

**FAILED**

**RESOLUTION NO. 17-1165**

**A RESOLUTION OF THE CITY COUNCIL OF THE CITY  
OF BLACK DIAMOND, KING COUNTY WASHINGTON,  
ADOPTING A CAPITAL IMPROVEMENT PLAN FOR  
THE YEARS 2017-2022**

**WHEREAS**, the City of Black Diamond is required by State law and Chapter 3.60 of the Black Diamond Municipal Code to prepare and adopt a multi-year plan that contains the City's future Capital Improvement Projects and the recommended methods of funding those projects; and

**WHEREAS**, the City's Capital Improvements Plan has been updated to address the current capital facilities needs and priorities of the City for the years 2017-2022; and

**WHEREAS**, the City Council has reviewed the 2017-2022 Capital Improvement Plan at their August 25, 2016, September 8, 2016, March 9, 2017, and April 13, 2017 Workstudy meetings; and

**WHEREAS**, the annual update is also annual supplemental information to the Capital Element portion of Black Diamond's Comp Plan for Transportation, Water, Sewer, Stormwater and other Capital Elements; and

**WHEREAS**, the City Council of the City of Black Diamond held a public hearing on the proposed 2017-2022 Capital Improvement Plan on September 15, 2016;

**NOW, THEREFORE THE CITY COUNCIL OF THE CITY OF BLACK DIAMOND  
HEREBY RESOLVES AS FOLLOWS:**

**Section 1.** The City Council does hereby approve the 2017 – 2022 Capital Improvements Plan, a copy of which is attached as Exhibit "A" and incorporated herein by reference.

ADOPTED by the City Council at an open meeting on the XXXX day of XXXX 2017.

\_\_\_\_\_  
Carol Benson, Mayor

Attest:

\_\_\_\_\_  
Brenda L. Martinez, City Clerk

City of Black Diamond, WA

# Capital Improvement Program

## 2017 – 2022



October 6, 2016



## Table of Contents

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### **Capital Improvement Program (CIP) 2017-2022**

CIP Overview	1-3
All Departments Summary	4
Street Department	5-28
Water Department	29-36
Sewer Department	37-43
Stormwater Department	44-50
Real Estate Excise Tax 2	51
Public Works Summary	52-53
Parks Department	54-61
Fire Department	62-66
Police Department	67-72
General Government Projects	73-79
Real Estate Excise Tax 1	80
General Government Summary	81-82
All Department Summary Chart	83
CIP Calendar	84

## Overview of the Capital Improvement Program

### What is the Capital Improvement Program?

The Capital Improvement Program (CIP) is a plan that lays out a six-year road map identifying present and future capital and infrastructure needs for the City. It is an investment in the future of our community.

Because the CIP is a plan rather than a budget, actual authorization for capital project spending for the upcoming year occurs when City Council adopts the Annual Budget in December.

Having the long range capital plan completed before the annual operating budget is developed helps management better incorporate both short and long term planning.

For each project there is an estimated start and completion date that has been projected by the city department in charge of the improvement. The CIP also defines the total cost of the project and the amount allocated to the project for each year of the plan.

Examples of projects in Black Diamond's six-year CIP include street rehabilitation, water projects, wastewater facilities, park improvements, a fire station and equipment, police capital facility needs, and general facility capital needs and improvement.

### How are projects in the Capital Improvement Plan paid for?

The CIP process involves balancing desired capital improvements that compete for scarce financial resources. Generally, funding for capital improvements is provided through grants, impact fees, public trust fund loans, Real Estate Excise Tax revenue (REET), capital reserves and developer funding.

Real estate excise taxes (REET) are collected from property sales within the city limits and are earmarked specifically for capital projects. However in order to spend that money, a jurisdiction must have the project identified in a Capital Improvement Plan. So not only is the CIP a great overall planning tool for the City, it is also required in order to access REET monies.

Additionally, historical documentation of need is usually required when applying for grants. This need is addressed with the adoption of the CIP.

## Types of Capital Projects

Capital projects are essential to the delivery of many of Black Diamond's core services. The capital projects in each major department are described below.

- Transportation The road system in Black Diamond is a vital infrastructure to city residents, visitors and commuters. This infrastructure includes roads, bridges, bike lanes and sidewalks. The responsibility for the funding and construction of capacity adding transportation projects is equitably shared with developers. In Black Diamond, the developer of the MPD's is the primary funder and implementer of the capacity adding project to meet the needs of the growing community. The city is seeking grants to address those locations where there is existing deficiencies which are City responsibility.
- Parks and Recreation There are regional and local parks in Black Diamond as well as bike and hiking trails, a skate park and a BMX Course. Outdoor enthusiasts choose to live in Black Diamond for the natural beauty of the surroundings and sporting opportunities. Park facility improvements are primarily financed by grants, real estate excise taxes and developer contributions.
- Utilities The City provides water, sewer and stormwater utility services to residents and businesses. Capital Facilities include water sources, facilities, Reservoir, water lines, sewer treatment facilities, transmission systems and storm water detention facilities and culverts. Developers contribute to these projects, as growth requires infrastructure expansion. Utility fund reserves, grants, loans and Real Estate Excise Taxes also provide funding for utility capital projects in Black Diamond.
- Public Safety Capital facilities and equipment are required to deliver core City services of Police and Fire. These facilities include the fire and police stations, vehicles and major equipment and technology. Funding for these capital projects largely comes from user fees, grants and some Real Estate Excise Taxes.
- General Capital The City is responsible for funding the construction and maintenance of general capital facilities such as city buildings, vehicles and technology. These costs are usually funded by bond issues, grants or Real Estate Excise Taxes.

## Level of Service

The number and type of capital facilities needed to serve Black Diamond is directly related to the level of public service provided. The level of service is established by City Council and the City's Comprehensive Plan.

### **Maintenance and Funding Constraints**

Once completed and placed in service, capital facilities must be maintained. Funding for the maintenance of capital projects for City Utilities are funded with user fees in the respective operating budgets. Maintenance funding for projects are funded through current operations, not the capital budget. For that reason the availability of funding for future maintenance must be considered when preparing the capital budget.

### **Development and Approval Process**

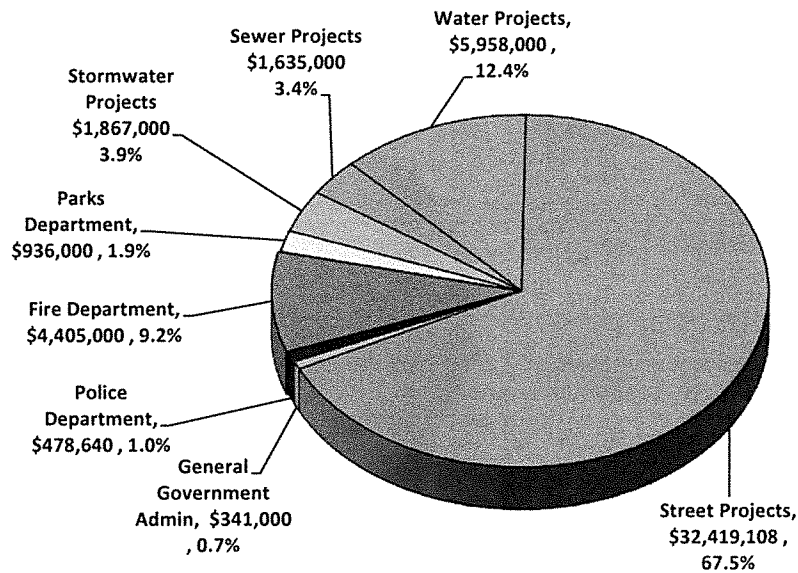
The Capital Improvement Plan is usually updated annually or every other year. Individual projects are submitted by department directors. They use a template provided by Finance staff. These requests include an update of current projects and projections on new projects and anticipated costs. Each project must have specific funding sources identified.

The Mayor, Finance Director and management meet to balance projects to available funding. Council workstudy sessions occur and a public hearing encourages public input. The proposed plan is then brought before Council for approval. This approved CIP then becomes an update and amendment to the capital facility portion of the City's Comprehensive Plan.

## All Departments Summary

### Capital Improvement Plan 2017 - 2022

	Total \$ Project 2017 - 2022	2017	2018	2019	2020	2021	2022
Street Projects	32,419,108	7,528,108	3,851,000	3,810,000	6,660,000	9,100,000	1,470,000
Water Projects	5,958,000	530,000	2,514,000	371,000	623,000	870,000	1,050,000
Sewer Projects	1,635,000	160,000	367,000	82,000	422,000	92,000	512,000
Stormwater Projects	1,867,000	57,000	1,500,000	40,000	50,000	-	220,000
Parks Department	936,000	37,500	124,500	45,000	91,000	343,000	295,000
Fire Department	4,405,000	-	365,000	-	825,000	125,000	3,090,000
Police Department	478,640	184,320	34,320	145,000	25,000	25,000	65,000
General Government	341,000	92,000	50,000	80,000	30,000	59,000	30,000
<b>TOTAL Projected Expenditures</b>	<b>\$48,039,748</b>	<b>\$ 8,588,928</b>	<b>\$ 8,805,820</b>	<b>\$ 4,573,000</b>	<b>\$ 8,726,000</b>	<b>\$10,614,000</b>	<b>\$ 6,732,000</b>



## Street Department (Transportation Projects)

### CAPITAL PROJECT SUMMARY

Summary by Project		Capital Plan 2017 - 2022						
Project Title		Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
T1	General Street Improvement	180,000	30,000	30,000	30,000	30,000	30,000	30,000
T2	Roberts Drive Road Improvements	1,158,108	1,158,108					
T3	New Arterial "Annexation Road"	2,900,000	2,900,000					
T4	Lake Sawyer Road Extension	1,800,000	1,800,000					
T5	224th Guardrail at Covington Creek	25,000		25,000				
T6	224th Ave SE Asphalt Overlay	300,000	300,000					
T7	Roberts Roundabout	7,770,000		210,000	2,090,000	5,470,000		
T8	Roberts Drive Rehabilitation Phase 2	170,000		170,000				
T9	232nd Ave Chip Seal	100,000	100,000					
T10	Downtown Public Parking	145,000			25,000	120,000		
T11	216th Ave SE Overlay	180,000			180,000			
T12	Lawson Street Phase 1	165,000			165,000			
T13	Grant Matching	240,000	40,000	40,000	40,000	40,000	40,000	40,000
T14	Lawson Street Sidewalk Phase 2	356,000		76,000	280,000			
T15	Pedestrian and Bicycle Study	30,000					30,000	
T16	Lawson Connector	3,200,000		3,200,000				
T17	Ravensdale - 169 Intersection	1,300,000	200,000	100,000	1,000,000			
T18	North Connector	1,000,000				1,000,000		
T19	Roberts Dr. Lake Sawyer Rd. Roundabout	1,000,000	1,000,000					
T20	Ravensdale - 169 Intersection - Permanent	8,000,000					8,000,000	
T21	Roberts Dr. Annex Road Intersection Imp.	1,000,000					1,000,000	
T22	216 Ave SE/288th Intersection Improvement	1,400,000						1,400,000
TOTAL ESTIMATED COSTS		32,419,108	7,528,108	3,851,000	3,810,000	6,660,000	9,100,000	1,470,000
Funding Sources								
TIB, CDBG and Other Grants								
T2	Roberts Drive Road Improvements	1,079,867	1,079,867					
T6	224th Ave SE Asphalt Overlay	255,000	255,000					
T7	Roberts Roundabout	4,235,000			1,030,000	3,205,000		
T8	Roberts Drive Rehabilitation Phase 2	144,500		144,500				
T9	232nd Ave Chip Seal	90,000	90,000					
T10	Downtown Public Parking	108,000				108,000		
T11	216th Ave SE Overlay	153,000			153,000			
T12	Lawson Street Phase 1	148,500			148,500			
T14	Lawson Street Sidewalk Phase 2	315,000		55,000	260,000			
T15	Pedestrian and Bicycle Study	27,000					27,000	
T20	Ravensdale - 169 Intersection - Permanent	4,000,000					4,000,000	
		10,555,867	1,424,867	199,500	1,591,500	3,313,000	4,027,000	
Developer Funded/Impact Fees/SEPA								
T2	Roberts Drive Road Improvements	52,250	52,250					
T3	New Arterial "Annexation Road"	2,900,000	2,900,000					
T4	Lake Sawyer Road Extension	1,800,000	1,800,000					
T7	Roberts Roundabout	3,535,000		210,000	1,060,000	2,265,000		
T14	Lawson Street Sidewalk Phase 2	41,000		21,000	20,000			
T16	Lawson Connector	3,200,000		3,200,000				
T17	Ravensdale - 169 Intersection	1,300,000	200,000	100,000	1,000,000			
T18	North Connector	1,000,000				1,000,000		
T19	Roberts Dr. Lake Sawyer Rd. Roundabout	1,000,000	1,000,000					
T20	Ravensdale - 169 Intersection - Permanent	4,000,000					4,000,000	
T21	Roberts Dr. Annex Road Intersection Imp.	1,000,000					1,000,000	
T22	216 Ave SE/288th Intersection Improvement	1,400,000						1,400,000
Total Developer/Impact/SEPA Funding		21,228,250	5,952,250	3,531,000	2,080,000	3,265,000	5,000,000	1,400,000

## Street Department (Transportation Projects)

### CAPITAL PROJECT SUMMARY

Summary by Funding, cont.		Capital Plan 2017 - 2022					
	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
<b>Real Estate Excise Tax 2 Funding or Grant Matching</b>							
T1 General Street Improvement	180,000	30,000	30,000	30,000	30,000	30,000	30,000
T2 Roberts Drive Road Improvements	25,991	25,991					
T5 224th Guardrail at Covington Creek	25,000		25,000				
T6 224th Ave SE Asphalt Overlay	45,000	45,000					
T8 Roberts Drive Rehabilitation Phase 2	25,500		25,500				
T9 232nd Ave Chip Seal	10,000	10,000					
T10 Downtown Public Parking	37,000			25,000	12,000		
T11 216th Ave SE Overlay	27,000			27,000			
T12 Lawson Street Phase 1	16,500			16,500			
T13 Grant Matching	240,000	40,000	40,000	40,000	40,000	40,000	40,000
T15 Pedestrian and Bicycle Study	3,000					3,000	
<b>Total REET 2 Funding</b>	<b>634,991</b>	<b>150,991</b>	<b>120,500</b>	<b>138,500</b>	<b>82,000</b>	<b>73,000</b>	<b>70,000</b>
<b>TOTAL ESTIMATED FUNDING SOURCES</b>	<b>32,419,108</b>	<b>7,528,108</b>	<b>3,851,000</b>	<b>3,810,000</b>	<b>6,660,000</b>	<b>9,100,000</b>	<b>1,470,000</b>

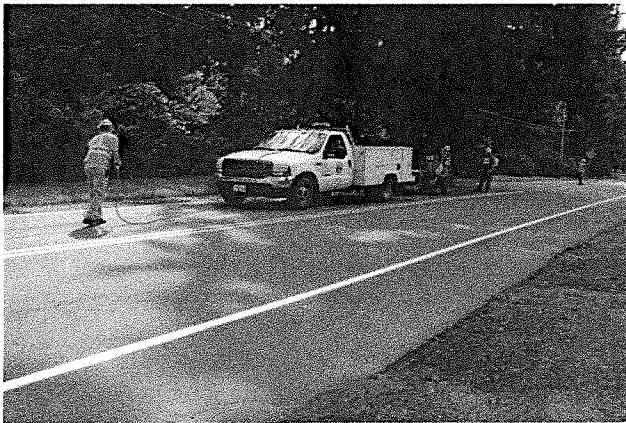
**Street Department****T1****General Street Improvement****13.10****DESCRIPTION**

**Light Street Maintenance.** Annually the Public Works staff assesses the street system and selects key street preservation and improvement work. Typical activities under this project are chip sealing, crack sealing, patch work and addressing minor safety problems.

**BACKGROUND**

This project provides annual funding for minor street improvements that typically do not require engineering.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Construction Costs	180,000	30,000	30,000	30,000	30,000	30,000	30,000
<b>TOTAL COSTS</b>	<b>180,000</b>	<b>30,000</b>	<b>30,000</b>	<b>30,000</b>	<b>30,000</b>	<b>30,000</b>	<b>30,000</b>
<b>REQUESTED FUNDING</b>							
Real Estate Excise Tax 2	180,000	30,000	30,000	30,000	30,000	30,000	30,000
<b>TOTAL SOURCES</b>	<b>180,000</b>	<b>30,000</b>	<b>30,000</b>	<b>30,000</b>	<b>30,000</b>	<b>30,000</b>	<b>30,000</b>



## Street Department

T2

## Roberts Drive Improvements

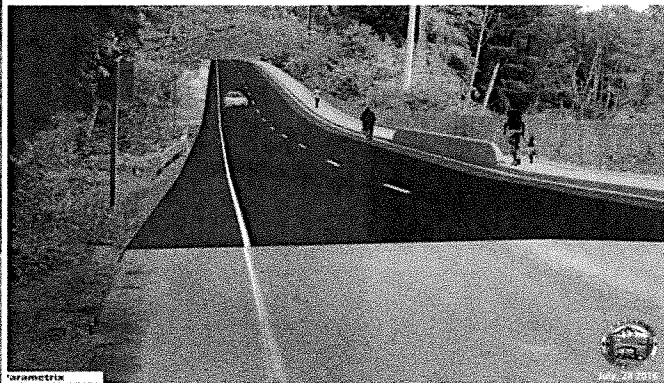
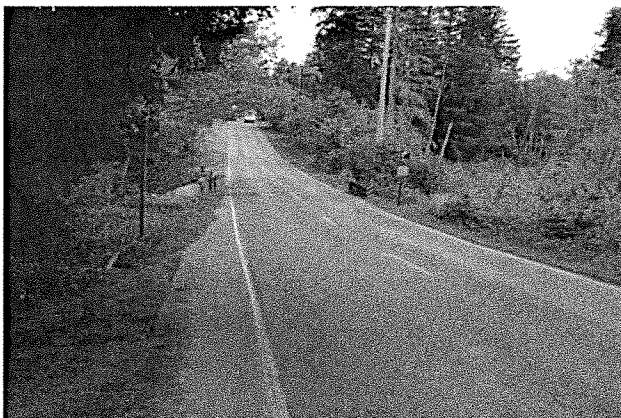
**DESCRIPTION**

**Street Reconstruction.** This project combines the Roberts Drive Bridge project and half of the Roberts Drive Roadway Rehab into a more complete roadway reconstruction with sidewalks on the south side, pavement overlay, bridge rehabilitation, stormwater improvements and street lights from 100 feet west of the Rock Creek Bridge to City Hall.

**BACKGROUND**

The City was successful in obtaining a Road Reconstruction Grant which was combined with a previous grant for one bigger project. The project was on hold to resolve utility and environmental issues but now looks on schedule to be under construction in the summer of 2017.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Construction Engineering	20,000	20,000					
Management & Administration	97,187	97,187					
Construction Costs	1,040,921	1,040,921					
<b>TOTAL COSTS</b>	<b>1,158,108</b>	<b>1,158,108</b>					
<b>REQUESTED FUNDING</b>							
Grants TIB	1,079,867	1,079,867					
Developer Mitigation	52,250	52,250					
Street Funds (REET 2)	20,226	20,226					
Grant Match	5,765	5,765					
<b>TOTAL SOURCES</b>	<b>1,158,108</b>	<b>1,158,108</b>					



## Street Department

T3

## New Arterial "Annexation Road"

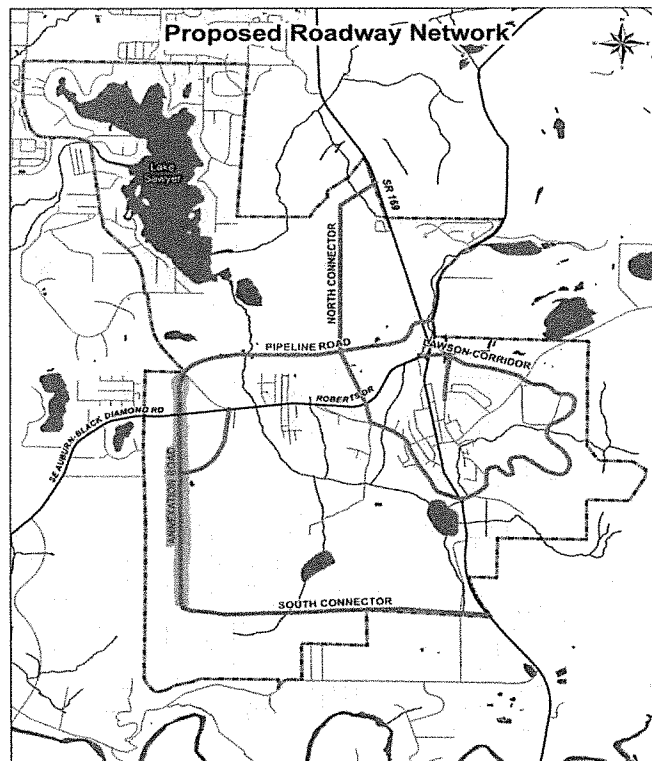
**DESCRIPTION**

**Capacity Adding Project.** This project provides a link from the initial phases of the Villages development to the City street network and a future link to the "pipeline" road.

**BACKGROUND**

This project is in keeping with the City's approved Future Street Network according to the City's comprehensive plan. This project is planned to be designed and constructed by the developer.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Design Engineering	500,000	500,000					
Construction Costs	2,400,000	2,400,000					
<b>TOTAL COSTS</b>	<b>2,900,000</b>	<b>2,900,000</b>					
<b>REQUESTED FUNDING</b>							
Developer Funded	2,900,000	2,900,000					
<b>TOTAL SOURCES</b>	<b>2,900,000</b>	<b>2,900,000</b>					



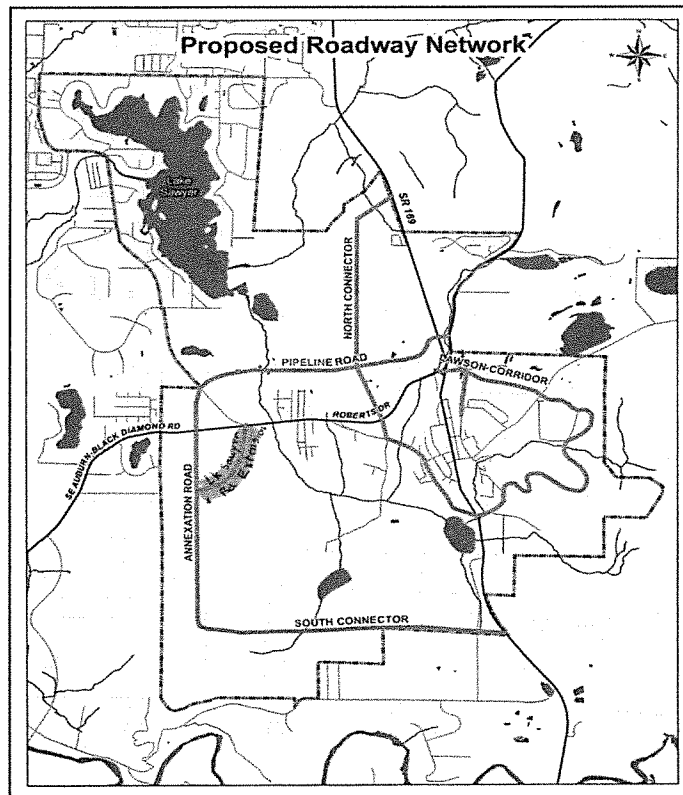
**Street Department****T4****Lake Sawyer Road Extension****DESCRIPTION**

**Capacity Adding Project.** This project provides a link from the initial phases of the Villages development to the City street network.

**BACKGROUND**

This project is in keeping with the City's approved Future Street Network according to the City's comprehensive plan. This project is planned to be designed and constructed by the developer.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Design Engineering	300,000	300,000					
Construction Costs	1,500,000	1,500,000					
<b>TOTAL COSTS</b>	<b>1,800,000</b>	<b>9,000,000</b>					
<b>REQUESTED FUNDING</b>							
Developer Funded	1,800,000	1,800,000					
<b>TOTAL SOURCES</b>	<b>1,800,000</b>	<b>1,800,000</b>					



## Street Department

**T5**

## 224th Guardrail @ Cov Creek

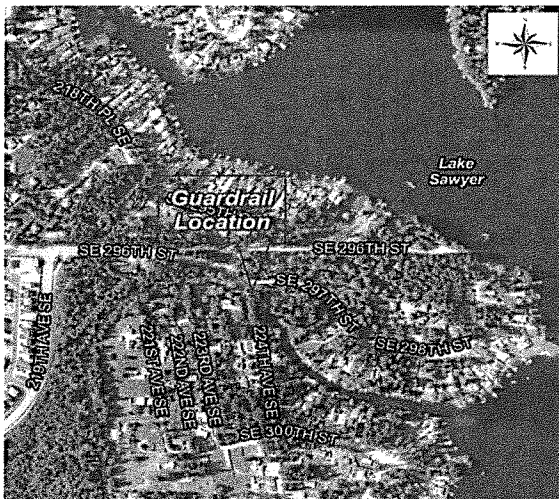
**DESCRIPTION**

**Safety Project.** This safety project is to install guard rail on both sides of the road at the Covington Creek culverts on 224th Ave SE. This project could be combined with the replacement of the stormwater Project Culvert Replacement at Covington Creek, D2.

## BACKGROUND

Staff and the committee determined that guard rails at Covington Creek would provide a greater risk reduction for errant vehicles than the Abrams project was dropped and priorities shifted.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Management & Administration	2,500		2,500				
Construction Costs	22,500		22,500				
<b>TOTAL COSTS</b>	<b>125,000</b>		<b>25,000</b>				
<b>REQUESTED FUNDING</b>							
Real Estate Excise Tax 2	25,000		25,000				
<b>TOTAL SOURCES</b>	<b>25,000</b>		<b>25,000</b>				



## Street Department

**T6**

## 224th Ave SE Asphalt Overlay

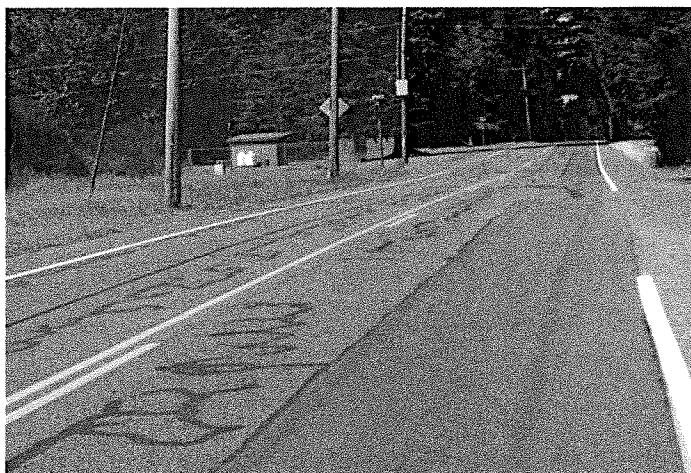
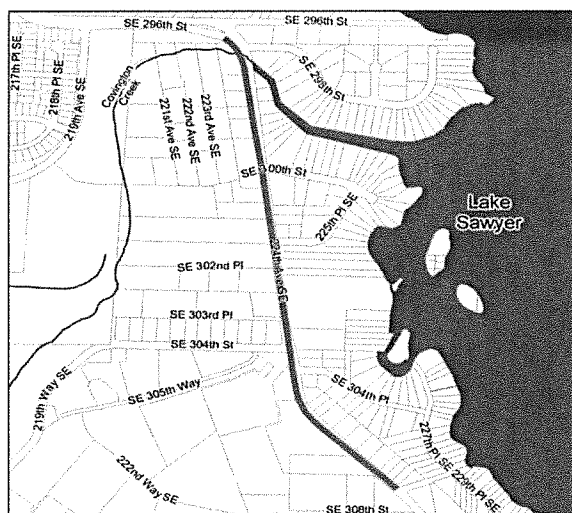
### DESCRIPTION

**Major Street Maintenance.** Overlay 224th Ave SE from Covington Creek to 307th Place.

## BACKGROUND

Public Works staff in cooperation with Maple Valley and Covington sealed the many cracks in 224th Ave SE in 2013 to preserve the integrity of the road until we could get a grant to overlay the street. The crack sealing has been effective in holding the street together and maintaining the pavement rating to stay in the TIB street preservation funding program.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Design Engineering	10,000	10,000					
Management & Administration	20,000	20,000					
Construction Costs	270,000	270,000					
<b>TOTAL COSTS</b>	<b>300,000</b>	<b>300,000</b>	-	-	-	-	
<b>REQUESTED FUNDING</b>							
Grants TIB	255,000	255,000					
Grant Match	45,000	45,000					
<b>TOTAL SOURCES</b>	<b>300,000</b>	<b>300,000</b>	-	-	-	-	-



**Street Department****T7****Roberts Roundabout****13.02****DESCRIPTION**

**Capacity Adding Project.** This project is to change the intersection control from stop control to a roundabout or signal and accommodate a future road connection to the east for the Lawson Hills Master Planned Development.

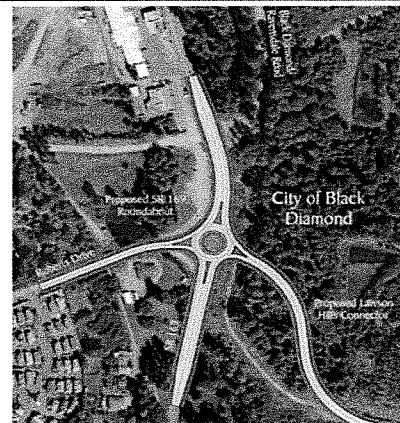
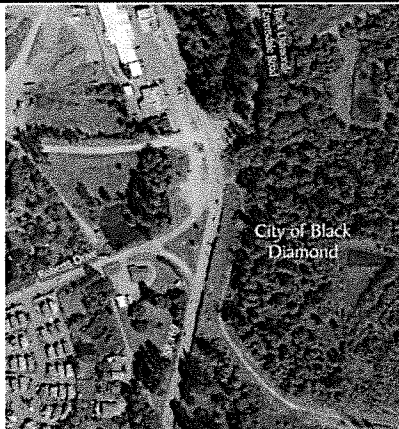
**BACKGROUND**

The existing intersection has a higher accident rate than the average along the corridor. Roberts Drive intersects SR 169 at an unconventional angle which makes it difficult for east bound motorists to turn left and west bound motorists on Ravensdale to turn left; This intersection has been identified as one of the first traffic mitigation projects that is required in the Master Planned Development FEIS. However this project will be accomplished in phases as the City grows. If the City were able to secure adequate funding soon then the City could move forward with a comprehensive ultimate traffic solution for the Roberts Drive and Ravensdale intersections.

**COMMENTS**

The developer's initial mitigation improvements for this intersection will be realignment and signal improvements. As traffic grows and the needs increase the chances of receiving grant funding will improve. Once the preliminary engineering is complete the City will be prepared to begin applying for grants.

<b>CAPITAL PROJECT COSTS</b>	<b>Total \$ 2017 -2022</b>	<b>2017</b>	<b>2018</b>	<b>2019</b>	<b>2020</b>	<b>2021</b>	<b>2022</b>
Land/Right of Way	300,000			300,000			
Preliminary Engineering	200,000		200,000				
Environ Engr & Permitting	300,000			300,000			
Construction Engineering	600,000				600,000		
Bid Documents	50,000			50,000			
Design Engineering	700,000			700,000			
Construction Costs	4,965,000			350,000	4,615,000		
Environ Mitigation	300,000			300,000			
Management / Admin	355,000		10,000	90,000	255,000		
<b>TOTAL COSTS</b>	<b>7,770,000</b>		<b>210,000</b>	<b>2,090,000</b>	<b>5,470,000</b>		
<b>REQUESTED FUNDING</b>							
Developer Funded	3,535,000		210,000	1,060,000	2,265,000		
Grants	4,235,000			1,030,000	3,205,000		
<b>TOTAL SOURCES</b>	<b>7,770,000</b>		<b>210,000</b>	<b>2,090,000</b>	<b>5,470,000</b>		



## Street Department

T8

## Roberts Drive Rehabilitation Phase 2

14.02

**DESCRIPTION**

**Major Street Maintenance from Morgan Street to the sidewalk end past the Library (1600 ft.).** Patch and Replace concrete panels; Seal joints and cracks; Plane the concrete to a smooth surface; Widen shoulders.

**BACKGROUND**

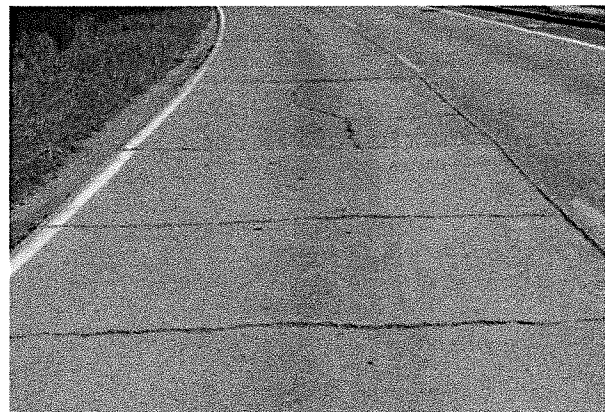
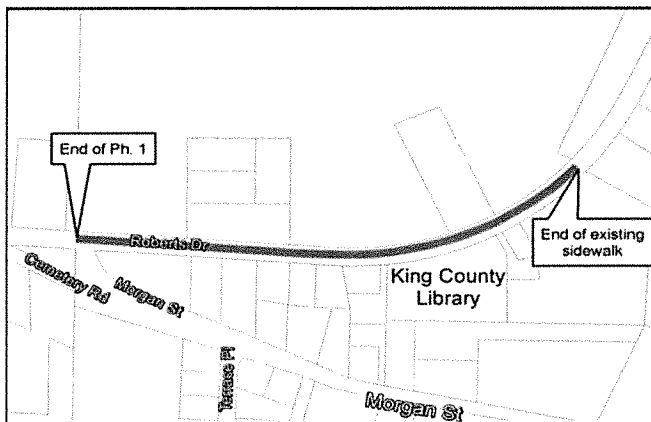
The concrete roadway is about 100 years old but needs repair work. This project is to repair and preserve the existing road.

**COMMENTS**

This section of Roberts Drive is in fair condition with some bad spots. Sidewalks curb and street lights have already been installed on a pedestrian grant. Going further east from this project would make more sense to go after total reconstruction funding and upgrade to urban standards.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Design & Bid Docs	35,000		35,000				
Management & Inspection	15,000		15,000				
Construction	120,000		120,000				
<b>TOTAL COSTS</b>	<b>170,000</b>		<b>170,000</b>				
<b>REQUESTED FUNDING</b>							
Grant Matching	25,500		25,500				
Grants	144,500		144,500				
<b>TOTAL SOURCES</b>	<b>170,000</b>		<b>170,000</b>				

End of library to City Hall



## Street Department

T9

## 232nd Ave. SE Chip Seal

**14.03**

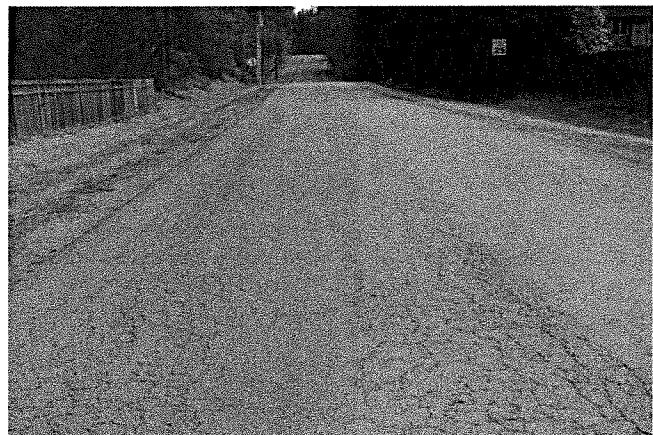
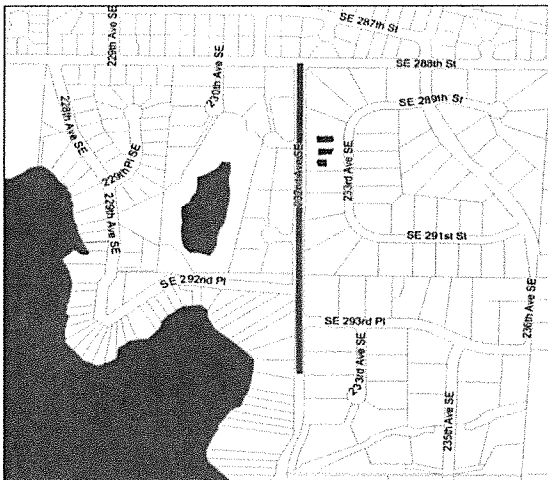
**DESCRIPTION**

**Major Street Maintenance.** Patch and Chip Seal 232nd Ave. SE from SE 288th Street to the back of the Pond at Greenbrier.

## BACKGROUND

This section of roadway can be preserved by 7 to 10 years at one third of the cost of an overlay. A chip seal will help stretch the grant funding and help the City get ahead of the curve with deteriorating streets.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Design Engineering	10,000	10,000					
Management and Admin	10,000	10,000					
Construction	80,000	80,000					
<b>TOTAL COSTS</b>	<b>100,000</b>	<b>100,000</b>					
<b>REQUESTED FUNDING</b>							
Grants	90,000	90,000					
Grant Matching	10,000	10,000					
<b>TOTAL SOURCES</b>	<b>100,000</b>	<b>100,000</b>					



**Street Department****T10****Downtown Public Parking****DESCRIPTION**

Develop additional public parking in the downtown area of Baker Street and Railroad Ave.

**BACKGROUND**

Most of the existing buildings in the Railroad Ave area were constructed without off street parking lots other than the Eagles Hall. This area is zoned "Town Center" which does not require off street parking with the development of the property. There currently is a deficiency in available parking to support the existing businesses. The cope of this project will be refined in the initial preliminary engineering phase. In the preliminary phase of this project the City will rebiew the cost and benefit of creating additional on street parking, expanginding the use of city owned right of way in the area, negotiating with owner of undeveloped property and / or purchasing additional property in the area.

<b>CAPITAL PROJECT COSTS</b>	<b>Total \$ 2017 -2022</b>	<b>2017</b>	<b>2018</b>	<b>2019</b>	<b>2020</b>	<b>2021</b>	<b>2022</b>
Land/Right of Way	60,000				60,000		
Preliminary Engineering	10,000			10,000			
Design Engineering	10,000			10,000			
Management and Admin	5,000			5,000			
Construction	60,000				60,000		
<b>TOTAL COSTS</b>	<b>145,000</b>			<b>25,000</b>	<b>120,000</b>		
<b>REQUESTED FUNDING</b>							
Grants	108,000				108,000		
Real Estate Excise Tax 2	25,000			25,000			
Grant Matching	12,000				12,000		
Other (Specify)							
<b>TOTAL SOURCES</b>	<b>145,000</b>			<b>25,000</b>	<b>120,000</b>		



## Street Department

**T11**

## 216th Avenue SE Overlay

**DESCRIPTION**

**Major Street Maintenance.** Patch and overlay 216th Ave. SE from SE 288th St. to SE 296th St.

## BACKGROUND

The pavement condition is average to poor. The roadway width and side improvements vary. The engineering, bid process, inspections and project management will be provided by City staff. This is a heavy traffic area project.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Engineering & Bid Docs	20,000			20,000			
Management & Admin	15,000			15,000			
Construction	145,000			145,000			
<b>TOTAL COSTS</b>	<b>180,000</b>			<b>180,000</b>			
<b>REQUESTED FUNDING</b>							
TIB Pavement Preservation	153,000			153,000			
Grant Matching	27,000			27,000			
<b>TOTAL SOURCES</b>	<b>180,000</b>			<b>180,000</b>			



## Street Department

T12

## Lawson Street Ph. 1

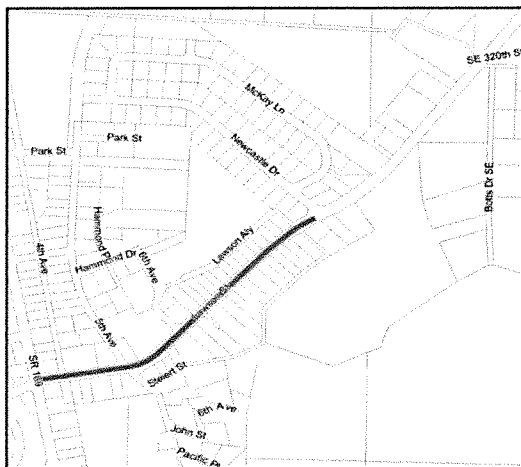
**DESCRIPTION**

**Major Street Maintenance.** Surface grinding; some panel replacement and shoulder widening from SR 169 to Newcastle Dr.

**BACKGROUND**

The pavement condition is average to poor. The roadway width is a little to narrow with no shoulders. The engineering, bid process, inspections and project management will be provided by City staff.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Engineering & Bid Docs	20,000			20,000			
Management & Admin	15,000			15,000			
Construction	130,000			130,000			
<b>TOTAL COSTS</b>	<b>165,000</b>			<b>165,000</b>			
<b>REQUESTED FUNDING</b>							
TIB Pavement Preservation	148,500			148,500			
Grant Matching	16,500			16,500			
<b>TOTAL SOURCES</b>	<b>165,000</b>			<b>165,000</b>			



**Street Department****T13****Grant Matching Fund****13.03****DESCRIPTION**

This project is used to accumulate funds for a match for grants for street and pedestrian projects now scheduled on the CIP.

**BACKGROUND**

The City has used this fund for professional technical assistance with grant applications and supplement funding if a grant is received for a project that needs to be moved up in the CIP schedule or if a larger match than anticipated is needed.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Funding to Match Grants	240,000	40,000	40,000	40,000	40,000	40,000	40,000
<b>TOTAL COSTS</b>	<b>240,000</b>	<b>40,000</b>	<b>40,000</b>	<b>40,000</b>	<b>40,000</b>	<b>40,000</b>	<b>40,000</b>
<b>REQUESTED FUNDING</b>							
Real Estate Excise Tax 2	240,000	40,000	40,000	40,000	40,000	40,000	40,000
<b>TOTAL SOURCES</b>	<b>240,000</b>	<b>40,000</b>	<b>40,000</b>	<b>40,000</b>	<b>40,000</b>	<b>40,000</b>	<b>40,000</b>

**What is a matching grant?**

A matching grant is a contingent grant awarded only if the receiving entity is able to put up (or independently raise) a sum equal to the amount provided by the granting entity.



**Street Department****T14****Lawson Street Sidewalk Phase 2****13.5****DESCRIPTION**

**Pedestrian Project.** Construct 1015 feet of new 5 foot concrete sidewalk on the north side of Lawson Street to from Sixth Avenue to the east boundary of Lawson Hill Estates. This project does not include curb gutter or street widening.

**BACKGROUND**

Lawson Hill Estates and the surrounding area is within 1 mile of the elementary school on Baker Street. The City is partnering with the School District to seek Safe Routes to School grants for this project. It is anticipated that additional funding will be needed to cover the entire cost. Transportation Improvement Board Funding and or potentially MPD mitigation funding may also be available. The City and the School District are planning to cooperate and jointly apply for this grant in 2017 for funding in 2018 and 2019.

**COMMENTS**

The timing of this project may have to wait for the pedestrian mitigation assistance from the Lawson Hills developer for this project. Other grant funding may also be available to complete the total funding.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Land/Right of Way	10,000		10,000				
Design Engineering	61,000		61,000				
Mgmt & Admin	15,000		5,000	10,000			
Construction Costs	270,000			270,000			
<b>TOTAL COSTS</b>	<b>356,000</b>		<b>76,000</b>	<b>280,000</b>			
<b>REQUESTED FUNDING</b>							
Safe Rt to School Grant	165,000		55,000	110,000			
TIB Pedestrian Grant	150,000			150,000			
Dev/Impact Fees/SEPA	41,000		21,000	20,000			
<b>TOTAL SOURCES</b>	<b>356,000</b>		<b>76,000</b>	<b>280,000</b>			



**Street Department****T15****Downtown Pedestrian and Bicycle Linkages Study****DESCRIPTION**

**Pedestrian Project:** This study will identify the best routes for pedestrians and bicycles to connect to the north and south of the old downtown area and identify right of way acquisition if needed.

**BACKGROUND**

The existing right of way for the state route is inadequate for widening to accommodate additional lanes along with pedestrian and bicycles. The study will investigate various bypass routes and key connection points, and provide opportunities for public input. Once the City has approved a pedestrian and bicycle plan for the downtown area the City will be in a better position to seek funding for these important alternative mode connections.

<b>CAPITAL PROJECT COSTS</b>	<b>Total \$ 2017 -2022</b>	<b>2017</b>	<b>2018</b>	<b>2019</b>	<b>2020</b>	<b>2021</b>	<b>2022</b>
Preliminary Engineering	10,000					10,000	
Design Engineering	20,000					20,000	
<b>TOTAL COSTS</b>	<b>30,000</b>					<b>30,000</b>	
<b>REQUESTED FUNDING</b>							
Grant Match	3,000					3,000	
Pedestrian Grant	27,000					27,000	
<b>TOTAL SOURCES</b>	<b>30,000</b>					<b>30,000</b>	



**Street Department****T16****Lawson Connector****DESCRIPTION**

**Capacity Adding Project.** This project provides a new connection from East Black Diamond to SR 169 west of the narrow section of through old downtown. The new road will primarily serve the Lawson Hills Master Planned Development.

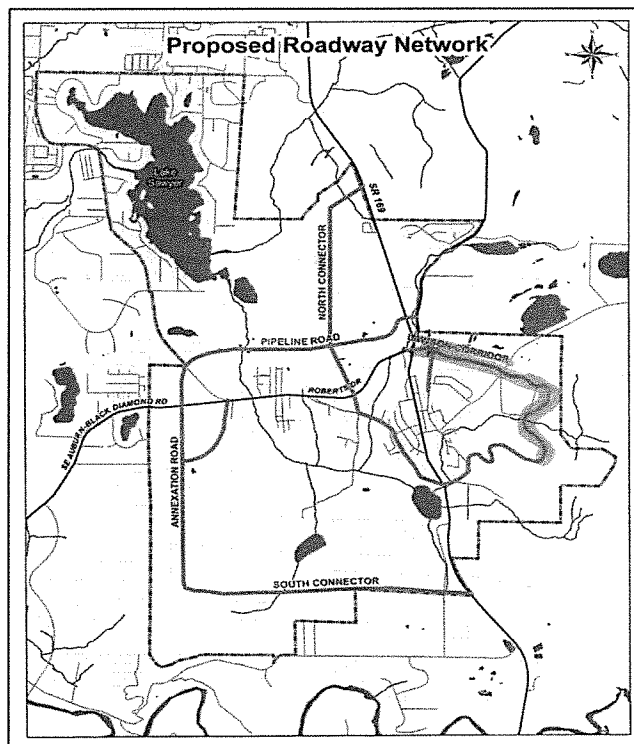
**BACKGROUND**

This important additional street connection will help distribute traffic and increase local capacity as well as preserve the existing capacity on Lawson street and the downtown corridor on SR 169. This project was added to the future street network planning in the 2009 comprehensive plan update.

**COMMENTS**

The timing of this project is tied to the Lawson Hills MPD initial phases. This project is planned to be designed and constructed by the developer.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Design Engineering	600,000		600,000				
Construction Costs	2,600,000		2,600,000				
<b>TOTAL COSTS</b>	<b>3,200,000</b>		<b>3,200,000</b>				
<b>REQUESTED FUNDING</b>							
Developer Funded	3,200,000		3,200,000				
<b>TOTAL SOURCES</b>	<b>3,200,000</b>		<b>3,200,000</b>				



## Street Department

T17

## BD-Ravensdale Rd/Roberts Drive /SR 169 Interim Intersection Improve.

**DESCRIPTION**

**Capacity Adding Project.** This project will meet existing Level of Service deficiency, near term future capacity needs and address safety issues at these two intersections.

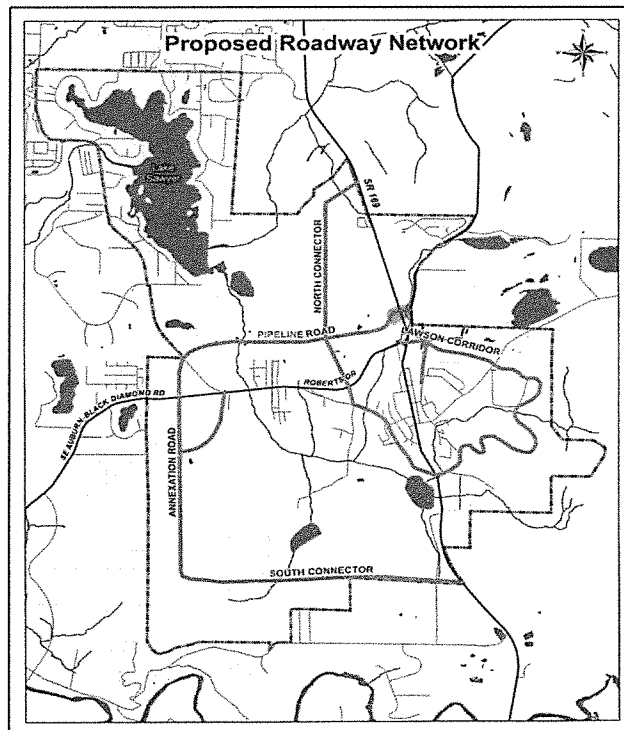
**BACKGROUND**

If the City is able to obtain significant grant funding in the next couple of years (once the population exceeds 5,000), the City may be able to move forward with a better long term comprehensive solution for these two intersections. This initial interim project does not replace the ultimate plan for these intersections but it will give the City more time to obtain the funding for a more comprehensive solution.

**COMMENTS**

This project is planned to be designed and constructed by the developer.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Design Engineering	200,000	200,000					
Management & Administration	100,000		100,000				
Construction Costs	1,000,000			1,000,000			
<b>TOTAL COSTS</b>	<b>1,300,000</b>	<b>200,000</b>	<b>100,000</b>	<b>1,000,000</b>			
<b>REQUESTED FUNDING</b>							
Developer Funded	1,300,000	200,000	100,000	1,000,000			
<b>TOTAL SOURCES</b>	<b>1,300,000</b>	<b>200,000</b>	<b>100,000</b>	<b>1,000,000</b>			



## Street Department

T18

### North Connector

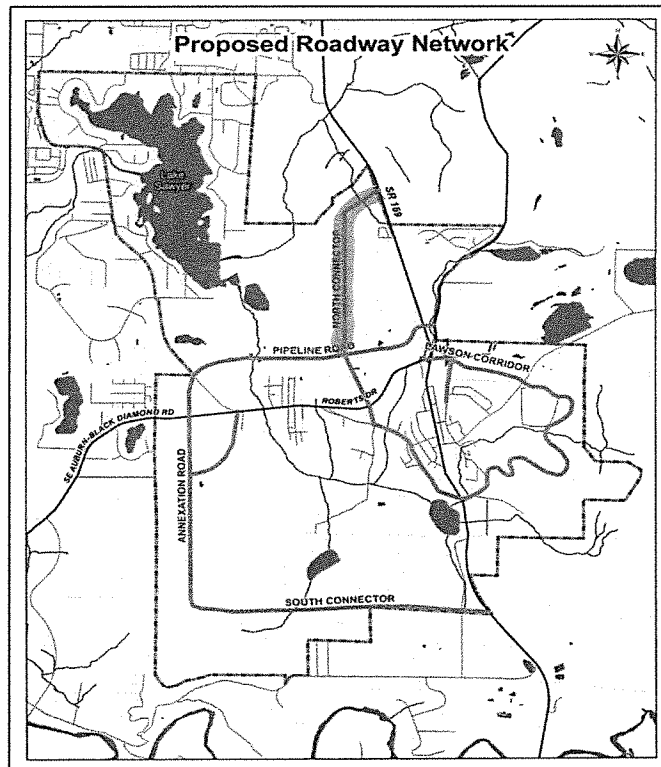
#### DESCRIPTION

**Capacity Adding Project.** This project provides a link from the North Triangle area of Lawson Hill MPD and the Villages MPD to SR 169 and a future link to the "pipeline" road.

#### BACKGROUND

This project is consistent with the City's Future Road Network Plan in the City's Comprehensive Plan

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Design Engineering	225,000				225,000		
Construction Costs	775,000				775,000		
<b>TOTAL COSTS</b>	<b>1,000,000</b>				<b>1,000,000</b>		
<b>REQUESTED FUNDING</b>							
Developer Funded	1,000,000				1,000,000		
<b>TOTAL SOURCES</b>	<b>1,000,000</b>				<b>1,000,000</b>		



## Street Department

T19

## Roberts Dr/Lake Sawyer Rd Extension Roundabout

**DESCRIPTION**

**Capacity Adding Project.** This project will provide intersection capacity as needed for the Villages MPD.

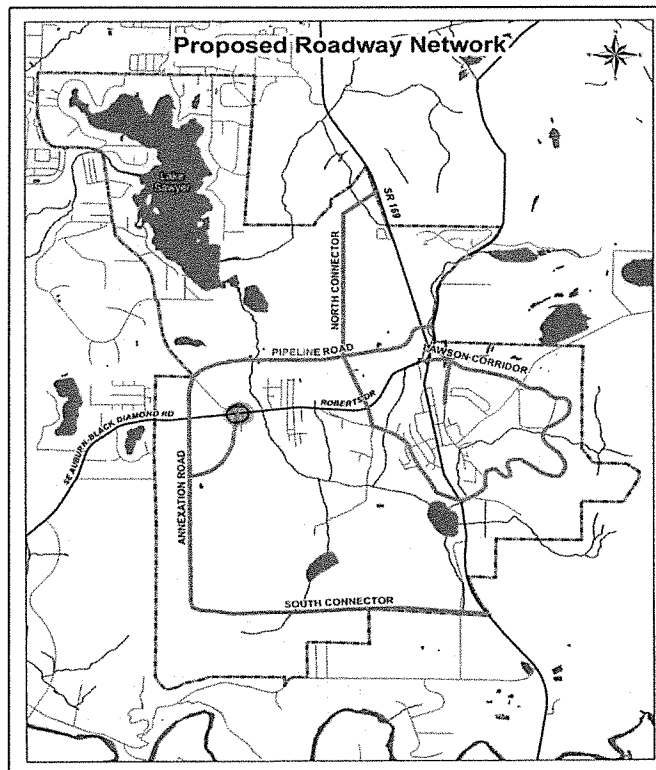
**BACKGROUND**

This project is consistent with the City's Future Road Network Plan in the City's Comprehensive Plan

**COMMENTS**

This project is planned to be designed and constructed by the developer.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Design Engineering	225,000	225,000					
Construction Costs	775,000	775,000					
<b>TOTAL COSTS</b>	<b>1,000,000</b>	<b>1,000,000</b>					
<b>REQUESTED FUNDING</b>							
Developer funded	1,000,000	1,000,000					
<b>TOTAL SOURCES</b>	<b>1,000,000</b>	<b>1,000,000</b>					



## Street Department

T20

## BD-Ravensdale Rd/SR 169 Permanent Intersection Imp.

**DESCRIPTION**

**Capacity Adding Project.** This project realigns Ravensdale Road further to the north providing a functional distance between the next major intersection to the south (Roberts Drive). The intersection capacity will be increased by either a larger signalized intersection or a roundabout. Road right of way will need to be acquired.

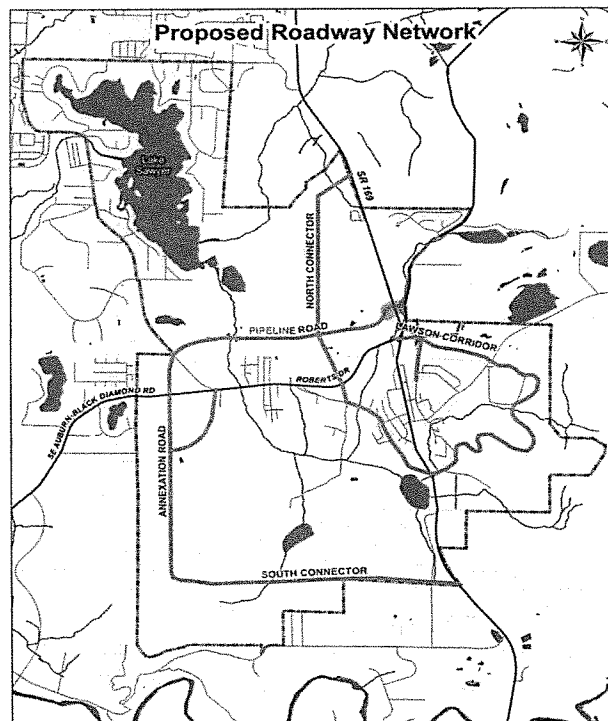
**BACKGROUND**

This project is in keeping with the City's adopted Future Roadway Network as part of the City's Comprehensive Plan. Once the City is over 5000 in population, the City will be eligible for larger grants for larger projects such as this.

**COMMENTS**

This project is planned to be designed and constructed by the developer.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Design Engineering	1,500,000					1,500,000	
Construction Costs	6,500,000					6,500,000	
<b>TOTAL COSTS</b>	<b>8,000,000</b>					<b>8,000,000</b>	
<b>REQUESTED FUNDING</b>							
Developer Funded	4,000,000					4,000,000	
TIB Federal Grant Matching	4,000,000					4,000,000	
<b>TOTAL SOURCES</b>	<b>8,000,000</b>					<b>8,000,000</b>	



**Street Department****T21****Roberts Dr/Annexation Road Intersection Improvements****DESCRIPTION**

**Capacity Adding Project.** This project will provide intersection capacity to serve the Villages MPD.

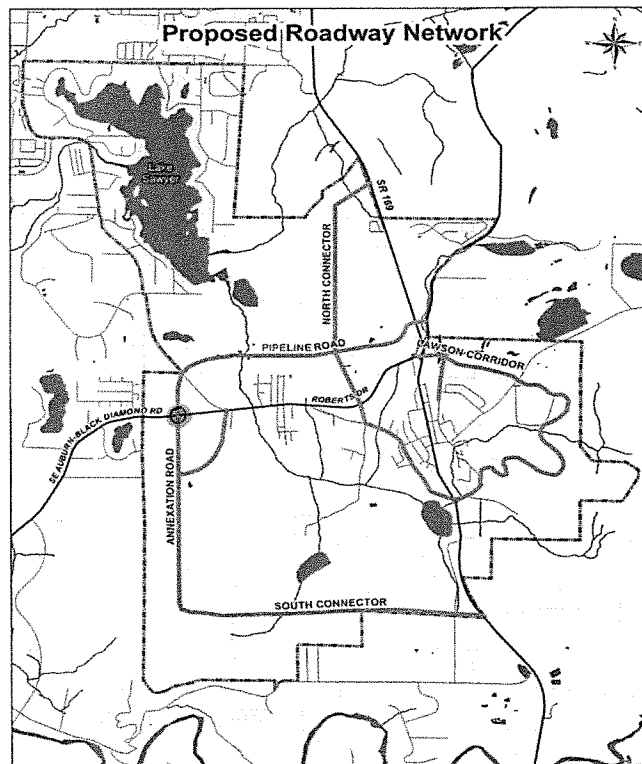
**BACKGROUND**

This project is consistent with the City's Comprehensive Plan and the Future Road Network plan therein.

**COMMENTS**

This project is planned to be designed and constructed by the developer.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Design Engineering	250,000					250,000	
Construction Costs	750,000					750,000	
<b>TOTAL COSTS</b>	<b>1,000,000</b>					<b>1,000,000</b>	
<b>REQUESTED FUNDING</b>							
Developer Funded	1,000,000					1,000,000	
<b>TOTAL SOURCES</b>	<b>1,000,000</b>					<b>1,000,000</b>	



## Street Department

T22

## 216th Ave SE/SE 288th St Intersection Improvements

**DESCRIPTION**

**Capacity Adding Project.** This project will provide intersection capacity for growth within the City of Black Diamond.

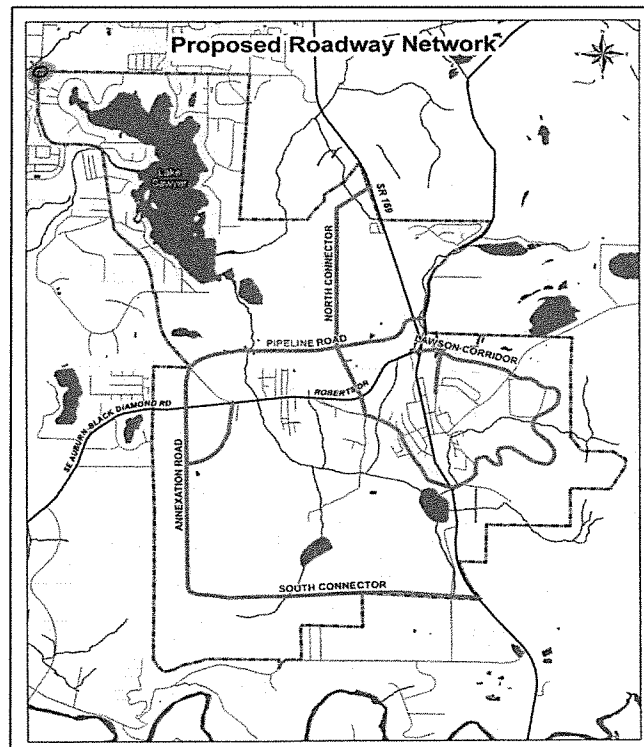
**BACKGROUND**

This project is consistent with the City's Comprehensive Plan and the Future Road Network Plan therein.

**COMMENTS**

This project is planned to be designed and constructed by the developer.

CAPITAL PROJECT COSTS	Total \$ 2017 -2022	2017	2018	2019	2020	2021	2022
Design Engineering	300,000						300,000
Construction Costs	1,100,000						1,100,000
<b>TOTAL COSTS</b>	<b>1,400,000</b>						<b>1,400,000</b>
<b>REQUESTED FUNDING</b>							
Developer Funded	1,400,000						1,400,000
<b>TOTAL SOURCES</b>	<b>1,400,000</b>						<b>1,400,000</b>



## Water Department CAPITAL PROJECT SUMMARY

Summary by Project							
		Capital Plan 2017 - 2022					
Project Title	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
W1 4.3 Mil Gal Tank Maintenance and Repair	30,000	30,000					
W2 Springs & Transmission Reconstruction	2,956,000	465,000	2,491,000				
W3 Water Comprehensive Plan Update	30,000	30,000					
W4 Salmon Enhancement & Green Energy	1,392,000			77,000	55,000	210,000	1,050,000
W5 Asbestos Water Main Replacement Prgm	535,000	5,000	3,000	99,000	428,000		
W6 0.5 MG Water Reservoir Recoat	215,000		20,000	195,000			
W7 Fire Flow Loop - North Commercial Area	800,000				140,000	660,000	
<b>TOTAL ESTIMATED COSTS</b>	<b>5,958,000</b>	<b>530,000</b>	<b>2,514,000</b>	<b>371,000</b>	<b>623,000</b>	<b>870,000</b>	<b>1,050,000</b>
<b>Funding Sources</b>							
<b>Water Reserves and Rates</b>							
W1 4.3 Mil Gal Tank Maintenance and Repair	30,000	30,000					
W3 Water Comprehensive Plan Update	30,000	30,000					
W5 Asbestos Water Main Replacement Prgm	59,000	5,000	3,000	9,000	42,000		
W7 Fire Flow Loop - North Commercial Area	400,000				70,000	330,000	
<b>Total Water Reserves &amp; Rates</b>	<b>519,000</b>	<b>65,000</b>	<b>3,000</b>	<b>9,000</b>	<b>112,000</b>	<b>330,000</b>	
<b>Water System &amp; Facilities Funding Agmt (WSFFA)</b>							
W2 Springs & Transmission Reconstruction	2,956,000	465,000	2,491,000				
<b>Total WSFFA Funds</b>	<b>2,956,000</b>	<b>465,000</b>	<b>2,491,000</b>				
<b>Grant Funding</b>							
W4 Salmon Mitigation (Salmon Enhancement)	540,000						540,000
W4 Green Energy (Salmon Enhancement)	550,000				40,000		510,000
W5 CDBG Grant (Asbestos Replacement Prgm)	476,000			90,000	386,000		
<b>Total Grant Funding</b>	<b>1,566,000</b>			<b>90,000</b>	<b>426,000</b>		<b>1,050,000</b>
<b>Loans</b>							
W4 PWTF Loan (Salmon Enhancement)	302,000			77,000	15,000	210,000	
W6 PWTF Loan (0.5 MG Water Reservoir Recoat)	215,000		20,000	195,000			
<b>Total PWTF Loan</b>	<b>517,000</b>		<b>20,000</b>	<b>272,000</b>	<b>15,000</b>	<b>210,000</b>	
<b>Developer Funding</b>							
W7 Fire Flow Loop - North Commercial Area	400,000				70,000	330,000	
<b>Total Developer Funding</b>	<b>400,000</b>				<b>70,000</b>	<b>330,000</b>	
<b>TOTAL ESTIMATED FUNDING SOURCES</b>	<b>5,958,000</b>	<b>530,000</b>	<b>2,514,000</b>	<b>371,000</b>	<b>623,000</b>	<b>870,000</b>	<b>1,050,000</b>

## Water Department

W1

### 4.3 Mil Gal Tank Maintenance & Repairs

14.11

**DESCRIPTION**

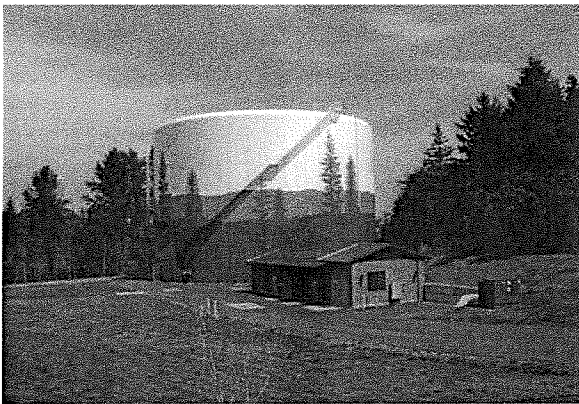
The 4.3 million gallon water tank will be 10 years old in 2016. The tank will need be drained and any and all spots of corrosion or paint damage will need to be spot treated to help preserve the over all inside and exterior coatings.

**COMMENTS**

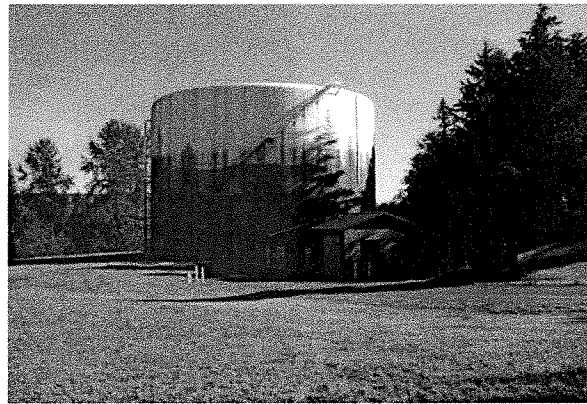
This project while it is a maintenance project does extend the life of the coating by about 5 to 10 years and therefore is included in this Capital Improvement Plan

<b>CAPITAL PROJECT COSTS</b>	<b>Total \$ 2017 - 2022</b>	<b>2017</b>	<b>2018</b>	<b>2019</b>	<b>2020</b>	<b>2021</b>	<b>2022</b>
Water Tank Maintenance	30,000	30,000					
<b>TOTAL COSTS</b>	<b>30,000</b>	<b>30,000</b>					
<b>REQUESTED FUNDING</b>							
Water Rates	30,000	30,000					
<b>TOTAL SOURCES</b>	<b>30,000</b>	<b>30,000</b>					

Newly constructed



August 2016



## Water Department

W2

## Springs &amp; Transmission Reconstruction (WSFFA)

13.06

**DESCRIPTION**

The concept to rehabilitate the City's water source has shifted from A (trying to protect and rehabilitate the existing open springs, replacing pipes over the steep slope, and reconstructing the river crossing) to B (tapping an artesian spring on the north side of the river, changing the water right point of withdrawal, and securing an easement from State Parks. Common to both options are a new pumping system, an updated chlorine system, and replacing the transmission main back to Black Diamond.

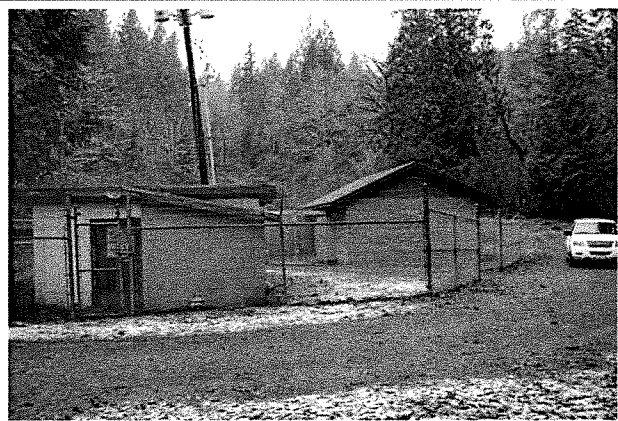
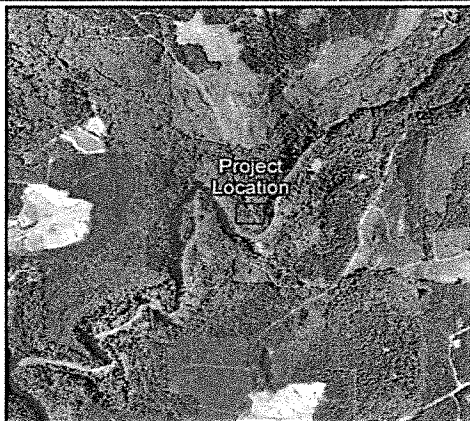
**BACKGROUND**

In late 2013, the City contracted with RH2 to study and compare two alternative concepts to improve and redevelop the springs to full water right capacity. The Springs Alternative Analysis Study recommended that the City pursue tapping an artesian spring on the north side of the river rather than reconstructing the more vulnerable and more complicated spring collection system on the south side. City staff and the Public Works Committee and Council at a CIP workshop agreed with this recommendation because of the lower maintenance, higher reliability, lower risks to employees, and a better protected water supply.

**COMMENTS**

This is a capacity and system reliability project funded by the Water Supply and Facilities Funding Agreement (WSFFA).

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Easement/water right transfer	300,000	150,000	150,000				
Road/bldg imp.	30,000		30,000				
Preliminary Engineering	80,000	80,000					
Design Engineering	180,000	180,000					
Management / Admin	105,000	55,000	50,000				
Construction Costs	2,251,000		2,251,000				
Legal Fees	10,000		10,000				
<b>TOTAL COSTS</b>	<b>2,956,000</b>	<b>465,000</b>	<b>2,491,000</b>				
<b>REQUESTED FUNDING</b>							
Water Supply & Fac. Fnd Agrmt.	2,956,000	465,000	2,491,000				
<b>TOTAL SOURCES</b>	<b>2,956,000</b>	<b>465,000</b>	<b>2,491,000</b>				



**Water Department****W3****Water Comprehensive Plan Update**

14.12

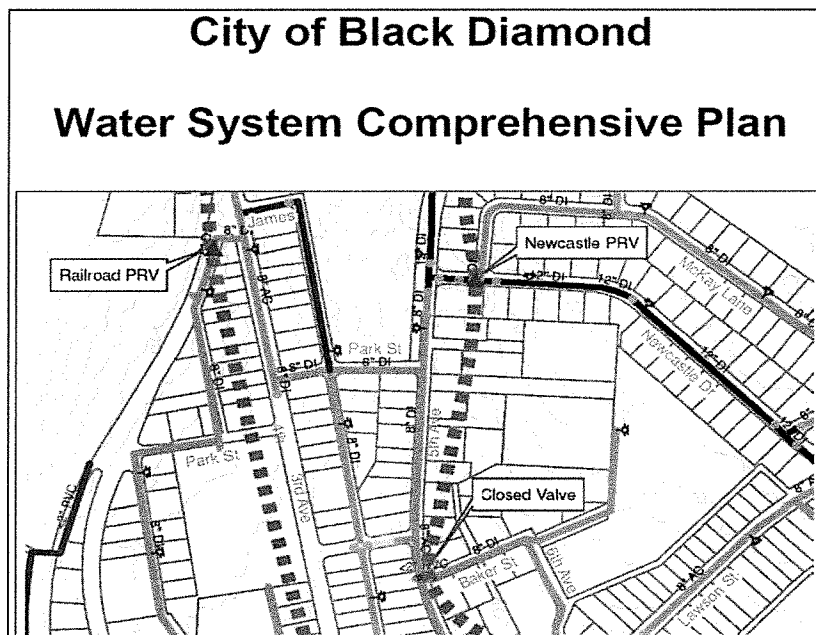
**DESCRIPTION**

The Department of Health requires an update of the Water Comprehensive Plan every 6 years. The City was due to update the Water Comprehensive Plan in 2015.

**COMMENTS**

The Public Works Department work load and staffing level has held up the update the Water Comprehensive Plan. A portion of the work was intended to be done in house with assistance from an outside consultant for water system modeling and system mapping. The City staff also needs time to guide and direct the planning effort.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Management / Administration	5,000	5,000					
In house engineering	5,000	5,000					
Public hearings/edits/approval	20,000	20,000					
<b>TOTAL COSTS</b>	<b>30,000</b>	<b>30,000</b>					
<b>REQUESTED FUNDING</b>							
Water Reserves and Rates	30,000	30,000					
<b>TOTAL SOURCES</b>	<b>30,000</b>	<b>30,000</b>					



**Water Department****W4****Salmon Enhancement & Green Energy**

14.09

**DESCRIPTION**

Replace the turbine, with a new larger turbine, electrical generator and connections to the power grid. The inlet pipe and spring overflow pipes needs to be replaced and upsized. The outlet discharge pipe needs to be replaced.

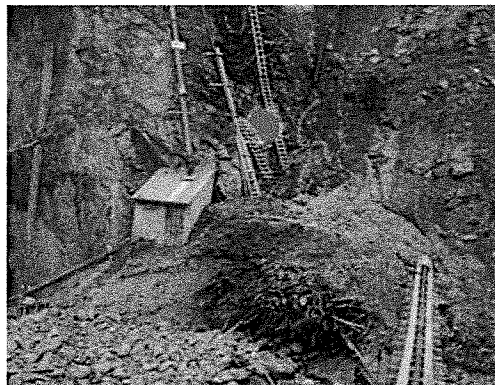
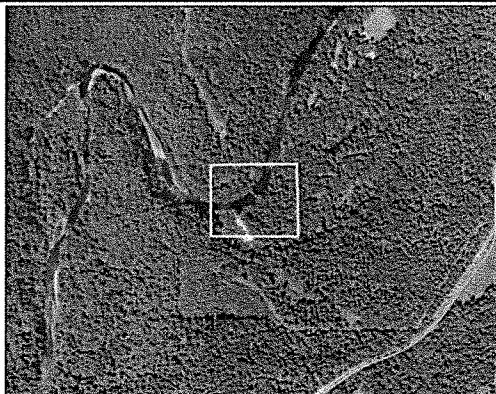
**BACKGROUND**

This project will provide a source of green energy, prevent south bank erosion, reduce the risk of landslides into the Green River, reduce turbidity in the Green River and protect the stability of the springs collection sites. The City hopes to partner with an environmental group or a local tribe for the construction of a salmon spawning bed with the cool clean discharge water from the power generation.

**COMMENTS**

The City is considering a simpler, easier to maintain water source on the north side of the Green River. See project W1. The transfer of the springs water right to an artesian spring on the north side of the river separates the need for the turbine pumping of south spring water across the river and therefore separates the obligation from the Water Supply and Facilities Funding Partners. However the benefit to the City of potentially generating revenue to keep water rates down and producing clean green power is still available to the City. The possibility of grant funding for the project looks very strong. If debt is incurred it will be repaid by energy savings.

<b>CAPITAL PROJECT COSTS</b>	<b>Total \$ 2017 - 2022</b>	<b>2017</b>	<b>2018</b>	<b>2019</b>	<b>2020</b>	<b>2021</b>	<b>2022</b>
Preliminary Engineering	70,000			70,000			
Permit and Partnership Dev	50,000				50,000		
Engineering	200,000					200,000	
Project Management	72,000			7,000	5,000	10,000	50,000
Construction Costs	1,000,000						1,000,000
<b>TOTAL COSTS</b>	<b>1,392,000</b>			<b>77,000</b>	<b>55,000</b>	<b>210,000</b>	<b>1,050,000</b>
<b>REQUESTED FUNDING</b>							
<b>Grant Funding</b>							
Grant (Salmon mitigation)	540,000						540,000
Grant (Green Energy)	550,000				40,000		510,000
<b>Total Grant Funding</b>							
<b>Loans</b>							
PWTF Loan	302,000			77,000	15,000	210,000	
<b>TOTAL SOURCES</b>	<b>1,392,000</b>			<b>77,000</b>	<b>55,000</b>	<b>210,000</b>	<b>1,050,000</b>



**Water Department****W5****Asbestos Water Main Replacement Program**

17.13

**DESCRIPTION**

Replace 4 inch and 6 inch asbestos water main on Morgan Drive from Roberts Drive to the north end of Morgan Drive, east to Union and then south 350 feet to the existing ductile iron pipe. 1600 feet.

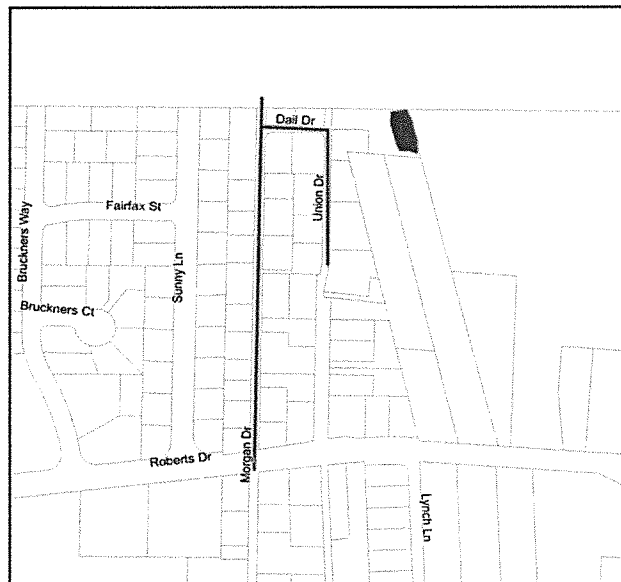
**BACKGROUND**

This project will improve fire flows to the Morganville area and replace substandard pipe that is nearing its useful performance life. An income survey will be required to determine eligibility for Community Development Block Grant Funding.

**COMMENTS**

Further future study of the existing asbestos water mains may show that a different asbestos water main should be replaced than this particular water main. Leak history, street reconstruction projects, pavement condition, developer improvements and asbestos pipe strength tests may change the priority of the asbestos pipe to be replaced.

<b>CAPITAL PROJECT COSTS</b>	<b>Total \$ 2017 - 2022</b>	<b>2017</b>	<b>2018</b>	<b>2019</b>	<b>2020</b>	<b>2021</b>	<b>2022</b>
Income survey/ CDBG application	8,000	5,000	3,000				
Preliminary Engineering	20,000			20,000			
Engineering, Design, Bid Docs	70,000			70,000			
Management / Administration	19,000			9,000	10,000		
Construction	380,000				380,000		
Contingency	38,000				38,000		
<b>TOTAL COSTS</b>	<b>535,000</b>	<b>5,000</b>	<b>3,000</b>	<b>99,000</b>	<b>428,000</b>		
<b>REQUESTED FUNDING</b>							
KC CDBG Grant	476,000			90,000	386,000		
REET or Grant Matching Funds	59,000	5,000	3,000	9,000	42,000		
<b>TOTAL SOURCES</b>	<b>535,000</b>	<b>5,000</b>	<b>3,000</b>	<b>99,000</b>	<b>428,000</b>		



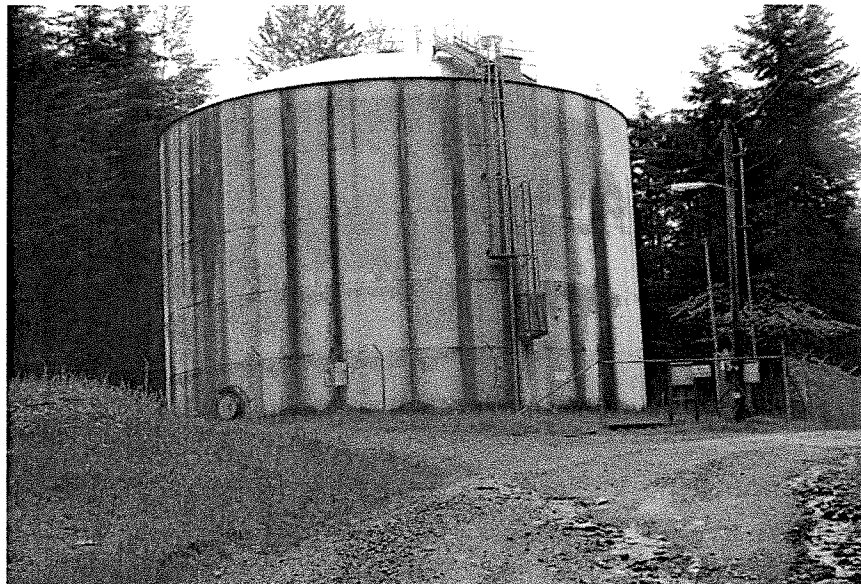
**Water Department****W6****0.5 MG Water Reservoir Recoat**

**DESCRIPTION** Repaint the 0.5 MG reservoir inside and out.

**BACKGROUND** The City drained and inspected the interior of the water tank in 2015. The interior coating has deteriorated to a point where total replacement is needed. If the developer were to move forward with development above this reservoir, it would be cheaper with lower operational cost to rebuild the storage capacity up above with the new reservoir that will be needed at a higher elevation. However the lower reservoir would need to last until the higher one is built.

**COMMENTS** This project has been deferred to 2019. In 2018 The City will reassess the tank condition, and the development schedule and make a decision to defer the project for a few more years or move forward and paint the tank and preserve it. If the City makes a decision to move forward the staff should seek PWTF loan if available.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Design Engineering & Bid Docs	20,000		20,000				
Specialty Inspection	10,000			10,000			
Tank Painting	180,000			180,000			
Project Management	5,000			5,000			
<b>TOTAL COSTS</b>	<b>215,000</b>		<b>20,000</b>	<b>195,000</b>			
REQUESTED FUNDING							
PWTF Loan or other	215,000		20,000	195,000			
<b>TOTAL SOURCES</b>	<b>215,000</b>		<b>20,000</b>	<b>195,000</b>			



## Water Department

W7

## Fire Flow Loop - North Commercial Area

13.08

**DESCRIPTION**

Replace 200 feet of 4 inch asbestos concrete with 12 inch ductile iron water main across SR 169 at the power substation; Complete a 750 foot 12 inch ductile iron water main loop from Cedar Brook Mobile Home Park to the 6 inch asbestos water main behind Boots Tavern. Replace 1200 feet of 8 inch asbestos water main on the west side of SR 169 from Ravensdale Road north to the existing 12 inch ductile iron water main. 2150 feet of 12 inch water in total.

**BACKGROUND**

This is a capacity and system reliability project. Other commercial properties development along SR-169 may also be contributing or constructing portions of this project, if required through SEPA. This project can easily be phased if funding is short.

**COMMENTS**

This project does not describe what is needed to provide fire flow and redundant service to the north triangle but rather is the minimum to provide a looped system for the north part of the existing city system. If OakPointe commercial development in the North Triangle moves forward, the water line looping required for that new development will provide an outside loop for this area and therefore lower the priority of the project. The pipe replacement issues however would remain.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Management / Administration	30,000				30,000		
Permitting, easements, legal	30,000				30,000		
Engineering	80,000				80,000		
Construction Costs	660,000					660,000	
<b>TOTAL COSTS</b>	<b>800,000</b>				<b>140,000</b>	<b>660,000</b>	
<b>REQUESTED FUNDING</b>							
Water Fund Reserves	400,000				70,000	330,000	
Developer Mitigation	400,000				70,000	330,000	
<b>TOTAL SOURCES</b>	<b>800,000</b>				<b>140,000</b>	<b>660,000</b>	



## Sewer Department CAPITAL PROJECT SUMMARY

Summary By Project		Capital Plan 2017 - 2022					
Project Title	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
S1 Upgrade Utility Staff Facilities	59,000	59,000					
S2 Infiltration and Inflow Reduction	150,000	25,000	25,000	25,000	25,000	25,000	25,000
S3 Cedarbrook Sewer Main	330,000	35,000	295,000				
S4 Materials Handling Facility	360,000			10,000	350,000		
S5 Morganville Force Main Reroute	460,000					20,000	440,000
S6 Equipment Replacement	282,000	47,000	47,000	47,000	47,000	47,000	47,000
<b>TOTAL ESTIMATED COSTS</b>	<b>1,641,000</b>	<b>166,000</b>	<b>367,000</b>	<b>82,000</b>	<b>422,000</b>	<b>92,000</b>	<b>512,000</b>
<b>Funding Sources</b>							
<b>PWTF Loan Funding</b>							
S3 Cedarbrook Sewer Main	330,000	35,000	295,000				
S5 Morganville Force Main Reroute	440,000						440,000
<b>Total PWTF Funding</b>	<b>770,000</b>	<b>35,000</b>	<b>295,000</b>				<b>440,000</b>
<b>Grants</b>							
S4 Materials Handling Facility	300,000				300,000		
<b>Total Grants</b>	<b>300,000</b>				<b>300,000</b>		
<b>Sewer Reserves</b>							
S1 Upgrade Utility Staff Facilities	29,000	29,000					
S2 Infiltration and Inflow Reduction	150,000	25,000	25,000	25,000	25,000	25,000	25,000
S4 Materials Handling Facility	12,000			2,000	10,000		
S5 Morganville Force Main Reroute	20,000					20,000	
S6 Equipment Replacement	60,000	10,000	10,000	10,000	10,000	10,000	10,000
<b>Total Sewer Reserves</b>	<b>271,000</b>	<b>64,000</b>	<b>35,000</b>	<b>37,000</b>	<b>45,000</b>	<b>55,000</b>	<b>35,000</b>
<b>Contributions from other Departments</b>							
S1 Upgrade Utility Staff Facilities	30,000	30,000					
S4 Materials Handling Facility	48,000			8,000	40,000		
S6 Equipment Replacement	222,000	37,000	37,000	37,000	37,000	37,000	37,000
<b>Total Contributions from Other Departments</b>	<b>300,000</b>	<b>67,000</b>	<b>37,000</b>	<b>45,000</b>	<b>77,000</b>	<b>37,000</b>	<b>37,000</b>
<b>TOTAL ESTIMATED FUNDING SOURCES</b>	<b>1,641,000</b>	<b>166,000</b>	<b>367,000</b>	<b>82,000</b>	<b>422,000</b>	<b>92,000</b>	<b>512,000</b>
<b>DEBT SERVICE</b>							
S3 Cedarbrook Sewer Main	69,270		13,854	13,854	13,854	13,854	13,854
<b>TOTAL DEBT SERVICE</b>	<b>69,270</b>		<b>13,854</b>	<b>13,854</b>	<b>13,854</b>	<b>13,854</b>	<b>13,854</b>

**Sewer Department****S1****Upgrade Facilities Staff Facility****DESCRIPTION**

Provide locker room, boot / rain / safety gear room, shower and cleanup facility. Install security fencing around the facility with automated gates.

**BACKGROUND**

Staff has one small bathroom that is too small to change clothes, needs more room for gear storage, need a place to wash down when they get too muddy or contaminated from various materials in the course of their work. This project is being charged primarily to sewer as the need to shower and clean up is usually related to sewer work. The other major need is for fencing around the Public Works Facility for safety and security reasons.

<b>CAPITAL PROJECT COSTS</b>	<b>Total \$ 2017 - 2022</b>	<b>2017</b>	<b>2018</b>	<b>2019</b>	<b>2020</b>	<b>2021</b>	<b>2022</b>
In house design & permitting	1,000	1,000					
Remodel costs	14,000	14,000					
Fencing costs	39,000	39,000					
Management / Administration	5,000	5,000					
<b>TOTAL COSTS</b>	<b>59,000</b>	<b>59,000</b>					
<b>REQUESTED FUNDING</b>							
Water Department	10,000	10,000					
Street Department	10,000	10,000					
Stormwater Department	10,000	10,000					
Sewer Funds.	29,000	29,000					
<b>TOTAL SOURCES</b>	<b>59,000</b>	<b>59,000</b>					



## Sewer Department

S2

## Infiltration and Inflow Reduction Program

13.10

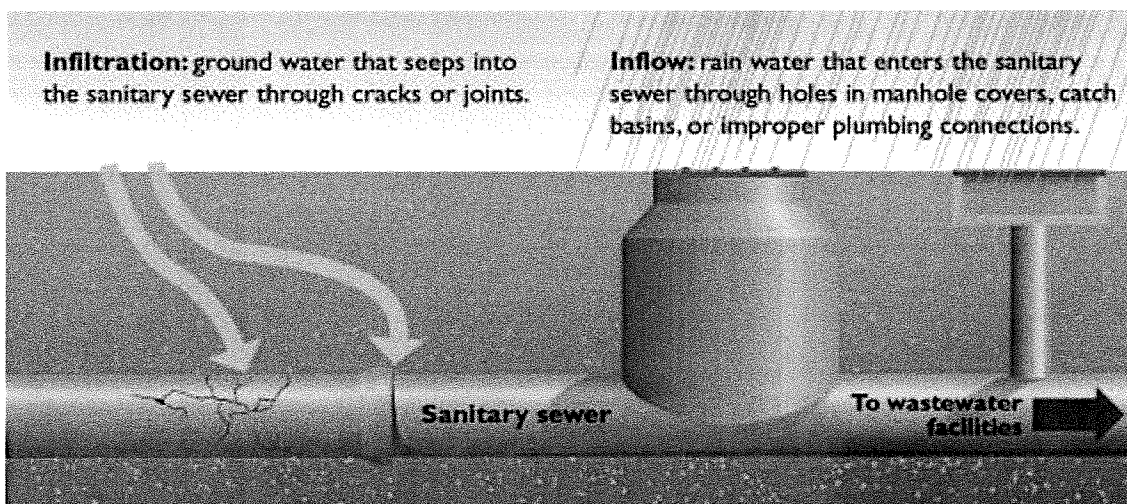
**DESCRIPTION**

This project funds any activities that reduce infiltration of groundwater or inflow of stormwater into the sewer system such as: TV inspections, smoke testing, flow monitoring, and then Repair Work such as: pipe rehabilitation, sealing, requiring private line replacement, manhole repair and sewer line replacement.

**BACKGROUND**

The City needs to reduce the infiltration and inflow as good stewardship and maintenance of the existing sewer system. The City also desires to preserve and recapture capacity in the wastewater system by reducing and controlling the peak flows. The City will continue to monitor the expense and effectiveness of this program.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Management / Administration	30,000	5,000	5,000	5,000	5,000	5,000	5,000
Design & Construction	120,000	20,000	20,000	20,000	20,000	20,000	20,000
<b>TOTAL COSTS</b>	<b>150,000</b>	<b>25,000</b>	<b>25,000</b>	<b>25,000</b>	<b>25,000</b>	<b>25,000</b>	<b>25,000</b>
<b>REQUESTED FUNDING</b>							
Sewer Reserve	150,000	25,000	25,000	25,000	25,000	25,000	25,000
<b>TOTAL SOURCES</b>	<b>150,000</b>	<b>25,000</b>	<b>25,000</b>	<b>25,000</b>	<b>25,000</b>	<b>25,000</b>	<b>25,000</b>



**Sewer Department****S3****Cedarbrook Sewer Main****13.11****DESCRIPTION**

Acquire City easement through the trailer park. Rehabilitate or reconstruct the existing sewer main to provide reliable public sewer service to the customers in the north east portion of the City.

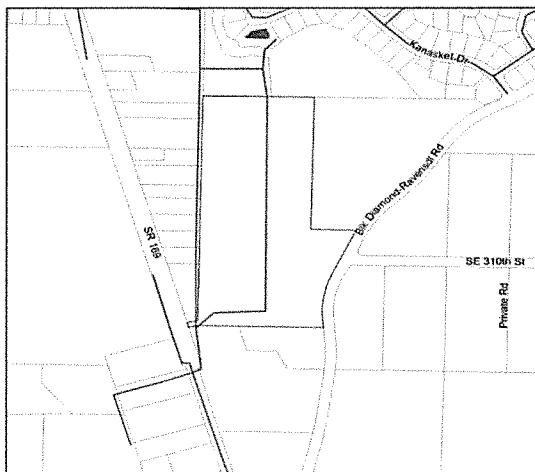
**BACKGROUND**

This project is necessary to reduce infiltration and Inflow and to eliminate the maintenance problems caused by the settled sections of sewer main.

**COMMENTS**

Portions of the existing sewer main will have to be reconstructed other section might be just repaired. The budget has been increased to reflect the cost of reconstructing portion of the sewer. A 20 year Public Works Trust Fund Loan will generate a debt payment of \$13,853.83 per year at 1%.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Prelim Engineering & Legal	30,000	30,000					
Design Engineering	50,000		50,000				
Construction Costs	235,000		235,000				
Management / Administration	15,000	5,000	10,000				
<b>TOTAL COSTS</b>	<b>330,000</b>	<b>35,000</b>	<b>295,000</b>				
<b>REQUESTED FUNDING</b>							
Public Works Trust Fund Loan	330,000	35,000	295,000				
<b>TOTAL SOURCES</b>	<b>330,000</b>	<b>35,000</b>	<b>295,000</b>				
<b>PWTF Loan Repay</b>							
Sewer Fund	69,270		13,854	13,854	13,854	13,854	13,854
<b>Total Debt under Timeframe</b>	<b>69,270</b>		<b>13,854</b>	<b>13,854</b>	<b>13,854</b>	<b>13,854</b>	<b>13,854</b>



**Sewer Department****S4****Materials Handling Facility****13.13****DESCRIPTION**

Construct a Materials Handling site for composting soil and organic material for re-use, storage of street waste for disposal, storage of woody debris and dewater vector material. The site will need sanitary sewer connection, a shed to keep contaminated materials out of the rain.

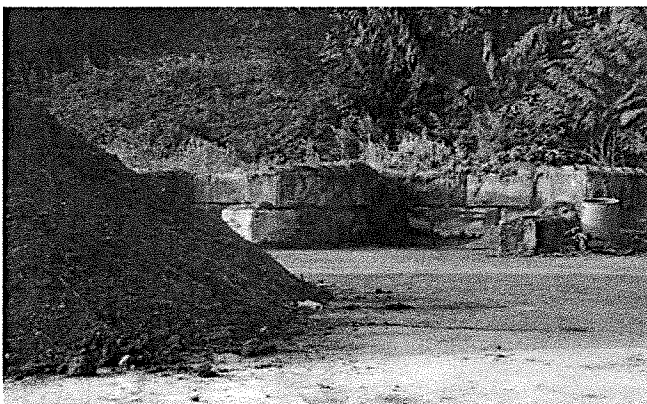
**BACKGROUND**

When the City sells the sewer lagoon back to Palmer Coking Coal as per the purchase and sale agreement, the City will need to either lease the site for a while longer but will need to look for a better long term solution for this need.

**COMMENTS**

Two other options are: 1) a joint facility with Covington, Maple Valley, King County and perhaps, WSDOT , 2) designing, permitting and constructing a facility between the gym and the public works buildings.

<b>CAPITAL PROJECT COSTS</b>	<b>Total \$ 2017 - 2022</b>	<b>2017</b>	<b>2018</b>	<b>2019</b>	<b>2020</b>	<b>2021</b>	<b>2022</b>
Study and interlocal coord	10,000			10,000			
Engineering and Environmental	20,000				20,000		
Property Purchase							
Construction Costs	330,000				330,000		
<b>TOTAL COSTS</b>	<b>360,000</b>			<b>10,000</b>	<b>350,000</b>		
<b>REQUESTED FUNDING</b>							
Sewer Funds	12,000			2,000	10,000		
Water Department	12,000			2,000	10,000		
Parks & Cemetery	12,000			2,000	10,000		
Street Department	12,000			2,000	10,000		
Stormwater Department	12,000			2,000	10,000		
Grant	300,000				300,000		
<b>TOTAL SOURCES</b>	<b>360,000</b>			<b>10,000</b>	<b>350,000</b>		



**Sewer Department****S5****Morganville Force Main Reroute****13.12****DESCRIPTION**

Reroute the flows from the Morgan Street Sewer pump station from pumping to the Jones Lake Pump Station to pump to the new King County western storage facility. The new force main will be about 3500 feet from Morgan Street west along Roberts Drive and northwest along Lake Sawyer Road East.

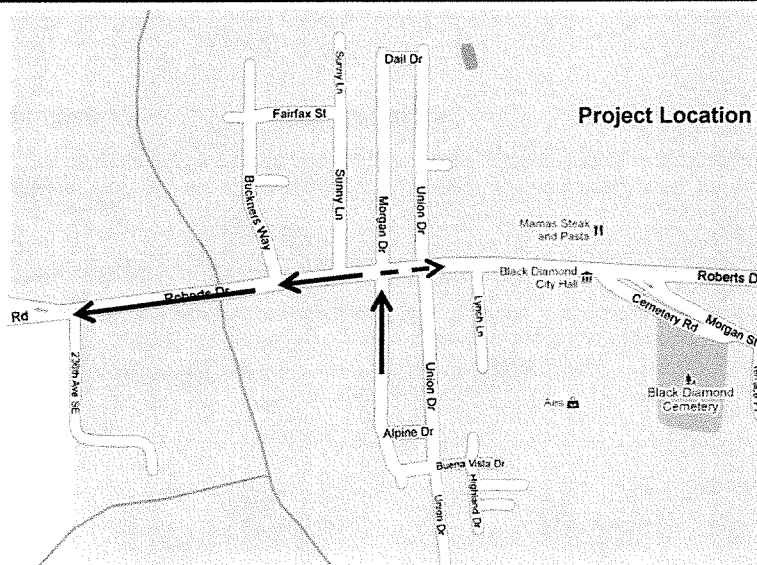
**BACKGROUND**

This project was programmed to provide capacity for infill in the old part of Black Diamond and save energy from pumping sewage twice. The need has diminished because of King County approval of a regional discharge location in the western part of Black Diamond, additional capacity from obstruction removal on our main trunk line and with the verification excellent pipe condition and capacity of our main trunk line. The priority of this project will also be affected, if Infiltration and Inflow can be reduced further.

**COMMENTS**

A Public Works Trust Fund Loan of 20 years generates a debt payment of \$24,382.74 per year at 1%. This project is shifted to later years because of the lower priority as described above.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Preliminary Engineering	20,000					20,000	
Design Engineering	40,000						40,000
Construction Costs	380,000						380,000
Management / Administration	20,000						20,000
<b>TOTAL COSTS</b>	<b>460,000</b>					<b>20,000</b>	<b>440,000</b>
<b>REQUESTED FUNDING</b>							
Sewer Reserve	20,000					20,000	
PWTF Loan	440,000						440,000
<b>TOTAL SOURCES</b>	<b>460,000</b>					<b>20,000</b>	<b>440,000</b>
<b>PWTF Loan Repay</b>							
Begins in 2023							



## Sewer Department

S6

### Equipment Replacement Program

**DESCRIPTION**

Replace and purchase new equipment as needed for the City Public Works needs, with regular, fairly distributed, expenses to the various departments.

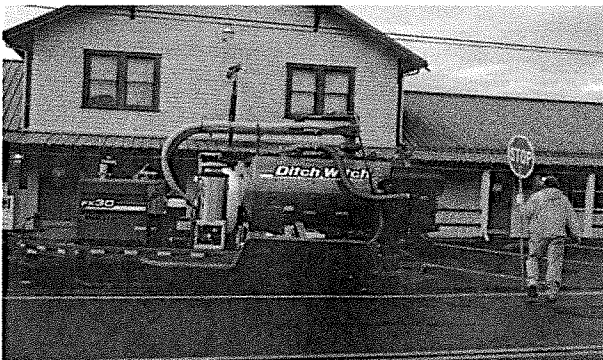
**BACKGROUND**

The current funding level which has been in place for about 10 years appears to be enough to meet the current needs of the department. No adjustment are currently being recommended.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Contribution to Equipment Fund	282,000	47,000	47,000	47,000	47,000	47,000	47,000
<b>TOTAL COSTS</b>	<b>282,000</b>	<b>47,000</b>	<b>47,000</b>	<b>47,000</b>	<b>47,000</b>	<b>47,000</b>	<b>47,000</b>
<b>REQUESTED FUNDING</b>							
Water Department	60,000	10,000	10,000	10,000	10,000	10,000	10,000
Sewer Department	60,000	10,000	10,000	10,000	10,000	10,000	10,000
Stormwater Department	60,000	10,000	10,000	10,000	10,000	10,000	10,000
Street Department	60,000	10,000	10,000	10,000	10,000	10,000	10,000
Parks/ Cemetery	42,000	7,000	7,000	7,000	7,000	7,000	7,000
<b>TOTAL SOURCES</b>	<b>282,000</b>	<b>47,000</b>	<b>143,018</b>	<b>143,019</b>	<b>47,000</b>	<b>47,000</b>	<b>47,000</b>

Public Works Equipment Replacement Plan	2017	2018	2019	2020	2021	2022
Replace John Deere Riding Mower	15,000					
Back Hoe Tune Up	10,000					
Replace Ferris zero turn Mower		12,000				
1/2 Ton Utility Truck 4X4		40,000				
Sewer Jet Rodder major maintenance		20,000				
1998 White Ford PU Truck Replace					50,000	
Cemetery Casket Lowering Device & Carport		5,000				
Mini Track Hoe			130,000			
2005 White Chevy 4X4 Replace				40,000		
<b>Totals</b>	<b>\$ 25,000</b>	<b>\$ 77,000</b>	<b>\$ 130,000</b>	<b>\$ 40,000</b>	<b>\$ 50,000</b>	<b>\$ -</b>



## Stormwater Department

### CAPITAL PROJECT FUNDING SUMMARY

Summary by Project							
		Capital Plan 2017 - 2022					
Project Title	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
D1 Lawson Hills Storm Pond Sediment Removal	10,000	10,000					
D2 Replace Covington Creek Culverts	637,000	22,000	615,000				
D3 N. Commercial St 169 Stormwater Improvements	910,000	25,000	885,000				
D4 Ginder Creek Headwall	90,000			40,000	50,000		
D5 Lawson Hills Stormwater Pond Improvement	140,000						140,000
D6 Replace Diamond Glen Storm Pond	80,000						80,000
<b>TOTAL ESTIMATED EXPENDITURES</b>	<b>1,867,000</b>	<b>57,000</b>	<b>1,500,000</b>	<b>40,000</b>	<b>50,000</b>		<b>220,000</b>
Funding Sources							
<b>Grants</b>							
D2 Replace Covington Creek Culverts	637,000	22,000	615,000				
D3 N. Commercial St 169 Stormwater Improvements	850,000		850,000				
D4 Ginder Creek Headwall	45,000			20,000	25,000		
<b>Total Grants</b>	<b>1,532,000</b>	<b>22,000</b>	<b>1,465,000</b>	<b>20,000</b>	<b>25,000</b>		
<b>Stormwater Funding</b>							
D1 Lawson Hills Storm Pond Sediment Removal	10,000	10,000					
D5 Lawson Hills Stormwater Pond Improvement	140,000						140,000
<b>Total Stormwater Funding</b>	<b>150,000</b>	<b>10,000</b>					<b>140,000</b>
<b>Sale of Land (Stormwater Funds)</b>							
D6 Replace Diamond Glen Storm Pond	80,000						80,000
<b>Total Sale of Land</b>	<b>80,000</b>						<b>80,000</b>
<b>Real Estate Excise Tax 2</b>							
D3 N. Commercial St 169 Stormwater Improvements	60,000	25,000	35,000				
<b>Total REET 2 Funding</b>	<b>60,000</b>	<b>25,000</b>	<b>35,000</b>				
<b>Grant Matching</b>							
D4 Ginder Creek Headwall	45,000			20,000	25,000		
<b>Total Grant Matching</b>	<b>45,000</b>			<b>20,000</b>	<b>25,000</b>		
<b>TOTAL ESTIMATED FUNDING SOURCES</b>	<b>1,867,000</b>	<b>57,000</b>	<b>1,500,000</b>	<b>40,000</b>	<b>50,000</b>		<b>220,000</b>

## Stormwater Department

D1

### Lawson Hills Estates Storm Pond

15.01

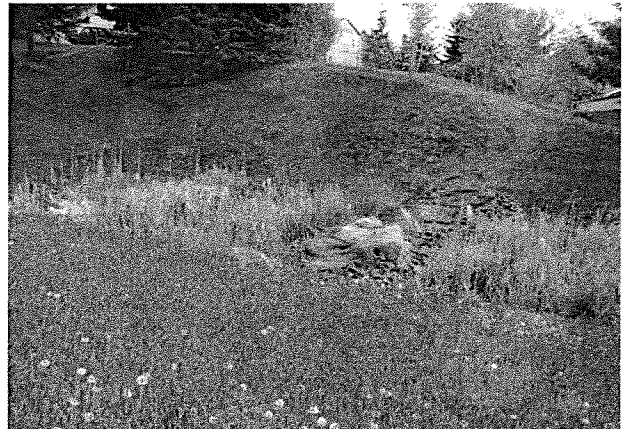
#### DESCRIPTION

Reduce the scope of this project from constructing a maintenance access road to bringing in special equipment to remove the sediment and re-establish the treatment flow regime.

#### BACKGROUND

In preliminary design and project planning, the City considered the cost and benefit of constructing a maintenance access as compared to bringing in an excavator to remove the sediment from the bottom of the pond and re-establishing the effectiveness of the storm pond. Given that the frequency of removing sediment is expected to be on the order of 20 years, this simplified approach is more cost effective.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Construction	10,000	10,000					
<b>TOTAL COSTS</b>	<b>10,000</b>	<b>10,000</b>					
<b>REQUESTED FUNDING</b>							
Stormwater Funds	10,000	10,000					
<b>TOTAL SOURCES</b>	<b>10,000</b>	<b>10,000</b>					



## Stormwater Department

D2

### Replace Covington Creek Culverts

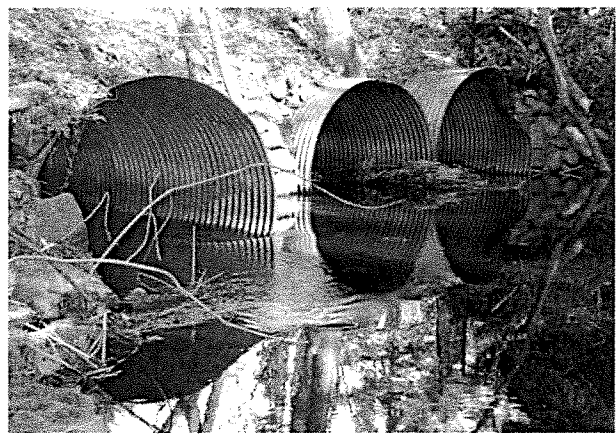
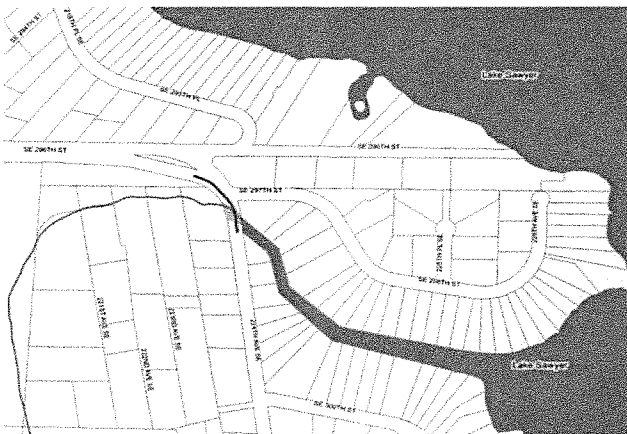
13.14

**DESCRIPTION** Replace the three 5 foot diameter culverts with an open bottom concrete box culvert.

**BACKGROUND** The summer 2012 inspections found the culverts are nearing the end of their useful life and have serious corrosion and pitting in the lower third of the culverts and a few areas where corrosion has opened holes in the culvert. The three culverts divide the small summer flow leaving only a small amount of water for fish passage.

**COMMENTS** Grant Funding has been obtained from the King County Flood Control District for the design phase. The City will continue to seek grant funding for the construction and completion of the project.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Design Engineering	12,000	12,000					
Construction	545,000		545,000				
Management / Administration	80,000	10,000	70,000				
<b>TOTAL COSTS</b>	<b>637,000</b>	<b>22,000</b>	<b>615,000</b>				
<b>REQUESTED FUNDING</b>							
Grant Funding	637,000	22,000	615,000				
<b>TOTAL SOURCES</b>	<b>637,000</b>	<b>22,000</b>	<b>615,000</b>				



## Stormwater Department

D3

### North Commercial and SR 169 Stormwater Treatment Pond

13.15

#### DESCRIPTION

Collect storm water runoff from the main commercial area in north Black Diamond and from State Route 169 and route to city property north of the library. Construct a wet pond or vault for pre-treatment followed by constructed wetlands to dispersion trenches for discharge to upland above Ginder Creek.

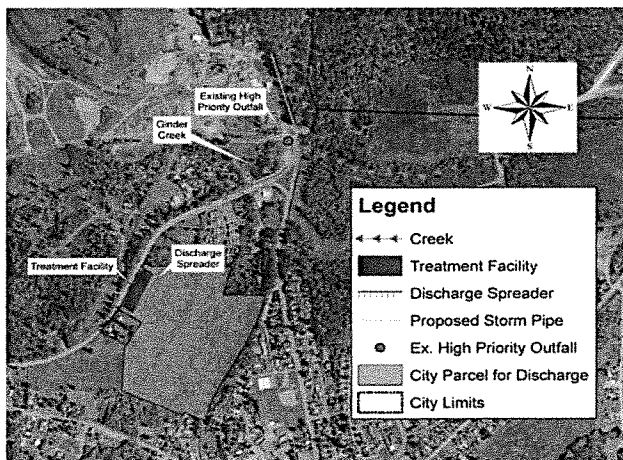
#### BACKGROUND

Whereas there is a total maximum daily load (TMDL) on Lake Sawyer for phosphorous, the city should look for opportunities to reduce phosphorous inputs from existing untreated stormwater discharges. Stormwater outfall discharges from the commercial area and the state route appear to have the highest pollutant loadings as compared to other City stormwater outfalls.

#### COMMENTS

The City obtained a grant from the Department of Ecology for the design of this project. With a completed design at 90%, the City will have a well defined project and will use the detailed information to improve grant applications.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Final Engineering Prepare Bid Docs	20,000	20,000					
Construction	850,000		850,000				
Management / Administration	40,000	5,000	35,000				
<b>TOTAL COSTS</b>	<b>910,000</b>	<b>25,000</b>	<b>885,000</b>				
<b>REQUESTED FUNDING</b>							
Opportunity funds BD set aside	60,000	25,000	35,000				
Grant Funding	850,000		850,000				
<b>TOTAL SOURCES</b>	<b>910,000</b>	<b>25,000</b>	<b>885,000</b>				



## Stormwater Department

D4

### Ginder Creek Headwall

14.16

**DESCRIPTION**

Reconstruct an 80 foot section of the Ginder Creek Headwall along the north side of Roberts Drive

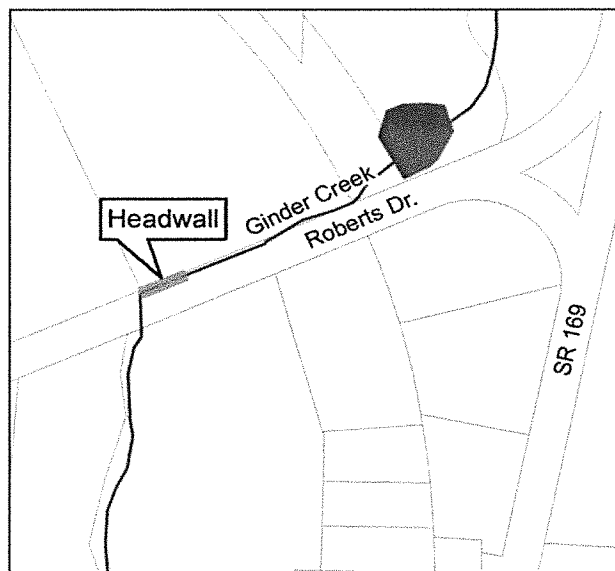
**BACKGROUND**

The base of the existing concrete headwall was not constructed deep enough so that high flows in Ginder Creek have undermined the headwall destabilizing the wall. The headwall has been slowly tilting into the Creek. Staff has braced the headwall as an interim step to hold the wall in position.

**COMMENTS**

This project is needed to protect the roadway and prevent the erosion that would occur if the headwall tipped over. A significant amount of the cost of this project will be related to environmental permitting. This project may get rolled into a larger street reconstruction project if street grants are obtained for this road segment.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Preliminary Engineer/Permitting	25,000			25,000			
Design Engineering	10,000			10,000			
Construction	45,000				45,000		
Management / Administration	10,000			5,000	5,000		
<b>TOTAL COSTS</b>	<b>90,000</b>			<b>40,000</b>	<b>50,000</b>		
<b>REQUESTED FUNDING</b>							
Grant	45,000			20,000	25,000		
Grant Matching	45,000			20,000	25,000		
<b>TOTAL SOURCES</b>	<b>90,000</b>			<b>40,000</b>	<b>50,000</b>		



## Stormwater Department

D5

### Lawson Hills Stormwater Ponds

**DESCRIPTION**

Reconstruct the two stormwater ponds in Lawson Hills estates to eliminate the conflicts of stormwater treatment and detention from the recreational use.

**BACKGROUND**

The original intent of these storm ponds was to provide joint use for homeowner association provided recreation facilities and City provided stormwater detention and treatment facilities. The configuration hasn't worked very well for stormwater or for recreation. The City would like to work with the Homeowners association to put the stormwater facilities underground so that the surface of the lots will be well drained and available for year around recreation and open space for the neighborhood.

**COMMENTS**

This project would make the stormwater system and the surface park easier to maintain for both agencies.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
In House Design/ Mgmt	15,000						15,000
Construction	120,000						120,000
Management / Administration	5,000						5,000
<b>TOTAL COSTS</b>	<b>140,000</b>						<b>140,000</b>
<b>REQUESTED FUNDING</b>							
Stormwater Funds	140,000						140,000
<b>TOTAL SOURCES</b>	<b>140,000</b>						<b>140,000</b>



**Stormwater Department****D6****Replace Diamond Glen Storm Pond****DESCRIPTION**

If the new regional stormwater facility is constructed for the North Villages Commercial area, divert stormwater from the Diamond Glen local stormwater pond to the regional stormwater facility.

**BACKGROUND**

Many small stormwater facilities increase the City maintenance costs. Providing a commensurate amount of storage and treatment in the larger regional stormwater pond to the west would allow the land to be reclaimed for a residential lot, improve the neighborhood and lower maintenance costs.

**COMMENTS**

Legal and planning issues must be addressed before the City property can be sold.

<b>CAPITAL PROJECT COSTS</b>	<b>Total \$ 2017 - 2022</b>	<b>2017</b>	<b>2018</b>	<b>2019</b>	<b>2020</b>	<b>2021</b>	<b>2022</b>
Pay for offsite pond capacity	15,000						15,000
Design and Bid	10,000						10,000
Construction	20,000						20,000
Management / Administration	5,000						5,000
Return funds to Operations	30,000						30,000
<b>TOTAL COSTS</b>	<b>80,000</b>						<b>80,000</b>
<b>REQUESTED FUNDING</b>							
Sale of Lot	80,000						80,000
<b>TOTAL SOURCES</b>	<b>80,000</b>						<b>80,000</b>

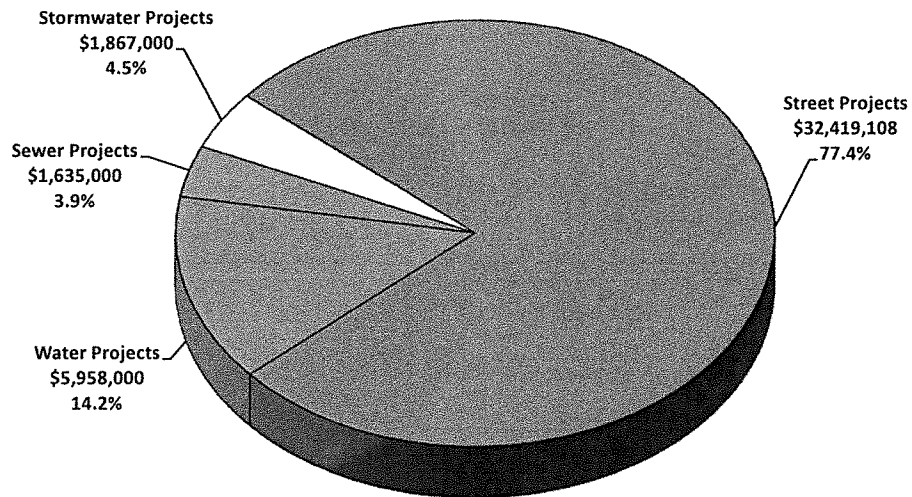


REET 2 ANALYSIS SUMMARY (Fund 320)							
Capital Improvement Plan 2017 - 2022							
REET 2 - REVENUE		Capital Improvement Plan 2017 - 2022					
	Total \$ Project	2017	2018	2019	2020	2021	2022
	2017 - 2022						
Beg Fund Balance 321	180,741	131,000	48,034	34,334	51,709	142,584	331,147
REET Revenue (annual)							
1/4 of 1% REET - Existing Property	631,138	71,775	87,300	103,125	115,500	123,438	130,000
1/4 of 1% REET - Other new homes	570,000	41,250	67,500	93,750	144,375	148,125	75,000
Subtotal REET 2 Revenue	1,201,138	113,025	154,800	196,875	259,875	271,563	205,000
TOTAL Avail. Balance for Public Works Projects	1,381,879	244,025	202,834	231,209	311,584	414,147	536,147
REET 2 - PROJECT EXPENDITURES		Capital Improvement Plan 2017 - 2022					
	Total \$ Project	2017	2018	2019	2020	2021	2022
Street Projects							
T1 General Street Improvement	180,000	30,000	30,000	30,000	30,000	30,000	30,000
T2 Roberts Drive Road Improvements	25,991	25,991					
T5 224th Guardrail at Covington Creek	25,000		25,000				
T6 224th Ave SE Asphalt Overlay	45,000	45,000					
T8 Roberts Drive Rehabilitation Phase 2	25,500		25,500				
T9 232nd Ave Chip Seal	10,000	10,000					
T10 Downtown Public Parking	37,000			25,000	12,000		
T11 216th Ave SE Overlay	27,000			27,000			
T13 Lawson Street Phase 1	16,500			16,500			
T14 Grant Matching	240,000	40,000	40,000	40,000	40,000	40,000	40,000
T16 Pedestrian and Bicycle Study	3,000					3,000	
Water							
W5 Asbestos Water Main Replacement Prgm	59,000	5,000	3,000	9,000	42,000		
Sewer							
S1 Upgrade Utility Staff Facilities	5,000	5,000					
S4 Material Handling Facility - Street	12,000			2,000	10,000		
S6 Equipment Replacement - Street	60,000	10,000	10,000	10,000	10,000	10,000	10,000
Stormwater							
D3 N. Commercial St 169 Stormwater Improvements	60,000	25,000	35,000				
D4 Fire Flow Loop - North Commercial Area	45,000			20,000	25,000		
Total REET 2 Projects	875,991	195,991	168,500	179,500	169,000	83,000	80,000
REET 2 left for next year (Ending Balance)	505,888	48,034	34,334	51,709	142,584	331,147	456,147
REET based on Houses sold		2017	2018	2019	2020	2021	2022
Existing Property Sales (in 000's)		87 @\$330	97 @\$360	110 @\$375	120 @\$385	125 @\$395	130 @\$400
Other new home sales (in 000's)		50 @\$330	75 @\$360	100 @\$375	150 @\$385	150 @\$395	75 @\$400

### Public Works Fund Summary Capital Improvement Plan 2017 - 2022

Funds	Total \$ Project 2017 - 2022	2017	2018	2019	2020	2021	2022
Street Projects	32,419,108	7,528,108	3,851,000	3,810,000	6,660,000	9,100,000	1,470,000
Water Projects	5,958,000	530,000	2,514,000	371,000	623,000	870,000	1,050,000
Sewer Projects	1,635,000	160,000	367,000	82,000	422,000	92,000	512,000
Stormwater Projects	1,867,000	57,000	1,500,000	40,000	50,000	-	220,000
<b>TOTAL Projected Expenditures</b>	<b>\$ 41,879,108</b>	<b>\$8,275,108</b>	<b>\$8,232,000</b>	<b>\$4,303,000</b>	<b>\$7,755,000</b>	<b>\$10,062,000</b>	<b>\$3,252,000</b>

Public Works CIP by Fund  
Total: \$41,879,108

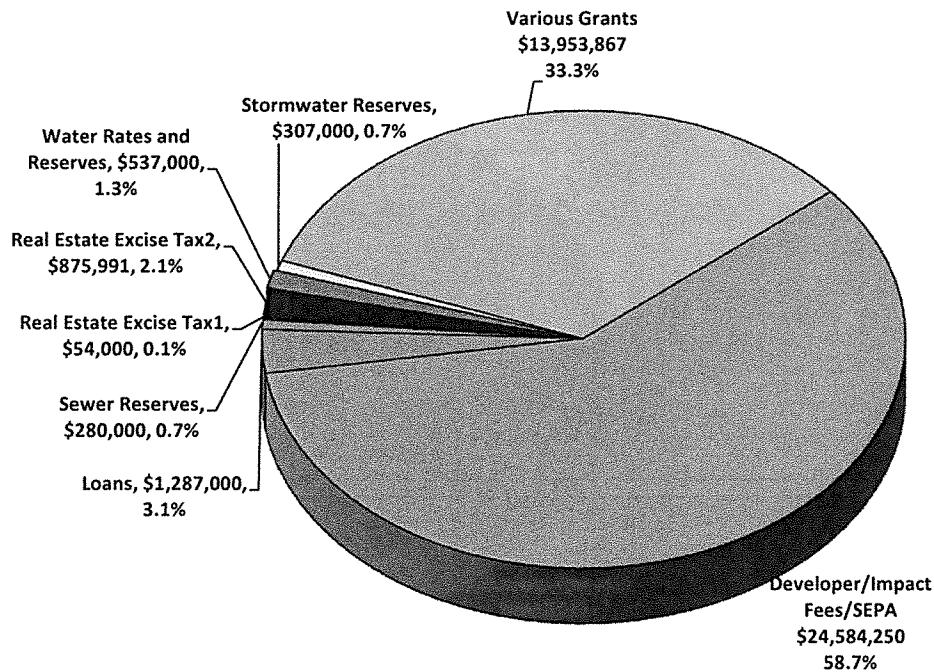


# CIP Public Works Revenue Summary

## Capital Improvement Plan 2017 - 2022

<b>REQUESTED FUNDING</b>	<b>Total \$ Project 2017 - 2022</b>	<b>2017</b>	<b>2018</b>	<b>2019</b>	<b>2020</b>	<b>2021</b>	<b>2022</b>
Various Grants	13,953,867	1,446,867	1,664,500	1,701,500	4,064,000	4,027,000	1,050,000
Developer/Impact Fees/SEPA	24,584,250	6,417,250	6,022,000	2,080,000	3,335,000	5,330,000	1,400,000
Loans	1,287,000	35,000	315,000	272,000	15,000	210,000	440,000
Sewer Reserves	280,000	73,000	35,000	37,000	45,000	55,000	35,000
Real Estate Excise Tax 1	54,000	7,000	7,000	9,000	17,000	7,000	7,000
Real Estate Excise Tax 2	875,991	195,991	168,500	179,500	169,000	83,000	80,000
Water Rates and Reserves	537,000	75,000	10,000	12,000	90,000	340,000	10,000
Stormwater Reserves	307,000	25,000	10,000	12,000	20,000	10,000	230,000
<b>TOTAL SOURCES</b>	<b>\$41,879,108</b>	<b>\$8,275,108</b>	<b>\$8,232,000</b>	<b>\$4,303,000</b>	<b>\$7,755,000</b>	<b>\$10,062,000</b>	<b>\$3,252,000</b>

**Public Works CIP by Type of Funding Total: \$41,879,108**



## Parks Department CAPITAL PROJECT SUMMARY

Summary by Project							
Capital Plan 2017 - 2022							
Project Title	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
P1 Ginder Creek Trail and Site	445,000		62,000		45,000	338,000	
P2 Grant Matching Funds	25,000	2,500	2,500	5,000	5,000	5,000	5,000
P3 Park Plan Update	80,000		40,000	40,000			
P4 Pond to Parks Improvement	11,000				11,000		
P5 Boat Launch Park Shoreline Stabilization	300,000				30,000		270,000
P6 New Cemetery Niche Wall	20,000		20,000				
P7 Rehabilitate E. Ginder Creek Property	55,000	35,000					20,000
<b>TOTAL ESTIMATED COST</b>	<b>936,000</b>	<b>37,500</b>	<b>124,500</b>	<b>45,000</b>	<b>91,000</b>	<b>343,000</b>	<b>295,000</b>
<b>Funding Sources</b>							
<b>King County Parks Property Tax Levy Funds</b>							
P1 Ginder Creek Trail and Site	201,000		32,000			169,000	
<b>Total King County Parks Levy Fund</b>	<b>201,000</b>		<b>32,000</b>			<b>169,000</b>	
<b>King County Conservation District Grant</b>							
P1 Ginder Creek Trail and Site	214,000				45,000	169,000	
P3 Park Plan Update	40,000		20,000	20,000			
P4 Pond to Parks Improvement	11,000				11,000		
<b>Total KCD Grant</b>	<b>265,000</b>		<b>20,000</b>	<b>20,000</b>	<b>56,000</b>	<b>169,000</b>	
<b>WA Recreation and Conservation Grants</b>							
P5 Boat Launch Park Shoreline Stabilization	150,000						150,000
<b>Total RCO Grants</b>	<b>150,000</b>						<b>150,000</b>
<b>Conservation Futures</b>							
P1 Ginder Creek Trail and Site	30,000		30,000				
<b>Total Conservation Futures</b>	<b>30,000</b>		<b>30,000</b>				
<b>Real Estate Excise Tax 1</b>							
P2 Grant Matching Funds	25,000	2,500	2,500	5,000	5,000	5,000	5,000
P3 Park Plan Update	40,000		20,000	20,000			
P5 Boat Launch Park Shoreline Stabilization	150,000				30,000		120,000
P6 New Cemetery Niche Wall	20,000		20,000				
P7 Rehabilitate E. Ginder Creek Property	40,000	20,000					20,000
<b>Total REET 1 Funding</b>	<b>275,000</b>	<b>22,500</b>	<b>42,500</b>	<b>25,000</b>	<b>35,000</b>	<b>5,000</b>	<b>145,000</b>
<b>Sewer Funds</b>							
P7 Rehabilitate E. Ginder Creek Property	10,000	10,000					
<b>Total Sewer Fund Funding</b>	<b>10,000</b>	<b>10,000</b>					
<b>Street Funds</b>							
P7 Rehabilitate E. Ginder Creek Property	5,000	5,000					
<b>Total Street Fund Funding</b>	<b>5,000</b>	<b>5,000</b>					
<b>TOTAL ESTIMATED FUNDING SOURCES</b>	<b>936,000</b>	<b>37,500</b>	<b>124,500</b>	<b>45,000</b>	<b>91,000</b>	<b>343,000</b>	<b>295,000</b>

## Parks Department

P1

## Ginder Creek Trail and Site Restoration

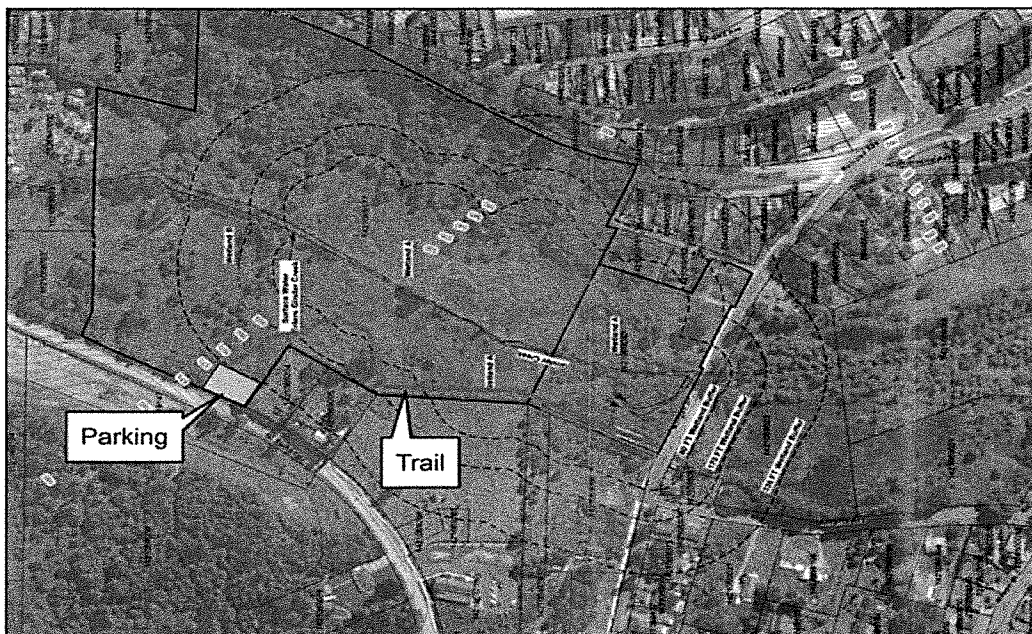
**DESCRIPTION**

Design and Construct a 1540 foot long 10 feet wide multi purpose trail and a small parking lot on Roberts Drive.

**BACKGROUND**

The City acquired the Ginder Creek parcel as a component to the Open Space Agreement signed in 2005. Initial planning efforts, work with the City Council, as well as public input has steered the Parks Department towards trail development along the Ginder Creek corridor. This area has historically been used for agricultural activities, but has since remained fallow, with the proliferation of invasive Reed Canary Grass, Evergreen Blackberry, and Scotch Broom. This trail will provide a north/south link from Roberts Drive to Morgan Street and provide the public the enjoyment of the natural area along Ginder Creek.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Property Acquisition	60,000		60,000				
Design and Permitting	40,000				40,000		
Construction Costs	310,000					310,000	
Project Mgmt & Construction Inspect.	30,000		1,000		4,000	25,000	
Project Administration	5,000		1,000		1,000	3,000	
<b>TOTAL COSTS</b>	<b>445,000</b>		<b>62,000</b>		<b>45,000</b>	<b>338,000</b>	
<b>REQUESTED FUNDING</b>							
King County Tax Levy Funds	201,000		32,000			169,000	
Rec Conserv. Office Grant (RCO)	214,000				45,000	169,000	
Conservation Futures	30,000		30,000				
<b>TOTAL SOURCES</b>	<b>445,000</b>		<b>62,000</b>		<b>45,000</b>	<b>338,000</b>	



**Parks Department**

**P2**

**Grant Matching Funds**

**DESCRIPTION**

Funds earmarked for matching grant resources to be utilized in the design and construction of Parks and Natural Resource projects.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
<b>COMMENTS</b>							
Transfer Reserves	25,000	2,500	2,500	5,000	5,000	5,000	5,000
<b>TOTAL COSTS</b>	<b>25,000</b>	<b>2,500</b>	<b>2,500</b>	<b>5,000</b>	<b>5,000</b>	<b>5,000</b>	<b>5,000</b>
<b>REQUESTED FUNDING</b>							
Real Estate Excise Tax 1	25,000	2,500	2,500	5,000	5,000	5,000	5,000
<b>TOTAL SOURCES</b>	<b>25,000</b>	<b>2,500</b>	<b>2,500</b>	<b>5,000</b>	<b>5,000</b>	<b>5,000</b>	<b>5,000</b>

## Parks Department

P3

### Park Plan Update

**DESCRIPTION**

The City's Park Plan has expired. An update of the City's Comprehensive Parks, Recreation and Open Space Plan is needed for state grant eligibility towards trails, open space and park's infrastructure.

**BACKGROUND**

The last Parks Plan was developed by staff in late 2008. The Recreation and Conservation Office approved the plan and the City used the Parks Plan to support several grant applications and improvements throughout the City. Once the staffing level improves this Parks Planning update can be kicked off. It is expected that the City will need consultant assistance for about 50% of the park planning effort.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Consulting Services	40,000		20,000	20,000			
City In-house Services	40,000		20,000	20,000			
<b>TOTAL COSTS</b>	<b>80,000</b>		<b>40,000</b>	<b>40,000</b>			
<b>REQUESTED FUNDING</b>							
Real Estate Excise Tax 1	40,000		20,000	20,000			
Recreation Conser. Office Grant (RCO)	40,000		20,000	20,000			
<b>TOTAL SOURCES</b>	<b>80,000</b>		<b>40,000</b>	<b>40,000</b>			

## Parks Department

P4

## Pond to Park Improvement - Eagle Creek

**DESCRIPTION**

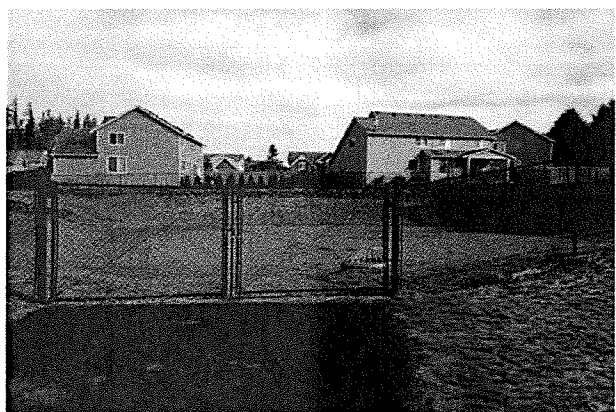
Convert the stormwater retention pond at the Eagle Creek Sub-Division to a stormwater / Park multi-purpose facility. Add a layer of permeable top soil that will not exceed the design infiltration rate of the storm water retention pond and seed to grass. The area and slopes will be seeded to a nice lawn and the fence removed on the south end of the project.

**BACKGROUND**

After the construction of this facility, engineering staff observed that surface water infiltration rates far exceeded the delivery volumes associated with surface run-off generated within the sub-division. Because of this, the pond is dry throughout the year and can provide an excellent grass lawn open space feature to users of the City parks facility. The conversion of a gravel storm infiltration pond to a stormwater/park multi-purpose facility will improve storm water treatment, aesthetics, and provide additional park area for citizens.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
In house Planning & Design	3,000				3,000		
Construction Costs	8,000				8,000		
<b>TOTAL COSTS</b>	<b>11,000</b>				<b>11,000</b>		
<b>REQUESTED FUNDING</b>							
Stormwater Grant or Other	11,000				11,000		
<b>TOTAL SOURCES</b>	<b>11,000</b>				<b>11,000</b>		

Entrance to the Eagle Creek Pond



## Parks Department

P5

## Boat Launch Park Shoreline Stabilization

**DESCRIPTION**

Using boulder and plantings reinforce the shoreline to stop the bank erosion and protect the old growth trees along the shoreline.

**BACKGROUND**

The City many years ago stabilized the bank with wood retaining walls, rebar and logs. The logs bounced along the shore and only partially protected the bank. The logs were a maintenance problem and periodically broke loose causing a hazard on the lake. The wood retaining wall has deteriorated significantly. The rebar has been an ongoing maintenance problem and hazard.

**COMMENTS**

Once the Park Plan has been accepted by the Recreation Conservation Office this project will be eligible for state grant funding.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Engineering and Permitting	30,000				30,000		
Construction	260,000						260,000
Project Administration/Mgmt	10,000						10,000
<b>TOTAL COSTS</b>	<b>300,000</b>				<b>30,000</b>		<b>270,000</b>
<b>REQUESTED FUNDING</b>							
Real Estate Excise Tax 1	150,000				30,000		120,000
RCO Grant	150,000						150,000
<b>TOTAL SOURCES</b>	<b>300,000</b>				<b>30,000</b>		<b>270,000</b>

Shoreline Erosion



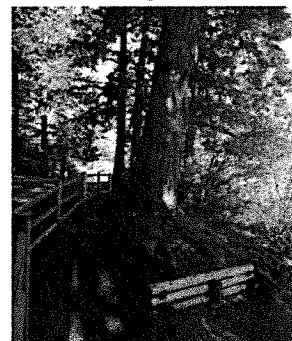
Exposed Roots



Rotten Wall



Leaning Tree



## Cemetery

P6

### New Niche Wall

**DESCRIPTION**

Install a niche wall for cremation remains in the cemetery 5 ft. high by about 24 feet long.

**BACKGROUND**

The existing niche wall is nearly all sold out. Many people do not want to purchase an entire plot within the cemetery and the niche would serve their needs. The niche wall preserves space within the cemetery. The price of the niches could be reassessed after the final expense of the project is known so that the City could recover their costs. The price of a niche right now is \$350 and the price of a plot is \$1500. The new wall would provide about 90 to 100 new niches.

**COMMENTS**

The cemetery board reviewed and approved this project and recommended that the Council add this project to the City's Capital Improvement Plan

	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
<b>CAPITAL PROJECT COSTS</b>							
Niche Wall Purchase	10,000		10,000				
Niche Wall Installation	10,000		10,000				
<b>TOTAL COSTS</b>	<b>20,000</b>		<b>20,000</b>				
<b>REQUESTED FUNDING</b>							
Real Estate Excise Tax 1	20,000		20,000				
<b>TOTAL SOURCES</b>	<b>20,000</b>		<b>20,000</b>				



## Parks Department

P7

## Rehabilitate East Ginder Creek Property

**DESCRIPTION**

Remove cottonwood, maple, alder, blackberry, Nott weed, English Ivy along the east boundary of the property and revegetate with grass and Flowering cherry trees, maple, and dogwood. The initial effort will be to fall the trees, and deck the debris in a long pile to compost onsite and to spray invasive weeds and then seed the surrounding area back to grass. The trees should compost nicely within about 5 years. Once the limbs and tree trunks have decomposed, the organic matter will be spread and the area reseeded to lawn and trees planted.

**BACKGROUND**

A major portion on the east side of the property has been overtaken by invasive weeds and invasive hazardous trees. The cottonwood trees have grown to a hazardous size and present a threat and hazard to the homes and backyards to the east as citizens walking on City open space.

**COMMENTS**

This project is to fulfill the City's role in good stewardship of the public land.

CAPITAL PROJECT COSTS	Total \$ 2017 - 2022	2017	2018	2019	2020	2021	2022
Tree Felling and Decking	30,000	30,000					
Initial Weed Control	5,000	5,000					
Grading & Tree Planting	20,000						20,000
<b>TOTAL COSTS</b>	<b>55,000</b>	<b>35,000</b>					<b>20,000</b>
<b>REQUESTED FUNDING</b>							
Sewer Funding	10,000	10,000					
Street Funds	5,000	5,000					
Real Estate Excise Tax 1	40,000	20,000					20,000
<b>TOTAL SOURCES</b>	<b>55,000</b>	<b>35,000</b>					<b>20,000</b>



## Fire Department CAPITAL PROJECT SUMMARY

Expenditures							
Capital Plan 2017 - 2022							
Project Title	Total \$ 2017-2022	2017	2018	2019	2020	2021	2022
F1 Replace Primary Fire Engine 98	365,000		365,000				
F2 Replace Reserve Engine	600,000				600,000		
F3 Replace Aid Car	225,000				225,000		
F4 New Fire Station & Equipment	3,215,000					125,000	3,090,000
<b>TOTAL ESTIMATED COSTS</b>	<b>4,405,000</b>		<b>365,000</b>		<b>825,000</b>	<b>125,000</b>	<b>3,090,000</b>
Funding Sources							
Loans to Finance Projects							
F1 Replace Primary Fire Engine 98	265,000		265,000				
<b>Total Loans</b>	<b>265,000</b>		<b>265,000</b>				
Funding From Growth or Bond Sales							
F2 Replace Reserve Engine	600,000				600,000		
F3 Replace Aid Car	225,000				225,000		
F4 New Fire Station and Equipment	3,215,000					125,000	3,090,000
<b>Total from Growth or Bond Sales</b>	<b>4,040,000</b>				<b>825,000</b>	<b>125,000</b>	<b>3,090,000</b>
Funding From Surplus Sales							
F1 Replace Primary Fire Engine 98	100,000		100,000				
<b>Total Surplus Sales</b>	<b>100,000</b>		<b>100,000</b>				
<b>TOTAL ESTIMATED FUNDING SOURCES</b>	<b>4,405,000</b>	<b>-</b>	<b>365,000</b>	<b>-</b>	<b>825,000</b>	<b>125,000</b>	<b>3,090,000</b>
State Loan Repayment - Debt Service							
REET 1							
F1 Replace Primary Fire Engine 98 (5%)	137,276			34,319	34,319	34,319	34,319
<b>Total R1 Debt Service Payments</b>	<b>137,276</b>			<b>34,319</b>	<b>34,319</b>	<b>34,319</b>	<b>34,319</b>