				
Useful Life of Facility/Equipment:			Previous Funding:				
Dollars in Thousands	FY 20	FY 20	FY 20	FY 20	FY 20	<u>Total</u>	
Proposed Capital Budget				· -			
Expected additional Annual Operating Budget expenses incurred to directly support the new facility/equipment:							
Expected new Annual Revenue generated from the new facility/equipment:							
<b>Project Narrative</b> The purpose of the narrative is to explain the proper of the project). Please explain in detail. S	oposal and provide	an understanding	of the life cycle cost (v	which is the sum of	all recurring and c		
(a) Current condition/situation:							
(b) Requested change/project description:							

## **Evaluation Questions**

Questions	Y	N	Comments/Supporting Details
General Plan			
A. Is the project in conformance with the City's General Plan, if so which goals, programs, policies?			
City Strategic Plan			
Strategic Issue 1: Protecting Community Health and Safety			
Strategic Issue 2: Protecting and Enhancing the Environmental			
Strategic Issue 3: Strengthening Economics and Fiscal Conditions			
Strategic Issue 4: Preserving and Enhancing Infrastructure			
Strategic Issue 5: Maintain and Enhance a High Quality of Life			
Signature			
Requestor's Signature Printed Name		7	Title Date