

CAPITAL IMPROVEMENT PLAN OVERVIEW

Introduction

The Capital Improvement Plan (CIP) guides the acquisition and improvement of capital facilities, infrastructure, land, and equipment for the City of Snoqualmie (CoS) over a six-year period. The CIP is a balanced plan. This means that CoS matched all capital projects included in the plan with an anticipated source of revenue. Before inclusion, staff evaluates and measures responsibly all proposed project expenditures and anticipated revenues. Given the application of conservative financial planning principals, staff expects the 2017-2022 CIP to invest in the preservation and enhancement of critical infrastructure and maintain the positive future financial condition of CoS concurrently.

Sometimes CoS cannot fund all proposed capital projects due to a scarcity of revenues. Consequently, staff will engage in a systematic process to assess the merits of each project. Staff will score each project against a pre-defined list of criteria designed to ensure transparency and equity in the decision-making process. Next, the Mayor will review capital projects that score highest and recommend to council a list of projects to fund. Staff will retain capital projects with insufficient merit for consideration during future CIP updates.

CoS divides capital projects and their prioritization into five broad categories: General Government, Parks, Public Safety, Transportation, and Utilities (Sewer, Stormwater, and Water). Restrictions placed on funding sources and alignment with community priorities necessitates this partition. For example, legal mandates restrict where CoS can spend utility rate revenue (i.e., on utility operations and capital projects).

An important goal in the creation of the CIP is alignment with the community vision and organizational strategic plan. The CIP should help to fulfill operatively the strategic plan, which then supports achievement of the community vision. Common to the development of a strategic plan is a conversation about level of service standards sufficient to maintain the safety and quality of life for residents and businesses. Given this goal, the development of the CIP considered a number of strategic priorities and service objectives described meticulously in Snoqualmie 2032, (the Comprehensive Plan), City Council Goals and Objectives 2015/2016 (approved July 2015), the General Sewer Plan (updated November 2012), the Water System Plan (updated February 2013), and the Stormwater Management Plan (updated October 2010). Each plan weighed heavily in developing the capital projects listed and detailed methodically in the CIP.

The Utilities Capital Improvement Plan

This CIP document covers only utility capital projects and supersedes the utilities section of the 2015-2020 CIP. The 2015-2020 CIP¹, located on the website under the Finance Office, is still applicable and financially binding for General Government, Parks, Public Safety, and Transportation capital projects.

The 2017-2022 Utilities CIP draws heavily upon the work of the Parks and Public Works Department and its consultants, which provided the information, critical evaluation, and prioritization behind all projects incorporated into this portion of the CIP. The City's utility rate consultant, FCS Group, provided the financial modeling that generates all utility rate revenue estimates, ensuring that the Utilities CIP is a fiscally sound, revenue-constrained plan. All proposed project costs in this plan were inflated to year-of-expenditure dollars using a composite construction cost index (provided by FCS Group).

Consistent with best practices in financial planning², the 2017-2022 Utilities CIP contemplates the operating impact from capital projects. Once council commits to a project with a known operating implication, a level of obligation is created within the biennial operating budget. Project managers have done their best to estimate future operating impacts. However, estimating operating impacts can often require an impractical level of foresight. In order to balance the need for total cost of ownership information with the time and effort required to estimate accurately, at this time a description was deemed sufficient to fulfill the goal of disclosing operating impacts.

The 2017-2022 Utilities CIP is a financially responsible plan. Staff evaluated and measured all proposed project expenditures and anticipated revenues carefully and conservatively. Furthermore, staff built in a number of reserves and contingencies meant to safeguard CoS from financial hardship. A bond reserve equal to one annual principal and interest payment will help protect CoS against immediate bond default. An operating reserve ensures that enough cash is on hand to pay for 90 days of operating expenses if necessary. Contingencies are built into several capital projects in case cost overruns eventuate. Given the potential number of risks that could destabilize the revenue to expenditure balance, reserves and contingencies help to protect our financial condition in an uncertain planning environment.

¹ City of Snoqualmie, [Capital Improvement Plan 2015-2020](#), Adopted December 8, 2014.

² Government Finance Officers Association (GFOA), [Multi-Year Capital Planning](#), Last Updated May 2016.

Organization

The 2017-2022 Utilities CIP includes the following:

- A [project summary](#) section that reviews in totality over the six-year period the number and cost of existing and new capital projects. Furthermore, this section will reveal the total change in project expenditures since the last CIP update (2015) and calculate the amount of funding required to finish projects with a time horizon longer than 2022.
- An [expenditure summary](#) section that reviews in totality over the six-year period the cost of new and existing projects for each of the three utilities: sewer, stormwater, and water. An estimate of total expenditures for each of three utilities will include the debt service necessary to pay bondholders and lenders back for their investment.
- A [revenue summary](#) section that summarizes revenues accumulating to each of the three utilities in totality over the six-year period. Moreover, this section will describe the revenues eligible to support capital utility projects and their restrictions. An estimate of total revenues for each of the three utilities will include the amount of debt required to complete all capital projects in the plan.
- A [debt service summary](#) section that summarizes the outstanding contractual obligations and newly incurred obligations CoS will have to bondholders and lenders for repayment of principal amounts borrowed with interest over the six-year period.
- A [sewer utility summary](#) section that outlines relevant projects and the reason behind their inclusion over the six-year period. In addition, this section will present a cash flow model specific to sewer and a debt payment schedule using a thirty-year perspective.
- A [stormwater utility summary](#) section that outlines relevant projects and the reason behind their inclusion over the six-year period. Moreover, this section will present a cash flow model specific to stormwater and a debt payment schedule using a thirty-year perspective.
- A [water utility summary](#) section that outlines relevant projects and the reason behind their inclusion over the six-year period. In addition, this section will present a cash flow model specific to water and a debt payment schedule using a thirty-year perspective.
- A [capital project detail](#) section that communicates the purpose, cost, and status of each project included in the CIP.

Accomplishments

The 2017-2022 Utilities CIP accomplishes a number of utility, finance, and communicative related objectives including:

- Advances the council goal to proactively maintain and replace infrastructure.

2017-2022 UTILITIES CAPITAL IMPROVEMENT PLAN

- Completes the council objective to design and construct sewer and stormwater infrastructure improvements to meet current and rigorous National Pollutant Discharge Elimination System Permit (NPDES) Phase II rules and regulations.
- Improves water system reliability and fire flow with water main replacements.
- Adds to our reservoir capacity and enables maintenance for two other reservoirs in the water system.
- Creates two new pressure zones to increase or decrease water pressure at the tap.
- Improves the conveyance and treatment of our water source.
- Fulfills necessary improvements at the sewer treatment plant including the addition of a new generator, solids handling facility, and other treatment components.
- Assures continuous 24-hour operations to protect water quality and public health while sustaining a healthy environment.
- Builds on current successes in Historic Snoqualmie with water and sewer main replacements and stormwater improvements.
- Balances capital projects expenditures with the appropriate revenue source in a revenue-constrained plan.
- Meets all debt obligations.
- Assigns each capital project a unique CIP identifier.
- Explains the community and operating impact of each project.
- Clearly communicates the project budget over the lifetime of the project.
- Summarizes well the information available.

Financial Summary

The 2017-2022 Utilities CIP contains more than \$71 million in capital plan expenditures, which includes debt service, and approximately \$72 million in revenues. The following cash flow model depicts the beginning fund balance, revenues, expenditures, and ending fund balance for the three utilities combined. In total, CoS will spend under \$17 million to repay bondholders and lenders for principal amounts borrowed with interest, nearly \$38 million to complete existing capital projects, and over \$17 million to start and complete newly initiated projects over the six-year period. To pay for capital projects, CoS will issue approximately \$46 million in new debt, and to pay for debt service, collect about \$26 million in utility rate revenue over the six-year period.



Beginning Fund Balance	2017	2018	2019	2020	2021	2022
		\$ 4,785,485	\$ 2,798,372	\$ 5,180,526	\$ 3,733,385	\$ 15,569,243

Revenues

Revenue Type	2017	2018	Total 2017-2018	2019	2020	2021	2022	Total 2017-2022
UTILITY FEES	\$ 2,264,122	\$ 3,346,231	\$ 5,610,353	\$ 4,335,147	\$ 4,821,471	\$ 5,286,919	\$ 5,524,890	\$ 25,578,780
OTHER MISCELLANEOUS REVENUES	\$ 186,137	\$ 85,604	\$ 271,741	\$ 86,920	\$ 93,294	\$ 94,818	\$ 101,109	\$ 647,882
REVENUE BOND DEBT PROCEEDS	\$ 5,515,667	\$ 18,643,956	\$ 24,159,622	\$ -	\$ 21,549,924	\$ -	\$ -	\$ 45,709,546
TOTAL REVENUES =	\$ 7,965,925	\$ 22,075,791	\$ 30,041,716	\$ 4,422,067	\$ 26,464,689	\$ 5,381,737	\$ 5,625,999	\$ 71,936,208

Expenditures

Expenditure Type	CIP Project ID	Inception To Date Through 2016	2017	2018	Total 2017-2018	2019	2020	2021	2022	Total 2017-2022
DEBT EXPENDITURES										
2008 Revenue Bond	PUW08001CIP	\$ 4,615,572	\$ 514,588	\$ 513,038	\$ 1,027,625	\$ 514,438	\$ 515,238	\$ 510,438	\$ 515,238	\$ 3,082,975
2011 LTGO Bond	PUW11001CIP	\$ 1,342,508	\$ 250,850	\$ 253,250	\$ 504,100	\$ 250,250	\$ 252,050	\$ 253,450	\$ 249,450	\$ 1,509,300
2017 Bond Anticipation Note and 2018 Revenue Bond	PUW18001CIP	\$ -	\$ 40,667	\$ 546,055	\$ 586,722	\$ 1,489,919	\$ 1,489,919	\$ 1,489,919	\$ 1,489,919	\$ 6,546,397
2020 Revenue Bond	PUW20001CIP	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1,656,675	\$ 1,656,675	\$ 1,656,675	\$ 4,970,025
2002 Public Works Trust Fund Loan (Pump Station No. 1 & Forcemain Renovation)	SWR02001CIP	\$ 961,916	\$ 45,321	\$ 44,894	\$ 90,215	\$ 44,466	\$ 44,038	\$ 43,611	\$ 43,183	\$ 265,513
2013 Public Works Trust Fund Loan (Kimball Creek Lift Station 3rd Pump)	SWR13001CIP	\$ 56,189	\$ 17,457	\$ 17,417	\$ 34,874	\$ 17,375	\$ 17,333	\$ 17,291	\$ 17,249	\$ 104,123
2003 Drinking Water State Revolving Fund Loan (Canyon Springs Corrosion Control Project)	WAT03001CIP	\$ 374,199	\$ 38,213	\$ 37,363	\$ 75,576	\$ 36,514	\$ 35,665	\$ 34,816	\$ -	\$ 182,572
Debt Expenditures Subtotal		\$ 7,350,384	\$ 907,095	\$ 1,412,017	\$ 2,319,112	\$ 2,352,962	\$ 4,010,918	\$ 4,006,199	\$ 3,971,714	\$ 16,660,905
EXISTING PROJECT EXPENDITURES										
Infrastructure Improvement Program	PUW16001CIP	\$ 660,000	\$ 23,476	\$ 2,625,847	\$ 2,649,323	\$ -	\$ 5,226,357	\$ -	\$ -	\$ 7,875,680
Railroad Place, Newton Street, and Delta Street Project	PUW16002CIP	\$ 88,966	\$ 25,000	\$ 1,880,795	\$ 1,905,795	\$ -	\$ -	\$ -	\$ -	\$ 1,905,795
2016/2017 Northern Street Project	PUW16003CIP	\$ 118,207	\$ 871,230	\$ -	\$ 871,230	\$ -	\$ -	\$ -	\$ -	\$ 871,230
Water Reclamation Facility Improvements (Phase 1)	SWR16001CIP	\$ 1,004,335	\$ 3,592,444	\$ -	\$ 3,592,444	\$ -	\$ -	\$ -	\$ -	\$ 3,592,444
Water Reclamation Facility Improvements - Solids (Phase 2)	SWR16002CIP	\$ 116,412	\$ 718,866	\$ 9,490,045	\$ 10,208,911	\$ 1,765,075	\$ -	\$ -	\$ -	\$ 11,973,986
Water Reclamation Facility Improvements - Existing Clarifier (Phase 4)	SWR16004CIP	\$ 1,530	\$ 131,580	\$ 50,000	\$ 181,580	\$ -	\$ 2,780,960	\$ -	\$ -	\$ 2,962,540
Water Reclamation Facility Improvements - Operations Shop and Decant Stations (Phase 5)	SWR16005CIP	\$ -	\$ -	\$ 82,069	\$ 82,069	\$ -	\$ -	\$ -	\$ 2,009,480	\$ 2,091,549
Water Reservoir Improvement Project	WAT16001CIP	\$ 22,866	\$ 100,000	\$ 1,019,377	\$ 1,119,377	\$ -	\$ -	\$ -	\$ -	\$ 1,119,377
Pressure Zone Modifications Project	WAT16002CIP	\$ 83,988	\$ 6,000	\$ 1,930,589	\$ 1,936,589	\$ -	\$ -	\$ -	\$ -	\$ 1,936,589
Water Treatment Facility Improvements	WAT16003CIP	\$ 327,600	\$ 3,250,917	\$ -	\$ 3,250,917	\$ -	\$ -	\$ -	\$ -	\$ 3,250,917
Generators	WAT16004CIP	\$ 939,906	\$ 72,121	\$ -	\$ 72,121	\$ -	\$ -	\$ -	\$ -	\$ 72,121
Existing Project Expenditures Subtotal		\$ 3,363,810	\$ 8,791,634	\$ 17,078,722	\$ 25,870,356	\$ 1,765,075	\$ 8,007,317	\$ -	\$ 2,009,480	\$ 37,652,228
NEW PROJECT EXPENDITURES										
Street Preservation Program	PUW20002CIP	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 69,394	\$ 2,720,166	\$ 6,103,190	\$ 8,892,750
Stormwater Management Plan Update	STM18001CIP	\$ -	\$ -	\$ 100,000	\$ 100,000	\$ 145,272	\$ -	\$ -	\$ -	\$ 245,272
Vactor Decant Station	STM19001CIP	\$ -	\$ -	\$ 280,045	\$ 280,045	\$ -	\$ -	\$ -	\$ -	\$ 280,045
River Street and Park Avenue Bank Stabilization	STM19002CIP	\$ -	\$ -	\$ -	\$ -	\$ 109,367	\$ 468,752	\$ -	\$ -	\$ 578,119
Sandy Cove Park	STM19003CIP	\$ -	\$ -	\$ -	\$ -	\$ 109,367	\$ 468,752	\$ -	\$ -	\$ 578,119
Water Reclamation Facility Improvements - Aeration System (Phase 6)	SWR17001CIP	\$ -	\$ 11,402	\$ 77,931	\$ 89,333	\$ -	\$ -	\$ -	\$ -	\$ 89,333
General Sewer Plan Update	SWR18001CIP	\$ -	\$ -	\$ 218,734	\$ 218,734	\$ 53,076	\$ -	\$ -	\$ -	\$ 271,810
Bank and Sewer Line Stabilization at Meadowbrook Lift Station	SWR18002CIP	\$ -	\$ -	\$ 106,151	\$ 106,151	\$ 454,968	\$ -	\$ -	\$ -	\$ 561,119
Fir Street Lift Station Reconstruction (Lift Station No. 2) + Forcemain Replacement	SWR19001CIP	\$ -	\$ -	\$ -	\$ -	\$ 82,025	\$ 402,643	\$ -	\$ -	\$ 484,668

Expenditure Type	CIP Project ID	Inception To Date Through 2016	2017	2018	Total 2017-2018	2019	2020	2021	2022	Total 2017-2022
Lift Station No. 1 (End of Railroad Place)	SWR19002CIP	\$ -	\$ -	\$ -	\$ -	\$ 27,342	\$ 207,332	\$ -	\$ -	\$ 234,674
Pump Station No. 1 to MH No. 14 (SE Newton Street)	SWR20001CIP	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 101,413	\$ 1,201,579	\$ -	\$ 1,302,992
384th Street SE between SE 85th Street and Pickering Court	SWR20002CIP	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 54,150	\$ 624,725	\$ -	\$ 678,875
Card Readers at Remote Facilities	UTL20001CIP	\$ -	\$ -	\$ -	\$ -	\$ 169,842	\$ -	\$ -	\$ -	\$ 169,842
SR 202 Bridge Utility Replacement Project	UTL22001CIP	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 627,963	\$ 627,963
Source of Supply Improvements	WAT17001CIP	\$ -	\$ 42,000	\$ 201,302	\$ 243,302	\$ 382,785	\$ 200,000	\$ -	\$ -	\$ 826,087
Service Meter Replacement Program	WAT17002CIP	\$ -	\$ 200,908	\$ -	\$ 200,908	\$ -	\$ -	\$ -	\$ -	\$ 200,908
SCADA System Improvements	WAT18001CIP	\$ -	\$ -	\$ -	\$ -	\$ 109,367	\$ -	\$ -	\$ -	\$ 109,367
Water System Plan Update	WAT18002CIP	\$ -	\$ -	\$ 218,734	\$ 218,734	\$ 53,076	\$ -	\$ -	\$ -	\$ 271,810
PRV from 1180 Zone to 1040 Zone	WAT19001CIP	\$ -	\$ -	\$ -	\$ -	\$ 54,684	\$ 638,160	\$ -	\$ -	\$ 692,844
Williams Addition Water System Improvements	WAT22001CIP	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 44,685	\$ 44,685
SE 76th Street in Ernie's Grove	WAT22002CIP	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 61,660	\$ 61,660
New Project Expenditures Subtotal		\$ -	\$ 254,310	\$ 1,202,897	\$ 1,457,207	\$ 1,751,171	\$ 2,610,596	\$ 4,546,470	\$ 6,837,498	\$ 17,202,942
TOTAL EXPENDITURES =		\$ -	\$ 10,714,194	\$ 9,953,038	\$ 19,693,636	\$ 29,646,674	\$ 5,869,208	\$ 14,628,831	\$ 8,552,669	\$ 12,818,692

Ending Fund Balance

	2017	2018		2019	2020	2021	2022	
	\$ 2,798,372	\$ 5,180,526		\$ 3,733,385	\$ 15,569,243	\$ 12,398,312	\$ 5,205,619	