

# INFORMATIONAL MEMORANDUM

TO: Transportation and Infrastructure Committee

FROM: Henry Hash, Public Works Director

BY: Gail Labanara, Public Works Analyst

CC: Mayor Ekberg

DATE: September 21, 2018

SUBJECT: Proposed 2019-2020 Biennial Budget

Water, Sewer & Surface Water Enterprise Funds

#### **ISSUE**

Transportation and Infrastructure Committee to review Proposed 2019-2020 Biennial Budget, Rate Model, and Capital Improvement Programs for Water, Sewer and Surface Water Enterprise Funds.

#### **BACKGROUND**

The City is committed to developing and passing a fiscally-sound, balanced budget. Two challenges the City is encountering is 1) sales tax revenue growth of 3% projected for 2018 has not been realized to date, and 2) sales tax mitigation payments will end in late 2019. As a result, the City is seeking a balanced budget with expenditure reductions and possible new revenue opportunities.

## **DISCUSSION & FISCAL IMPACT**

#### Water Fund

- · Rate increases of 5% across the board
- Remains at 7.5 Employees
- CIP includes 58th Ave S, Macadam Rd S, and the Water Comprehensive Plan
- Long range concern includes Water Reservoir
- Public Works Shops debt service is estimated at \$400k/year

#### Sewer Fund

- King County sewer treatment increase in 2019 only, no Tukwila rate increase
- Remains at 4.5 Employees
- CIP includes CBD Sewer Rehabilitation and Fort Dent Park Sewer Relocate
- Long range concerns include aging infrastructure and replacing sewer lift stations
- Public Works Shops debt service is estimated at \$240k/year

#### Surface Water Fund

- Rate increases of 5% in 2019 and 3% in 2020, alternate years
- Remains at 12.5 Employees
- CIP includes Riverton Creek Flap Gate 42<sup>nd</sup> Ave S, Chinook Wind, Tukwila 205 Levee, EMW Outfalls, and 53<sup>rd</sup> Ave S
- Long range concerns include NPDES requirements, aging infrastructure, and levee
- Public Works Shops debt service is estimated at \$560k/year

#### RECOMMENDATION

Transportation and Infrastructure Committee approval to forward the Water, Sewer, and Surface Water section of the 2019-2020 Biennial Budget to the Committee of the Whole.

# **ATTACHMENT D**

City of Tukwila

## WATER ENTERPRISE FUND

2019 - 2024 Analysis in 000's

| REVENUES                               | 2015<br>Actual | 2016<br>Actual    | 2017<br>Actual    | 2018<br>Budget    | 2018<br>Estimate  | 2019  | 2020    | 2021  | 2022  | 2023   | 2024   | Totals  |
|--|----------------|-------------------|-------------------|-------------------|-------------------|-------|---------|-------|-------|--------|--------|---------|
| Monthly Water Charges (1)              | Base           | +5%<br>Commercial | +5%<br>Commercial | +5%<br>Commercial | +5%<br>Commercial | +5%   | +5%     | +5%   | +5%   | +5%    | +5%    |         |
| Cascade Water Alliance (CWA)           | 2,480          | 2,525             | 2,905             | 2,710             | 3,100             | 3,193 | 3,256   | 3,354 | 3,421 | 3,524  | 3,594  | 20,342  |
| Regular City Water                     | 3,987          | 3,858             | 3,841             | 4,265             | 3,827             | 3,991 | 4,110   | 4,193 | 4,319 | 4,448  | 4,671  | 25,732  |
| Subtotal Water                         | 6,467          | 6,383             | 6,746             | 6,975             | 6,927             | 7,184 | 7,366   | 7,547 | 7,740 | 7,972  | 8,265  | 46,074  |
| Other Miscellaneous Revenue            | 42             | 48                | 96                | 43                | 105               | 53    | 58      | 60    | 65    | 70     | 72     | 378     |
| Interlocal Ags\PWTF\Grants             | 1,105          | 22                | 0                 | 0                 | 0                 | 0     | 0       | 0     | 0     | 3,000  | 3,000  | 6,000   |
| Water Connection Fees (2)              | 108            | 80                | 216               | 25                | 87                | 80    | 100     | 100   | 100   | 20     | 20     | 420     |
| Total Revenues                         | 7,722          | 6,533             | 7,058             | 7,043             | 7,119             | 7,317 | 7,524   | 7,707 | 7,905 | 11,062 | 11,357 | 52,872  |
| EXPENDITURES                           |                |                   |                   |                   |                   |       |         |       |       |        |        |         |
| CWA Purchased Water (3)                | 2,480          | 2,525             | 2,905             | 2,710             | 3,100             | 3,050 | 3,142   | 3,354 | 3,421 | 3,524  | 3,594  | 20,085  |
| Water Operations & Maintenance         | 2,026          | 2,004             | 2,172             | 2,102             | 2,038             | 2,275 | 2,325   | 2,339 | 2,409 | 2,505  | 2,581  | 14,434  |
| Debt Service (4)                       | 545            | 148               | 146               | 148               | 148               | 145   | 145     | 144   | 129   | 128    | 128    | 819     |
| Debt Service for PW Shops              |                |                   |                   | 81                | 340               | 159   | 181     | 400   | 400   | 400    | 400    | 1,940   |
| Interfund Utility Tax (5) 10%          | 648            | 640               | 677               | 702               | 703               | 724   | 742     | 761   | 781   | 804    | 834    | 4,645   |
| Engineering Labor (7)                  | 66             | 42                | 53                | 85                | 65                | 75    | 76      | 78    | 80    | 82     | 84     | 475     |
| Subtotal                               | 5,765          | 5,359             | 5,953             | 5,828             | 6,394             | 6,428 | 6,611   | 7,076 | 7,220 | 7,443  | 7,621  | 42,398  |
| Water Capital - CIP Program            | 1,318          | 598               | 2,041             | 1,055             | 1,869             | 1,056 | 2,205   | 443   | 916   | 3,785  | 4,350  | 12,755  |
| Total Expenditures                     | 7,083          | 5,957             | 7,994             | 6,883             | 8,263             | 7,484 | 8,816   | 7,519 | 8,136 | 11,228 | 11,971 | 55,153  |
| FUND BALANCE                           |                |                   |                   |                   |                   |       |         |       |       |        |        |         |
| Change in Fund Balance (a)             | 639            | 576               | (936)             | 160               | (1,144)           | (167) | (1,292) | 188   | (231) | (166)  | (614)  | (2,281) |
| Beginning Balance                      | 5,777          | 6,693             | 6,693             | 5,691             | 5,691             | 4,547 | 4,380   | 3,088 | 3,276 | 3,046  | 2,879  | 5,487   |
| Ending Balance                         | 6,416          | 7,269             | 5,757             | 5,851             | 4,547             | 4,380 | 3,088   | 3,276 | 3,046 | 2,879  | 2,266  | 3,206   |
| Fund Balance:                          |                |                   |                   |                   |                   |       |         |       |       |        |        |         |
| Reserved <sup>(b)</sup> 20% of revenue | 1.212          | 1,323             | 1,302             | 1,302             | 1,302             | 1,424 | 1.463   | 1,505 | 1.541 | 1,581  | 1,612  | 1,612   |
| Unreserved                             | 5,204          | 5,946             | 4,455             | 4,549             | 3,245             | 2,956 | 1,624   | 1,771 | 1,504 | 1,298  | 653    | 653     |

4,547

4,380

3,088

3,276

3,046

2,879

2,266

2,266

**Ending Balance** 

6,416

7,269

5,757

5,851

<sup>&</sup>lt;sup>(a)</sup> Revenues in excess of (less than) expenditures

<sup>(</sup>b) Annual reserve balance requirement equals 20% of the prior year operating revenues.

#### **ATTACHMENT D-1**

## NOTES TO WATER ENTERPRISE FUND

 Rates reflect increases of 5% for 2019 through 2024. These rate increases are essential to sustain our reserve balance and cover any possible increases from Cascade Water Alliance (CWA). We will continue to review the annual rate model to confirm that the proposed increases are necessary.

Future water purchased at additional costs will be passed on to ratepayers. We have identified Cascade Water Alliance's revenues and expenditures to better reflect the actual water charges and the respective increases. CWA has proposed rate increases of 3.01% in 2019 and 1.71% in 2020.

- 2) Connection fees are estimated for the Allentown/Foster Point and Duwamish projects.
- 3) Cascade Water Alliance is split out to identify the actual costs of purchased water. CWA has scheduled increases in their six-year planning model that will affect our water rates.
- 4) Debt schedule includes Public Works Trust Fund (PWTF) loans and Bonds.

| Water Debt Service includes:  | <b>Expires</b> | <u>2019</u>         | <u>2020</u>         |
|-------------------------------|----------------|---------------------|---------------------|
| 2003 PWTF Duwamish (20%)      | 7/1/21         | 14,671.06           | 14,598.79           |
| 2004 PWTF Allentown (26%)     | 7/1/24         | 83,044.26           | 82,641.13           |
| 2006 Bond Allentown (26%)     | 12/31/26       | 47,129.54           | 47,740.74           |
| 2018 Public Works Shops (17%) | 12/31/38       | 159,027.00          | 181,339.00          |
|                               | Total          | <u>\$303,871.86</u> | <b>\$326,319.66</b> |

- 5) An Interfund Utility Tax was approved in October 2009 for the water, sewer, and surface water utilities. Gross revenues are currently taxed 10% through December 31, 2021.
- 6) The Working Capital Reserve Fund's policy was updated in 2012 per Resolution No. 1774 to maintain an adequate fund balance in each of the enterprise funds. For the Enterprise Funds, the unrestricted fund balance shall equal or exceed 20% of the previous year's revenue, exclusive of significant non-operating, non-recurring revenues.
- 7) The Senior Water/Sewer Engineer's salary and benefits are split evenly between the water department and the sewer department.

#### **Water Enterprise Fund**

The City's Enterprise Funds account for utility operations that are self-supported through user charges. The utilities are financed and operated like a private business enterprise which requires periodic determination of revenues earned; expenses incurred, and net income for capital maintenance, public policy, management control and accountability. The Water Fund accounts for operations and capital improvements to provide water to a portion of City residents. King County Water District 125 and Highline Water District also supply water to City residents.

**DEPARTMENT: Public Works** 

FUND: Water FUND NUMBER: 401 RESPONSIBLE MANAGER: Henry Hash POSITION: Director

#### **Description**

The mission of the Water Utility is to operate and maintain a water distribution system that will provide residential, commercial, and industrial customers with high water quality, adequate capacity and pressure, at economical costs. The system distributes, on an annual basis, approximately 776 million gallons of water through 41 miles of water mains through approximately 2,202 meters. The Water Utility maintains relationships with adjoining jurisdictions, cities, water districts, sewer districts, and the Washington State Department of Health. Additional service is provided with reclaimed water along the Interurban Avenue South Corridor.

#### 2017-2018 Accomplishments

- Completed construction of Andover Park E Water Main Replacement.
- Continued development of the GIS as-builts of city water infrastructure.
- Completed construction of 53rd Ave S water improvements.
- Continued monitoring water use efficiency efforts and provided an annual report.
- Achieved 10 percent water savings to meet Water Efficiency Goals established by the Municipal Water Law.

#### 2019-2020 Outcome Goals

♦ Improve water use efficiency.
 ♦ Improve water system reliability.
 ♦ Increase water system capacity.
 Strategic Goal 1 Utility Comp Plan Goal 12.1
 Strategic Goal 1 Utility Comp Plan Goal 12.1

#### 2019-2020 Indicators of Success

- ♦ Complete construction of Macadam Rd S Water Upgrade.
- ♦ Complete construction of 58th Ave S Water Main Replacement.
- Continue development of the GIS as-builts of city water infrastructure.
- ♦ Complete update to Water Comprehensive Plan.
- Finish design and begin construction of Martin Luther King Jr Water Main.
- Continued development of the GIS as-builts of city water infrastructure.

# **Performance Measures**

|  |         | Actual  |           | Projec  | ted     |
|--|---------|---------|-----------|---------|---------|
| Public Works - Water                                     |         |         | Estimated |         |         |
|  | 2016    | 2017    | 2018      | 2019    | 2020    |
| Ensure a safe supply of drinking water                   |         |         |           |         |         |
| Number of backflow prevention assemblies (BPA) certified | 1,500   | 1,665   | 1,685     | 1,715   | 1,725   |
| Number of water system samples tested                    | 25      | 47      | 50        | 50      | 50      |
| Number of zones where mains are flushed                  | 150     | 129     | 135       | 135     | 135     |
| Bi-monthly tests for coliform & chlorine residual levels | 18      | 25      | 25        | 25      | 25      |
| Number of fire hydrants tested                           | 585     | 570     | 575       | 580     | 580     |
| Capital  |         |         |           |         |         |
| Number of water meters 2 inches and larger tested for    | 145     | 90      | 100       | 125     | 110     |
| accuracy   |         |         |           |         |         |
| Number of new water meters installed within 48 hours     | 10      | 13      | 15        | 17      | 19      |
| of hook-up request                                       |         |         |           |         |         |
| Customers  |         |         |           |         |         |
| Number of water customers                                | 2,145   | 2,150   | 2,202     | 2,500   | 2,600   |
| Total Gallons of Water Purchased (in thousands)          | 712,000 | 775,000 | 776,000   | 777,000 | 778,000 |
| Number of total water system miles                       | 43      | 44      | 44        | 44      | 45      |
| Number of fire hydrants                                  | 595     | 595     | 600       | 605     | 608     |
| Number of shut-off notices                               | 380     | 375     | 370       | 380     | 380     |
| Number of actual shut-offs for non-payment               | 40      | 40      | 40        | 40      | 40      |

# **Revenue and Expense Summary**

|  |                      |                      | Water                |                      |                        |                        |                |                |
|--|----------------------|----------------------|----------------------|----------------------|------------------------|------------------------|----------------|----------------|
|  |                      | Actual               |                      |                      | Budget                 |                        | Percent        | Change         |
|  |                      |                      | Projected            |                      |                        |                        |                |                |
|  | 2016                 | 2017                 | 2018                 | 2018                 | 2019                   | 2020                   | 2018-19        | 2019-20        |
| Operating Revenue                                    |                      |                      |                      |                      |                        |                        |                |                |
| Charges for Services                                 |                      |                      |                      |                      |                        |                        |                |                |
| Water Sales  | \$ 6,401,246         | \$ 6,774,040         | \$ 6,939,820         | \$ 6,996,000         | \$ 7,206,000           | \$ 7,388,000           | 3.00%          | 2.53%          |
| Inspection Fees                                      | 210                  | 345                  | 382                  | 1,000                | -                      | -                      | 0.00%          | 0.00%          |
| Total Charges for Services                           | 6,401,456            | 6,774,385            | 6,940,203            | 6,997,000            | 7,206,000              | 7,388,000              | 2.99%          | 2.53%          |
| Transfers In Hydrant Rental                          | -                    | -                    | 935,000              | -                    | -                      | -                      | 0.00%          | 0.00%          |
| Miscellaneous Revenue                                |                      |                      |                      |                      |                        |                        |                |                |
| Investment Earnings                                  | 33,658               | 62,912               | 52,481               | 21,000               | 31,000                 | 36,000                 | 47.62%         | 16.13%         |
| Sale of Capital Assets                               | (3,538)              | 4                    | -                    | -                    | -                      | -                      | 0.00%          | 0.00%          |
| Other Misc Revenue                                   | 186                  | 3,969                | 400                  | -                    | -                      | -                      | 0.00%          | 0.00%          |
| Total Miscellaneous Revenue                          | 30,307               | 66,885               | 52,881               | 21,000               | 31,000                 | 36,000                 | 47.62%         | 16.13%         |
| Total Operating Revenue                              | 6,431,763            | 6,841,271            | 7,928,084            | 7,018,000            | 7,237,000              | 7,424,000              | 3.12%          | 2.58%          |
| Capital Project Revenue                              |                      |                      |                      |                      |                        |                        |                |                |
| State Grant  | 41,082               |                      |                      |                      |                        |                        |                |                |
| Capital contributions                                | 60,209               | 216,339              | -<br>83,444          | 25.000               | 80,000                 | 100,000                | 220.00%        | 25.00%         |
| Transfer In from Fund 306                            | 00,209               | 210,339              | 935,000              | 25,000               | 60,000                 | 100,000                | 0.00%          | 0.00%          |
| Total Capital Project Revenue                        | -<br>101,291         | 216,339              | 1,018,444            | 25,000               | 80,000                 | 100,000                | 220.00%        | 25.00%         |
| Total Capital Project Revenue                        | 101,291              | 210,339              | 1,010,444            | 25,000               | 80,000                 | 100,000                | 220.00%        | 23.00%         |
| Total Revenue  | 6,533,054            | 7,057,609            | 8,946,528            | 7,043,000            | 7,317,000              | 7,524,000              | 3.89%          | 2.83%          |
| Operating Expenses                                   |                      |                      |                      |                      |                        |                        |                |                |
| Salaries & Wages                                     | 529.831              | 557,332              | 607.264              | 612.767              | 618.746                | 632,379                | 0.98%          | 2.20%          |
| Personnel Benefits                                   | 184,242              | 254,595              | 271,233              | 271,885              | 283,215                | 294,631                | 4.17%          | 4.03%          |
|  |                      |                      |                      |                      |                        |                        | 14.22%         | 2.85%          |
| Supplies<br>Services                                 | 2,650,091<br>259,278 | 3,031,752            | 2,417,466<br>363,601 | 2,815,300            | 3,215,550<br>301,567   | 3,307,300<br>323,858   | 4.55%          | 7.39%          |
|  | ,                    | 535,451              | *                    | 288,436              | ,                      |                        |                |                |
| Intergov't Services & Taxes Total Operating Expenses | 931,294<br>4,554,737 | 979,237<br>5,358,367 | 999,004<br>4,658,569 | 982,000<br>4,970,388 | 1,004,000<br>5,423,078 | 1,022,000<br>5,580,169 | 2.24%<br>9.11% | 1.79%<br>2.90% |
| , , ,  | 4,334,737            | 3,330,307            | 4,030,309            | 4,970,388            | 3,423,076              | 3,360,109              | 9.1170         | 2.90 /0        |
| Capital Expenses                                     |                      |                      | .=                   |                      |                        |                        |                |                |
| Salaries & Wages                                     | 30,398               | 42,500               | 17,022               | -                    | -                      | -                      | 0.00%          | 0.00%          |
| Personnel Benefits                                   | 12,074               | 17,054               | 7,194                | -                    | -                      | -                      | 0.00%          | 0.00%          |
| Supplies   | 2,544                | -                    | 3,846                | -                    | -                      | -                      | 0.00%          | 0.00%          |
| Services   | 235,496              | 237,296              | 607,081              | 317,000              | 473,000                | 505,000                | 49.21%         | 6.77%          |
| Capital Outlay                                       | 341,352              | 1,629,668            | 1,233,857            | 753,000              | 583,000                | 1,700,000              | -22.58%        | 191.60%        |
| Principal  | 132,734              | 132,333              | 133,992              | 133,992              | 134,242                | 135,801                | 0.19%          | 1.16%          |
| Interest   | 15,449               | 14,066               | 14,500               | 14,500               | 172,050                | 192,952                | 1086.55%       | 12.15%         |
| Total Capital Expenses                               | 770,047              | 2,072,917            | 2,017,493            | 1,218,492            | 1,362,292              | 2,533,753              | 11.80%         | 85.99%         |
| Transfers Out for Debt Service                       | -                    | -                    | 40,634               | 81,180               | 136,714                | 136,714                |                |                |
| Indirect cost allocation                             | 603,974              | 616,053              | 628,374              | 628,374              | 661,175                | 684,977                | 5.22%          | 3.60%          |
| Total Transfers                                      | 603,974              | 616,053              | 669,008              | 709,554              | 797,889                | 821,691                | 12.45%         | 2.98%          |
| Total Expenses                                       | 5,928,757            | 8,047,337            | 7,345,069            | 6,898,434            | 7,583,259              | 8,935,613              | 9.93%          | 17.83%         |
| Change in Fund Balance                               | 604,297              | (989,728)            | 1,601,459            | 144,566              | (266,259)              | (1,411,613)            | -284.18%       | 430.17%        |
|  |                      |                      |                      |                      |                        |                        |                |                |

# **Capital Projects**

The capital projects listed below are capital projects planned for the 2019-2020 biennium. The year in which the project is estimated to be completed has been provided. Additional information on the projects may be found in the Capital Improvement Program section of the budget document.

| 2019-2020 Water Capital Projects  | 2019<br>Budget  | 2020<br>Budget | Anticipated<br>Completion |
|-----------------------------------|-----------------|----------------|---------------------------|
| 58th Ave S Water Main Replacement | \$<br>679,000   | \$ -           | 2019                      |
| Water Comprehensive Plan          | 140,000         | 140,000        | 2020                      |
| GIS Inventory of Water System     | 100,000         | 100,000        | N/A                       |
| Macadam Rd S Water Upgrade        | 87,000          | 1,950,000      | 2020                      |
| Martin Luther King Jr Water Main  | 50,000          |                | 2022                      |
| Interurban Water Reuse            |                 | 15,000         | N/A                       |
|                                   | \$<br>1,056,000 | \$ 2,205,000   |                           |

## **Debt Service Requirements**

The following chart provides information on debt service requirements, by debt issue, for the biennium.

|                    |                    | Bud       | iget      |
|--------------------|--------------------|-----------|-----------|
| Debt Service       | Project            | 2019      | 2020      |
| 2015 Revenue Bonds | Allentown Phase II |           |           |
| Principal          |                    | 39,191    | 40,720    |
| Interest           |                    | 7,938     | 7,021     |
|                    | Total              | 47,130    | 47,741    |
| PWTFL 2001         | Duwamish/Valley Vi | ew        |           |
| Principal          |                    | 14,454    | 14,454    |
| Interest           |                    | 217       | 145       |
|                    | Total              | 14,671    | 14,599    |
| PWTFL 2004         | Allentown Phase II |           |           |
| Principal          |                    | 80,625    | 80,625    |
| Interest           |                    | 2,419     | 2,016     |
|                    | Total              | 83,044    | 82,641    |
| Public Safety Plan | Public Works Shops |           |           |
| 2018 Bond Issuance |                    |           |           |
| Interest           |                    | 136,714   | 136,714   |
|                    | Total              | 136,714   | 136,714   |
| Public Safety Plan | Public Works Shops |           |           |
| 2019 Bond Issuance |                    |           |           |
| Interest           |                    | 22,313    | 44,625    |
|                    | Total              | 22,313    | 44,625    |
| Total Principal    |                    | 134,271   | 135,799   |
| Total Interest     |                    | 169,600   | 190,520   |
| Total Debt Service |                    | \$303,871 | \$326,320 |

Amortization of premiums and discounts are not included in this schedule but are included in the Revenue and Expense Summary statement.

## **Expenditure Detail - Salaries and Benefits**

Salaries for budgeted positions are based on actual costs for existing positions and include a cost of living adjustment per contract agreements.

|                            | Public Works - Water |      |                         |            |          |             |            |  |  |  |  |  |  |  |
|----------------------------|----------------------|------|-------------------------|------------|----------|-------------|------------|--|--|--|--|--|--|--|
| Position                   | 2018                 | 2019 | 2019 B                  | udget      | 2020     | 2020 Budget |            |  |  |  |  |  |  |  |
| Description                | FTE                  | FTE  | Salaries Benefits FTE S |            | Salaries | Benefits    |            |  |  |  |  |  |  |  |
| Maint & Ops Superintendent | 1                    | 1    | \$ 85,278               | \$ 41,742  | 1        | \$ 87,000   | \$ 43,436  |  |  |  |  |  |  |  |
| Maint & Ops Foreman        | 1                    | 1    | 85,833                  | 37,880     | 1        | 87,528      | 39,335     |  |  |  |  |  |  |  |
| Maint & Ops Specialist     | 4                    | 4    | 299,404                 | 146,886    | 4        | 306,936     | 153,227    |  |  |  |  |  |  |  |
| Water Quality Specialist   | 1                    | 1    | 80,623                  | 36,141     | 1        | 82,200      | 37,573     |  |  |  |  |  |  |  |
| Development Manager        | 0                    | 0.4  | 56,608                  | 18,147     | 0.4      | 57,715      | 18,640     |  |  |  |  |  |  |  |
| Senior Engineer            | 0.5                  | 0    | _                       | -          | 0        | -           | -          |  |  |  |  |  |  |  |
| Extra Labor                |                      |      | 4,000                   | 396        |          | 4,000       | 396        |  |  |  |  |  |  |  |
| Overtime                   |                      |      | 7,000                   | 694        |          | 7,000       | 694        |  |  |  |  |  |  |  |
| Clothing Allowance         |                      |      |                         | 1,330      |          |             | 1,330      |  |  |  |  |  |  |  |
| Department Total           | 7.5                  | 7.4  | \$ 618,746              | \$ 283,215 | 7.4      | \$ 632,379  | \$ 294,631 |  |  |  |  |  |  |  |

#### **Water Operations & Maintenance Capital**

The Water Department operations and maintenance capital purchases for 2019/2020 include \$23,500 in 2019 for a Vehicle Gateway Base Station (VGB). The VGB allows the reading of a new generation of 520m radios on the water meters. The Water Department also has \$30,000 budgeted (\$10,000 in 2019 and \$20,000 in 2020) for a Water Distribution Chlorine Analyzer, which allows us to sample chlorine residual once a day within several of the water distribution pressure zones, as required by the WA State Department of Health. In 2019, there is \$6,000 budgeted for a temporary potable water line for emergencies.

#### Expenditure Detail - Supplies, Services and Other

Supplies include miscellaneous operating supplies for the water utility and purchased water. Services including engineering and surveying, repair and replacement charges, insurance, utilities, registrations, and credit card fees, among others. Intergovernmental includes excise tax and interfund utility tax.

| Water - Administration                                  |           |            |           |           |           |           |  |  |  |  |  |  |
|---|-----------|------------|-----------|-----------|-----------|-----------|--|--|--|--|--|--|
|   |           | Actual     |           |           |           |           |  |  |  |  |  |  |
|   |           |            | Projected |           |           |           |  |  |  |  |  |  |
| Account Number  | 2016      | 2017       | 2018      | 2018      | 2019      | 2020      |  |  |  |  |  |  |
| 401.01.534.800.31.00 Supplies -Office & Operating       | \$ (1,934 | ) \$ 1,706 | \$ 479    | \$ 500    | \$ 500    | \$ 500    |  |  |  |  |  |  |
| 401.01.534.800.31.01 Supplies -Office & Safety          | 3,605     | 2,116      | 1,896     | 2,000     | 2,000     | 2,000     |  |  |  |  |  |  |
| 401.01.534.800.31.02 Supplies -Operating                | 15,042    | 26,753     | 21,695    | 26,000    | 26,000    | 26,000    |  |  |  |  |  |  |
| 401.01.534.800.31.03 Supplies -Repairs & Maintenance    | 49,561    | 57,329     | 60,655    | 58,500    | 58,500    | 58,500    |  |  |  |  |  |  |
| 401.01.534.800.31.04 Supplies -Billing                  | 2,106     | 2,674      | 1,310     | 2,300     | 2,300     | 2,300     |  |  |  |  |  |  |
| 401.01.534.800.31.05 Supplies -Large Meters             | 42,002    | 30,146     | 16,022    | 55,000    | 55,000    | 55,000    |  |  |  |  |  |  |
| 401.01.534.800.33.01 Supplies -Purchased Water          | 2,524,605 | 2,905,004  | 2,291,131 | 2,650,000 | 3,050,250 | 3,142,000 |  |  |  |  |  |  |
| 401.01.534.800.33.04 Supplies -Reclaimed Water          | 3,794     | 4,211      | 11,907    | 10,000    | 10,000    | 10,000    |  |  |  |  |  |  |
| 401.01.534.800.35.00 Small Tools & Minor Equip -Tools   | 8,444     | 985        | 11,926    | 8,500     | 8,500     | 8,500     |  |  |  |  |  |  |
| 401.01.534.800.35.01 Small Tools & Minor Equip -Traffic | 2,866     | 828        | 446       | 2,500     | 2,500     | 2,500     |  |  |  |  |  |  |
| control   |           |            |           |           |           |           |  |  |  |  |  |  |
| Total Supplies  | 2,650,091 | 3,031,752  | 2,417,466 | 2,815,300 | 3,215,550 | 3,307,300 |  |  |  |  |  |  |

# **Expenditure Detail – Supplies, Services and Other, Continued**

|                      | Water -  | - Administra | tion, Contir | nued        |              |              |              |
|----------------------|--|--------------|--------------|-------------|--------------|--------------|--------------|
|                      |  |              | Actual       |             |              | Budget       |              |
|                      |  |              |              | Projected   |              |              |              |
| Account Number       |  | 2016         | 2017         | 2018        | 2018         | 2019         | 2020         |
|                      | Prof Svcs - Engineering services,<br>water analysis, and computer<br>programming       | 7,174        | 51,333       | 53,530      | 8,000        | 8,000        | 8,000        |
| 401.01.534.800.41.01 | Prof Svcs -Utility one call services for utility line locates                          | 527          | 632          | 656         | 500          | 500          | 500          |
| 401.01.534.800.41.02 | Prof Svcs -CDL licenses, hearing tests   | 765          | 500          | 603         | 1,000        | 1,000        | 1,000        |
| 401.01.534.800.42.00 | Communication -Phone bills and Nextels   | 720          | 2,001        | 2,776       | 2,500        | 2,500        | 2,500        |
| 401.01.534.800.43.00 | Travel -Mileage, meals (for overtime), parking   | 109          | 923          | 935         | 1,500        | 1,500        | 1,500        |
| 401.01.534.800.45.00 | Rental -Tapping machines, test<br>pumps and other emergency<br>equipment               | 3,042        | 1,230        | 3,142       | 1,500        | 1,500        | 1,500        |
| 401.01.534.800.45.94 | Rental -Equip Replacement Fund   | 86,774       | 131,873      | 109,461     | 109,461      | 81,143       | 93,036       |
| 401.01.534.800.45.95 | Rental -Equipment Rental O & M   | 46,188       | 76,010       | 73,868      | 73,868       | 80,003       | 85,775       |
| 401.01.534.800.46.01 | Insurance -WCIA Liability  | 26,901       | 14,853       | 16,410      | 16,338       | 18,051       | 21,661       |
| 401.01.534.800.47.00 | Public Utility -Gas, electricity, water, and sewer for water facilities                | 8            | -            | 23          | 13,400       | -            | -            |
| 401.01.534.800.47.01 | Public Utility - Disposal of spoils and asphalt from excavations                       | 1,409        | 210          | 2,500       | 5,000        | 5,000        | 5,000        |
| 401.01.534.800.47.21 | Public Utility -Electricity  | 15,842       | 18,247       | 22,766      | 5,000        | 19,320       | 20,286       |
| 401.01.534.800.47.25 | Public Utility -Water and Sewer  | 1,089        | 960          | 1,909       | 1,000        | 1,050        | 1,100        |
| 401.01.534.800.48.00 | R&M - Repairs to reservoir, PRV, water facilities and components                       | 13,994       | 173,870      | 11,513      | 12,369       | 15,000       | 15,000       |
| 401.01.534.800.49.00 | Misc - Registrations, training,<br>memberships, computer upgrades,<br>sm equip. repair | 1,859        | 4,052        | 7,227       | 12,000       | 12,000       | 12,000       |
| 401.01.534.800.49.01 | Misc -Operating permit from Dept of Health   | 5,279        | 4,943        | 4,943       | 5,000        | 5,000        | 5,000        |
| 401.01.534.800.49.08 | Misc -PPI credit card fees   | 47,598       | 53,816       | 51,339      | 20,000       | 50,000       | 50,000       |
| Total Services       |  | 259,278      | 535,451      | 363,601     | 288,436      | 301,567      | 323,858      |
| 401.01.534.800.53.00 | Taxes & Assessments -Excise Tax  | 291,083      | 302,017      | 293,461     | 280,000      | 280,000      | 280,000      |
| 401.01.534.800.54.01 | Interfund Taxes -Interfund Utility Tax   | 640,211      | 677,221      | 705,543     | 702,000      | 724,000      | 742,000      |
| Total Intergovernme  | ntal   | 931,294      | 979,237      | 999,004     | 982,000      | 1,004,000    | 1,022,000    |
| Total Supplies, Serv | ices and Other   | \$ 3,840,664 | \$ 4,546,440 | \$3,780,072 | \$ 4,085,736 | \$ 4,521,117 | \$ 4,653,158 |

Services include construction management related to capital projects. Capital includes capital projects specific to the water fund.

| Water - Cap   | Water - Capital Outlays by Expenditure Type |         |      |           |      |           |    |           |    |           |    |           |
|---|---|---------|------|-----------|------|-----------|----|-----------|----|-----------|----|-----------|
|   |   |         | -    | Actual    |      |           |    |           |    | Budget    |    |           |
|   |   |         |      |           | Р    | rojected  |    |           |    |           |    |           |
| Account Number  |   | 2016    |      | 2017      |      | 2018      |    | 2018      |    | 2019      |    | 2020      |
| 401.98.594.340.31.00 Supplies -Office and Operating                 | \$  | 2,544   | \$   | -         | \$   | 3,846     | \$ | -         | \$ | -         | \$ | -         |
| Total Supplies  |   | 2,544   |      | -         |      | 3,846     |    | -         |    | -         |    | -         |
| 401.98.594.340.41.00 Professional Services -Construction management |   | 234,400 |      | 237,296   |      | 607,081   |    | 317,000   |    | 473,000   |    | 505,000   |
| 401.98.594.340.44.00 Advertising -Bid ads                           |   | 675     |      | -         |      | -         |    | -         |    | -         |    | -         |
| 401.98.594.340.45.00 Advertising -Bid ads                           |   | 421     |      | 0         |      | -         |    | -         |    | -         |    | -         |
| Total Services  |   | 235,496 |      | 237,296   |      | 607,081   |    | 317,000   |    | 473,000   |    | 505,000   |
| 401.01.594.340.64.00 Capital -Machinery & Equipment                 |   | 24,164  |      | 26,485    |      | -         |    | -         |    | 39,500    |    | 20,000    |
| 401.98.594.340.65.00 Capital -Construction Projects                 |   | 317,187 |      | 1,603,183 |      | 1,226,663 |    | 753,000   |    | 583,000   |    | 1,700,000 |
| Total Other   |   | 341,352 | •    | 1,629,668 | •    | 1,226,663 |    | 753,000   |    | 622,500   |    | 1,720,000 |
| Total Capital   | \$  | 579,392 | \$ ' | 1,866,964 | \$ ' | 1,837,590 | \$ | 1,070,000 | \$ | 1,095,500 | \$ | 2,225,000 |

# City of Tukwila CAPITAL IMPROVEMENT PROGRAM

for 2019 - 2024

# WATER ENTERPRISE FUND 401.98

| CIP<br>Page # | PROJECT TITLE                               | 2019  | 2020  | 2021 | 2022 | 2023  | 2024  | TOTAL  | **Other<br>Sources | After Six<br>Years |
|---------------|---|-------|-------|------|------|-------|-------|--------|--------------------|--------------------|
| 62            | Interurban Water Reuse                      | 0     | 15    | 10   | 0    | 25    | 0     | 50     | 0                  | 0                  |
| 63            | 58th Ave S Water Main Replacement           | 679   | 0     | 0    | 0    | 0     | 0     | 679    | 0                  | 0                  |
| 64            | Water Comprehensive Plan                    | 140   | 140   | 0    | 0    | 0     | 0     | 280    | 0                  | 0                  |
| 65            | GIS Inventory of Water System               | 100   | 100   | 100  | 0    | 0     | 0     | 300    | 0                  | 0                  |
| 66            | Macadam Rd S Water Upgrade                  | 87    | 1,950 | 0    | 0    | 0     | 0     | 2,037  | 0                  | 0                  |
| 67            | Martin Luther King Jr Way S Water Main      | 50    | 0     | 313  | 156  | 0     | 0     | 519    | 0                  | 0                  |
| 68            | S 152nd Place Waterline Replacement         | 0     | 0     | 20   | 110  | 0     | 0     | 130    | 0                  | 0                  |
| 69            | Water Reservoir 1.5 million Gallon Capacity | 0     | 0     | 0    | 600  | 3,500 | 3,000 | 7,100  | 6,000              | 0                  |
| 70            | Crystal Springs Intertie with Highline WD   | 0     | 0     | 0    | 50   | 180   | 0     | 230    | 0                  | 0                  |
| 71            | S 152nd Street Waterline Replacement        | 0     | 0     | 0    | 0    | 80    | 690   | 770    | 0                  | 0                  |
| 72            | 57th Ave S Waterline Replacement            | 0     | 0     | 0    | 0    | 0     | 270   | 270    | 0                  | 0                  |
| 73            | Minkler Blvd Water Looping                  | 0     | 0     | 0    | 0    | 0     | 390   | 390    | 0                  | 0                  |
|               | S 140th St Waterline Replacement            | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 260                |
|               | Southcenter Blvd Water Main Replacement     | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 870                |
|               | S 180th & W Valley Loop/Renton Turnover     | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 2,464              |
|               | Foster Area Water Upgrade                   | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 1,390              |
|               | West Valley Hwy East Side Water Looping     | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 1,400              |
|               | West Valley Deep Water Main Replacement     | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 690                |
|               | 65th Ave S Water Main Replacement           | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 2,240              |
|               | 49th Ave S Water Main Replacement           | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 1,400              |
|               | S 180th St Water Main Replacement           | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 1,232              |
|               | Evans Black Dr Water Main Replacement       | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 780                |
|               | S 112 St Water Looping                      | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 1,140              |
|               | S 153rd St Water Main Replacement           | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 350                |
|               | Corporate Dr S Water Main Replacement       | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 560                |
|               | Allentown Phase III - Water Revitalization  | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 560                |
|               | Foster Playfield Reclaimed Water Extension  | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 1,680              |
|               | Duwamish River Crossing Reclaimed Water     | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 193                |
|               | Strander Blvd Waterline Upgrade             | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 3,190              |
|               | Baker Blvd Water Main Replacement           | 0     | 0     | 0    | 0    | 0     | 0     | 0      | 0                  | 1,595              |
|               | Grand Total                                 | 1,056 | 2,205 | 443  | 916  | 3,785 | 4,350 | 12,755 | 6,000              | 21,994             |

<sup>\*\*</sup> Denotes other funding sources, grants, or mitigation.

Project sheets scheduled beyond 2024

can be found in the City's website under Public Works Capital Improvement Program.

Changes from 2017 to 2019 CIP:

Deleted:

Andover Park E Water Main Replacement, completed in 2017/2018. 53rd Ave S Water Main Replacement, water completed in 2018. Minkler Blvd Water Main Replacement, not needed with new PW Shop location.

New:

Baker Blvd Water Main Replacement

2019 to 2024

PROJECT: Interurban Water Reuse Project No. 99240106

DESCRIPTION:

Develop water reuse along the Interurban corridor with Class A treated wastewater from the Eastside

Reclamation Facility for irrigation, sewer flushing, sweeping, dust control, and other non-potable uses.

JUSTIFICATION:

Using reclaimed water is an element of the City's Water Conservation Plan as well as the Cascade Water

Transmission and Supply Plan.

STATUS: These funds will be used for engineering and construction to assist potential connections to the King

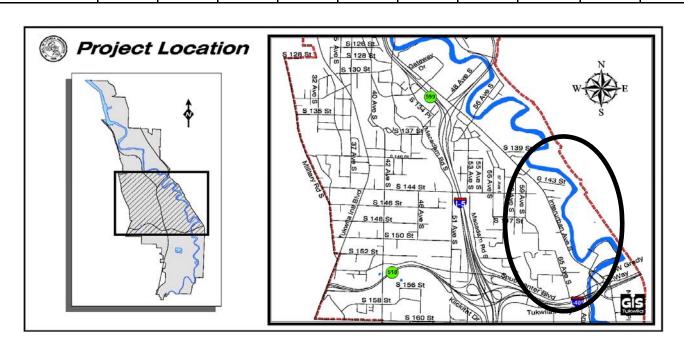
County reclaimed water line.

**MAINT. IMPACT:** Future maintenance and operation of the new meters, tracking and preventing cross-connections.

COMMENT: KC Dept of Natural Resources funded the construction of additional portions for installation of the

reuse water line.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 5       |           |      | 15   | 10   |      | 25   |      | 25     | 80    |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        | 6       |           |      |      |      |      |      |      |        | 6     |
| Construction        | 111     |           |      |      |      |      |      |      |        | 111   |
| TOTAL EXPENSES      | 122     | 0         | 0    | 15   | 10   | 0    | 25   | 0    | 25     | 197   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 122     | 0         | 0    | 15   | 10   | 0    | 25   | 0    | 25     | 197   |
| TOTAL SOURCES       | 122     | 0         | 0    | 15   | 10   | 0    | 25   | 0    | 25     | 197   |



2019 to 2024

PROJECT: 58th Ave S Water Main Replacement Project No. 90540102

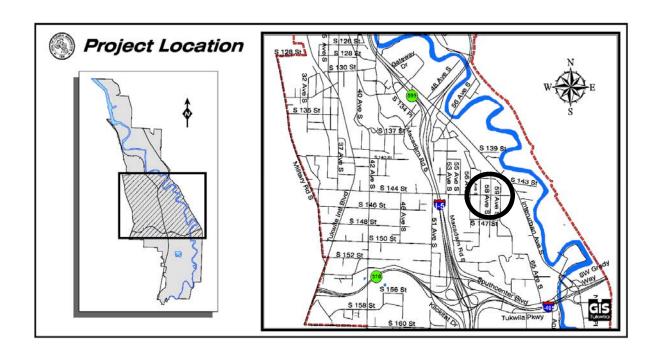
Design and construct 680 LF of 8" ductile iron waterline to replace the old cast iron waterline in 58th Ave S from S 142nd St to S 144th St. Construction also includes overlay of the street.

JUSTIFICATION: The existing waterline is cast iron and is subject to cracking and breaking apart with age.

**STATUS:** Design completed in 2016 with review and construction in 2019.

MAINT. IMPACT: The new waterline will significantly reduce impact on crews from the risk of failure.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 21      | 1         | 10   |      |      |      |      |      |        | 32    |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           | 86   |      |      |      |      |      |        | 86    |
| Construction        |         |           | 583  |      |      |      |      |      |        | 583   |
| TOTAL EXPENSES      | 21      | 1         | 679  | 0    | 0    | 0    | 0    | 0    | 0      | 701   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 21      | 1         | 679  | 0    | 0    | 0    | 0    | 0    | 0      | 701   |
| TOTAL SOURCES       | 21      | 1         | 679  | 0    | 0    | 0    | 0    | 0    | 0      | 701   |



2019 to 2024

PROJECT: Water Comprehensive Plan Project No. 91040101

Prepare the new Water Comprehensive Plan incorporating any regulatory or new Growth Management

Act Comprehensive Plan issues related to running the water utility.

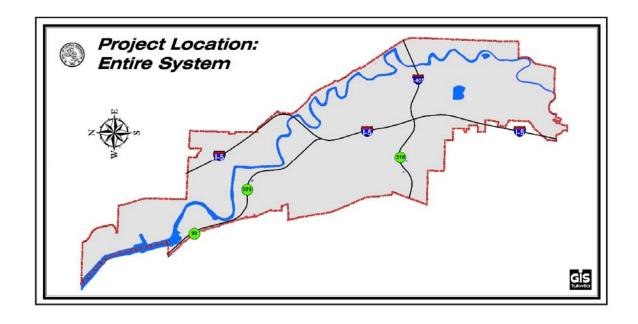
JUSTIFICATION: Plan needs to be consistent with City's Comprehensive Plan and the Department of Health requires

the plan to be updated every 6 years.

**STATUS:** Current Water update was adopted in 2015. The next update is scheduled for 2021.

**MAINT. IMPACT:** 

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 234     |           | 140  | 140  |      |      |      |      |        | 514   |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      |      |      |        | 0     |
| Construction        |         |           |      |      |      |      |      |      |        | 0     |
| TOTAL EXPENSES      | 234     | 0         | 140  | 140  | 0    | 0    | 0    | 0    | 0      | 514   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 234     | 0         | 140  | 140  | 0    | 0    | 0    | 0    | 0      | 514   |
| TOTAL SOURCES       | 234     | 0         | 140  | 140  | 0    | 0    | 0    | 0    | 0      | 514   |



2019 2024

**PROJECT: GIS Inventory of Water System**  Project No. 81640104

The GIS (Geographic Information System ) will provide current as-built data for the Tukwila water system. **DESCRIPTION:** 

The data base will include fire hydrants, valve locations, approximate water line locations, date of installation,

and material type.

The GIS mapping will provide information on the water system that is easily addressable by City staff JUSTIFICATION:

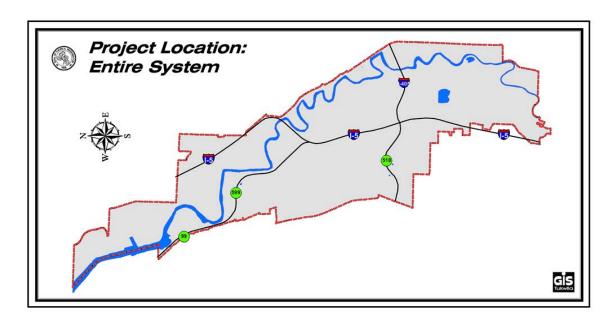
and the public. With GIS data, the City will be able to develop an asset management plan to determine

the water assets needed to be upgraded or replaced.

Combined Asset Management System began in 2017. STATUS:

The survey will provide staff with-up-date information on the location of water line features. **MAINT. IMPACT:** 

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 10      | 115       | 100  | 100  | 100  |      |      |      |        | 425   |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      |      |      |        | 0     |
| Construction        |         |           |      |      |      |      |      |      |        | 0     |
| TOTAL EXPENSES      | 10      | 115       | 100  | 100  | 100  | 0    | 0    | 0    | 0      | 425   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        | ,     |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 10      | 115       | 100  | 100  | 100  | 0    | 0    | 0    | 0      | 425   |
| TOTAL SOURCES       | 10      | 115       | 100  | 100  | 100  | 0    | 0    | 0    | 0      | 425   |



2019 to 2024

PROJECT: Macadam Rd S Water Upgrade Project No. 90440105

**DESCRIPTION:** Design and construct 4,300 LF of 10" waterline in Macadam Rd S from S 144th St to Southcenter Blvd.

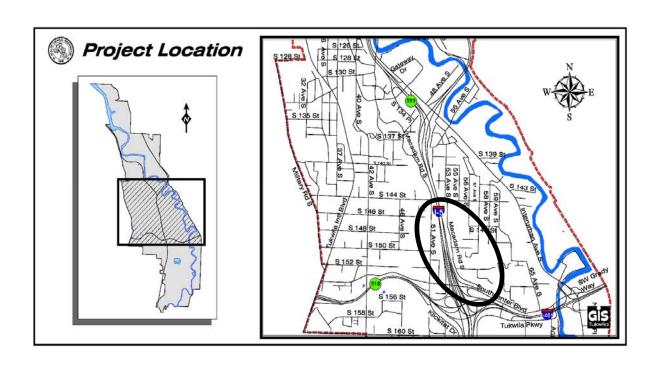
**JUSTIFICATION:** Improve fire flow water quality to the north side of Tukwila Hill.

**STATUS:** Project now scheduled for 2019/2020 to determine sidewalk options.

MAINT. IMPACT: The new waterline will eliminate maintenance time for flushing the dead end line while increasing service reliability.

**COMMENT:** Grant application for sidewalks to 4/23/18 TIC for Pedestrian/Bicycle Program.

| FINANCIAL           | Through | Estimated |      |       |      |      |      |      |        |       |
|---------------------|---------|-----------|------|-------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020  | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |       |      |      |      |      |        |       |
| Design              | 68      |           | 87   |       |      |      |      |      |        | 155   |
| Land (R/W)          |         |           |      |       |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      | 250   |      |      |      |      |        | 250   |
| Construction        |         |           |      | 1,700 |      |      |      |      |        | 1,700 |
| TOTAL EXPENSES      | 68      | 0         | 87   | 1,950 | 0    | 0    | 0    | 0    | 0      | 2,105 |
| FUND SOURCES        |         |           |      |       |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |       |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |       |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |       |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |       |      |      |      |      |        | 0     |
| Utility Revenue     | 68      | 0         | 87   | 1,950 | 0    | 0    | 0    | 0    | 0      | 2,105 |
| TOTAL SOURCES       | 68      | 0         | 87   | 1,950 | 0    | 0    | 0    | 0    | 0      | 2,105 |



2019 2024

Martin Luther King Jr Way S Water Main **PROJECT:** Project No. 90640102

Design and construct replacement of 800 LF of 12" water line and hydrants. **DESCRIPTION:** 

During the construction of Sound Transit light rail along Martin Luther King Jr Way South, the existing JUSTIFICATION:

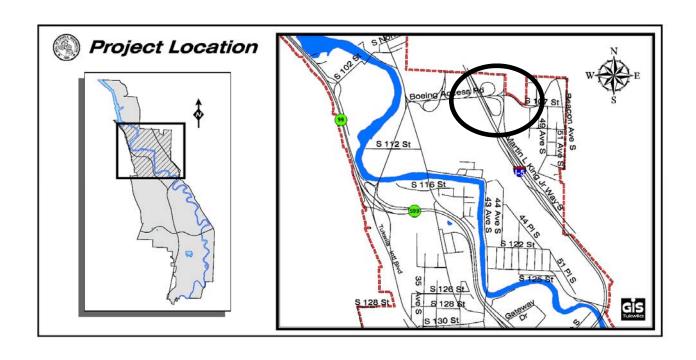
12" D.I.P. waterline was found to be heavily covered with corrosion.

Design will begin in 2019 with construction in 2020/21. STATUS:

**MAINT. IMPACT:** A relined pipe will reduce the risk of failure.

Project will require a franchise agreement with WSDOT for existing waterline located in WSDOT right-of-way. **COMMENT:** 

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 1       | 25        | 50   |      |      |      |      |      |        | 76    |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      | 40   | 40   |      |      |        | 80    |
| Construction        |         |           |      |      | 273  | 116  |      |      |        | 389   |
| TOTAL EXPENSES      | 1       | 25        | 50   | 0    | 313  | 156  | 0    | 0    | 0      | 545   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 1       | 25        | 50   | 0    | 313  | 156  | 0    | 0    | 0      | 545   |
| TOTAL SOURCES       | 1       | 25        | 50   | 0    | 313  | 156  | 0    | 0    | 0      | 545   |



2019 to 2024

PROJECT: S 152nd Place Waterline Replacement Project No. 91640103

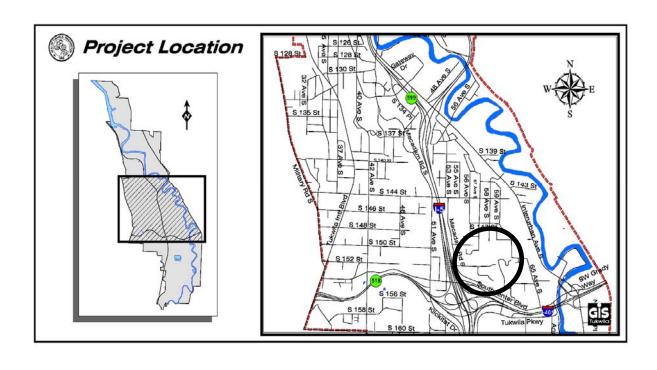
**DESCRIPTION:** Design and construct 150 LF of 8" ductile iron waterline in S 152nd Place to Sunwood Blvd.

**JUSTIFICATION:** The proposed waterline will also meet fire flow requirements.

**STATUS:** Easement acquisitions will be needed.

**MAINT. IMPACT:** To remove a dead-end in South 152nd Place to improve water quality.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              |         |           |      |      | 20   | 30   |      |      |        | 50    |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      | 10   |      |      |        | 10    |
| Construction        |         |           |      |      |      | 70   |      |      |        | 70    |
| TOTAL EXPENSES      | 0       | 0         | 0    | 0    | 20   | 110  | 0    | 0    | 0      | 130   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 0       | 0         | 0    | 0    | 20   | 110  | 0    | 0    | 0      | 130   |
| TOTAL SOURCES       | 0       | 0         | 0    | 0    | 20   | 110  | 0    | 0    | 0      | 130   |



2019 to 2024

PROJECT: Water Reservoir and Pump Station Project No. 91240102

**DESCRIPTION:** Design and construct a new 1.5 million gallon water storage reservoir with a 3,300 gpm pump station.

JUSTIFICATION:

The Department of Health is requiring that the City provide additional water storage in the 360 pressure zone,

which includes the Commercial Business District. A pump station is needed for fire flow.

STATUS: Design funds in 2017/18 will study the possibility of using Highline's CrestView Reservoir's extra capacity

instead of building a new reservoir.

MAINT. IMPACT: Additional staff will be needed to provide maintenance for the new reservoir and pumps.

**COMMENT:** 

| FINANCIAL           | Through | Estimated |      |      |      |      |       |       |        |       |
|---------------------|---------|-----------|------|------|------|------|-------|-------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023  | 2024  | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |       |       |        |       |
| Design              | 28      | 50        |      |      |      | 500  | 500   |       |        | 1,078 |
| Land (R/W)          |         |           |      |      |      | 100  |       |       |        | 100   |
| Const. Mgmt.        |         |           |      |      |      |      | 400   | 400   |        | 800   |
| Construction        |         |           |      |      |      |      | 2,600 | 2,600 |        | 5,200 |
| TOTAL EXPENSES      | 28      | 50        | 0    | 0    | 0    | 600  | 3,500 | 3,000 | 0      | 7,178 |
| FUND SOURCES        |         |           |      |      |      |      |       |       |        |       |
| Awarded Grant       |         |           |      |      |      |      |       |       |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |       |       |        | 0     |
| Bond                |         |           |      |      |      |      | 3,000 | 3,000 |        | 6,000 |
| Mitigation Expected |         |           |      |      |      |      |       |       |        | 0     |
| Utility Revenue     | 28      | 50        | 0    | 0    | 0    | 600  | 500   | 0     | 0      | 1,178 |
| TOTAL SOURCES       | 28      | 50        | 0    | 0    | 0    | 600  | 3,500 | 3,000 | 0      | 7,178 |

Location to be determined.

2019 to 2024

**PROJECT: Crystal Springs Intertie with Highline Water District** Project No. 91040104

Supply an emergency intertie for 10-12 customers within the Crystal Springs pressure zone. **DESCRIPTION:** 

An intertie feed from the City's 360-zone was cut off with the WSDOT reconstruction of Klickitat Drive JUSTIFICATION:

at the SR 518 off-ramp. If the Seattle supply tap becomes unavailable, there would be no service or fire

flow for customers.

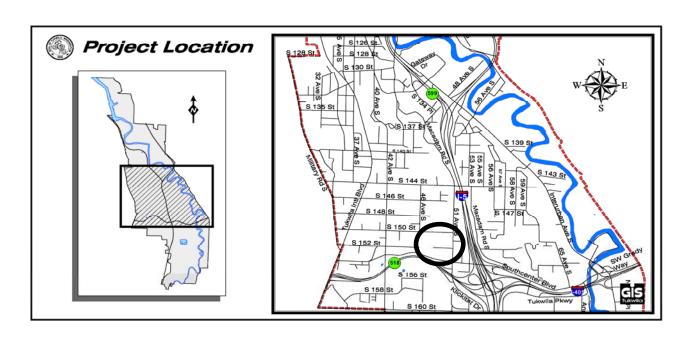
A Parks department meter could be temporarily set up during maintenance closures, but hydrants would STATUS:

still be unavailable.

Maintenance liabilities would be reduced and temporary measures would save time and prevent vandalism. **MAINT. IMPACT:** 

This project may not be required if the area is transferred to Highline Water District. **COMMENT:** 

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              |         |           |      |      |      | 50   |      |      |        | 50    |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      | 30   |      |        | 30    |
| Construction        |         |           |      |      |      |      | 150  |      |        | 150   |
| TOTAL EXPENSES      | 0       | 0         | 0    | 0    | 0    | 50   | 180  | 0    | 0      | 230   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        | ,     |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 0       | 0         | 0    | 0    | 0    | 50   | 180  | 0    | 0      | 230   |
| TOTAL SOURCES       | 0       | 0         | 0    | 0    | 0    | 50   | 180  | 0    | 0      | 230   |



2019 to 2024

PROJECT: S 152nd Street Waterline Replacement Project No. 91640102

Design and construct 1,600 LF of 10" ductile iron waterline to replace the old 6" cast iron waterline in

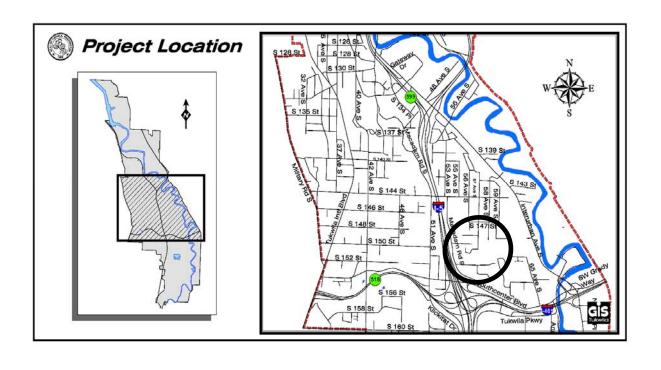
S 152nd St from Macadam Rd S east to the end of the pipe near 58th Ave S.

**JUSTIFICATION:** The existing waterline is cast iron and is subject to cracking and breaking apart with age.

STATUS:

**MAINT. IMPACT:** The proposed waterline will also meet fire flow requirements.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              |         |           |      |      |      |      | 80   |      |        | 80    |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      |      | 90   |        | 90    |
| Construction        |         |           |      |      |      |      |      | 600  |        | 600   |
| TOTAL EXPENSES      | 0       | 0         | 0    | 0    | 0    | 0    | 80   | 690  | 0      | 770   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 0       | 0         | 0    | 0    | 0    | 0    | 80   | 690  | 0      | 770   |
| TOTAL SOURCES       | 0       | 0         | 0    | 0    | 0    | 0    | 80   | 690  | 0      | 770   |



2019 2024

PROJECT: **57th Ave S Waterline Replacement** Project No. 91640105

Design and construct 660 LF of 8" ductile iron pipe waterline to replace the old 6" cast iron waterline **DESCRIPTION:** 

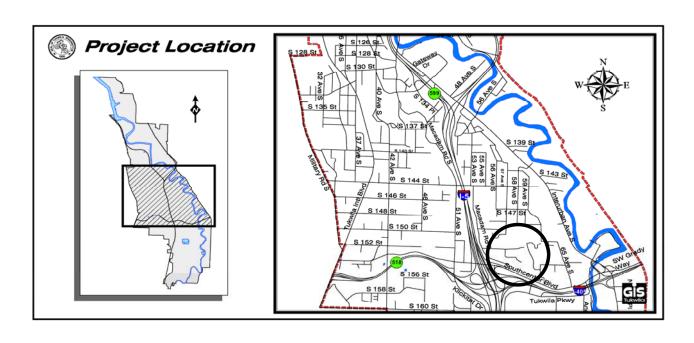
in 57th Ave S from S 152nd St to S 150th Pl.

The existing waterline is cast iron and subject to cracking and breaking apart with age. JUSTIFICATION:

STATUS:

The proposed waterline is required to meet fire flow requirements. **MAINT. IMPACT:** 

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              |         |           |      |      |      |      |      | 40   |        | 40    |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      |      | 30   |        | 30    |
| Construction        |         |           |      |      |      |      |      | 200  |        | 200   |
| TOTAL EXPENSES      | 0       | 0         | 0    | 0    | 0    | 0    | 0    | 270  | 0      | 270   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        | ,     |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 0       | 0         | 0    | 0    | 0    | 0    | 0    | 270  | 0      | 270   |
| TOTAL SOURCES       | 0       | 0         | 0    | 0    | 0    | 0    | 0    | 270  | 0      | 270   |



2019 to 2024

PROJECT: Minkler Blvd Water Looping Project No. 99440101

DESCRIPTION:

Design and construct 350 LF of 12" ductile iron pipe to interconnect Southcenter Square with Andover

Park West.

JUSTIFICATION: Improvement in fire flow with a corresponding decrease in pressure fluctuations. Brings in a secondary

feed in case of Southcenter Parkway shutdowns.

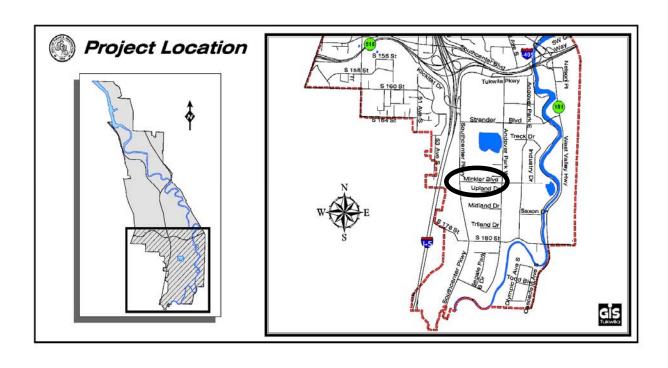
STATUS: In 2014, development installed 350' of water main to provide fire protection for the new motel. An additional

350 feet of pipe is needed to complete the pipe run from APW to Southcenter Pkwy.

**MAINT. IMPACT:** Better redundancy and service for critical business customers.

**COMMENT:** Costs are high as the work is in the intersection of Minkler Blvd and APW.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              |         |           |      |      |      |      |      | 45   |        | 45    |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      |      | 45   |        | 45    |
| Construction        |         |           |      |      |      |      |      | 300  |        | 300   |
| TOTAL EXPENSES      | 0       | 0         | 0    | 0    | 0    | 0    | 0    | 390  | 0      | 390   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 0       | 0         | 0    | 0    | 0    | 0    | 0    | 390  | 0      | 390   |
| TOTAL SOURCES       | 0       | 0         | 0    | 0    | 0    | 0    | 0    | 390  | 0      | 390   |



# **ATTACHMENT E**

City of Tukwila

# **SEWER ENTERPRISE FUND**

2019 - 2024 Analysis in 000's

| REVENUES                                 | 2015<br>Actual | 2016<br>Actual | 2017<br>Actual | 2018<br>Budget | 2018<br>Estimate | 2019   | 2020  | 2021   | 2022   | 2023   | 2024   | Totals |
|--|----------------|----------------|----------------|----------------|------------------|--------|-------|--------|--------|--------|--------|--------|
| Monthly Sewer Charges                    | +15%           | +0%            | +5.2%          | +3.5%          | +3.5%            | кс     | 0%    | КС     | 0%     | кс     | 0%     |        |
| King County Metro Sewer (1)              | 3,866          | 4,299          | 4,546          | 4,337          | 4,646            | 4,762  | 4,762 | 4,977  | 4,977  | 5,089  | 5,206  | 29,773 |
| Regular City Sewer (2)                   | 4,971          | 4,641          | 4,865          | 4,120          | 4,720            | 4,720  | 4,720 | 4,725  | 4,730  | 4,735  | 4,720  | 28,350 |
| Subtotal Sewer Revenue                   | 8,837          | 8,940          | 9,411          | 8,457          | 9,366            | 9,482  | 9,482 | 9,702  | 9,707  | 9,824  | 9,926  | 58,123 |
| Other Misc. Revenue                      | 228            | 290            | 328            | 217            | 300              | 305    | 305   | 300    | 300    | 300    | 300    | 1,810  |
| Grant/Bonds/PWTF                         | 504            | 22             | 0              | 0              | 0                | 0      | 0     | 0      | 0      | 0      | 0      | 0      |
| Sewer Connection Fees (3)                | 206            | 248            | 328            | 125            | 236              | 125    | 125   | 0      | 100    | 0      | 100    | 450    |
| Total Revenues                           | 9,775          | 9,500          | 10,067         | 8,799          | 9,902            | 9,912  | 9,912 | 10,002 | 10,107 | 10,124 | 10,326 | 60,383 |
| EXPENDITURES                             |                |                |                |                |                  |        |       |        |        |        |        |        |
| Sewer Operations & Maintenance           |                |                |                |                |                  |        |       |        |        |        |        |        |
| King County Metro Sewer (4)              | 3,866          | 4,299          | 4,546          | 4,337          | 4,646            | 4,762  | 4,762 | 4,977  | 4,977  | 5,089  | 5,206  | 29,773 |
| Regular City Sewer (5)                   | 1,884          | 1,649          | 1,618          | 1,355          | 1,778            | 1,447  | 1,493 | 1,922  | 1,980  | 2,039  | 2,100  | 10,981 |
| Debt Service (6)                         | 410            | 362            | 358            | 360            | 360              | 359    | 360   | 353    | 353    | 305    | 304    | 2,034  |
| Debt Service for PW Shops                |                |                |                | 49             | 49               | 89     | 101   | 240    | 240    | 240    | 240    | 1,150  |
| Interfund Utility Tax <sup>(7)</sup> 10% | 902            | 920            | 972            | 867            | 967              | 979    | 979   | 1,000  | 1,001  | 1,012  | 1,023  | 5,993  |
| Engineering Labor <sup>(9)</sup>         | 90             | 26             | 79             | 86             | 86               | 74     | 76    | 78     | 80     | 82     | 84     | 474    |
| Subtotal                                 | 7,152          | 7,256          | 7,573          | 7,054          | 7,886            | 7,710  | 7,771 | 8,570  | 8,631  | 8,767  | 8,957  | 50,405 |
| Sewer Capital - CIP Program              | 980            | 1,970          | 1,468          | 1,565          | 2,045            | 2,956  | 1,900 | 1,855  | 735    | 938    | 1,010  | 9,394  |
| Total Expenditures                       | 8,132          | 9,226          | 9,041          | 8,619          | 9,931            | 10,666 | 9,671 | 10,425 | 9,366  | 9,705  | 9,967  | 59,799 |
| FUND BALANCE                             |                |                |                |                |                  |        |       |        |        |        |        |        |
| Change in Fund Balance <sup>(a)</sup>    | 1,643          | 274            | 1,026          | 180            | (29)             | (754)  | 241   | (423)  | 741    | 419    | 359    | 584    |
| Beginning Balance                        | 5,285          | 7,827          | 8,697          | 4,434          | 9,723            | 9,694  | 8,941 | 9,182  | 8,759  | 9,500  | 9,919  | 9,694  |
| Ending Balance                           | 6,928          | 8,101          | 9,723          | 4,614          | 9,694            | 8,941  | 9,182 | 8,759  | 9,500  | 9,919  | 10,278 | 10,278 |
| Fund Balance:                            |                |                |                |                |                  |        |       |        |        |        |        |        |
| Reserved <sup>(b)</sup> 20% of revenue   | 1,715          | 1,854          | 1,896          | 1,854          | 1,854            | 1,760  | 1,982 | 1,982  | 2,000  | 2,021  | 2,025  | 2,025  |
| Unreserved                               | 5,213          | 6,247          | 7,827          | 2,759          | 7,840            | 7,181  | 7,200 | 6,776  | 7,500  | 7,897  | 8,253  | 8,253  |
| Ending Balance                           | 6,928          | 8,101          | 9,723          | 4,614          | 9,694            | 8,941  | 9,182 | 8,759  | 9,500  | 9,919  | 10,278 | 10,278 |

<sup>(</sup>a) Revenues in excess of (less than) expenditures(b) Annual reserve balance requirement equals 20% of the prior year operating revenues.

#### **ATTACHMENT E-1**

#### NOTES TO SEWER ENTERPRISE FUND

- 1) King County Metro sewer and Tukwila's sewer have been split out to present the revenues separately. Metro increases will be passed through to the sewer ratepayers. King County Metro sewer fees will increase 2.51% in 2019 per KC Ordinance No. 18745 and we have factored in potential King County increases for 2020 through 2024.
- 2) No rate increases are proposed for Tukwila sewer. We will continue with the annual rate model review to confirm that the proposed increases are necessary.
- 3) Sewer connection fees for Allentown Phase I and Allentown/Foster Point Phase II.
- 4) King County Metro Sewer treatment fees are passed through to ratepayers.
- 5) City's basic operation and maintenance costs.
- 6) Includes the Public Works Trust Fund (PWTF) Loan and the 2006 Bond for the Allentown/Foster Point Phase II Sewer Improvement Project.

| Sewer Debt Service includes:  | <b>Expires</b> | <u>2019</u>  | <u>2020</u>          |
|-------------------------------|----------------|--------------|----------------------|
| 2004 PWTF Allentown (62%)     | 7/1/24         | \$198,028.61 | \$197,067.30         |
| 2006 Bond Allentown (62%)     | 12/31/26       | 112,385.83   | 113,843.31           |
| 2013 PWTF CBD Sewer Rehab     | 12/31/33       | 44,263.00    | 44,263.00            |
| 2018 Public Works Shops (10%) | 12/31/38       | 88,868.00    | 101,337.00           |
|                               | Total          | \$443.545.44 | \$456.510.6 <u>1</u> |

- 7) An Interfund Utility Tax was approved in October 2009 for the water, sewer, and surface water utilities. Gross revenues are currently taxed 10% through December 31, 2021.
- 8) The Working Capital Reserve Fund's policy was updated in 2012 per Resolution No. 1774 to maintain an adequate fund balance in each of the enterprise funds. For the Enterprise Funds, the unrestricted fund balance shall equal or exceed 20% of the previous year's revenue, exclusive of significant non-operating, non-recurring revenues.
- 9) The Senior Water/Sewer Engineer's salary and benefits are split evenly between the water department and the sewer department.

#### **Sewer Enterprise Fund**

The City's Enterprise Funds account for utility operations that are self-supported through user charges. The utilities are financed and operated like a private business enterprise which requires periodic determination of revenues earned; expenses incurred, and net income for capital maintenance, public policy, management control and accountability. The Sewer Fund accounts for operations and capital improvements to provide sanitary sewer to a portion of City residents. Valley View Sewer District also provides sewer in the City.

**DEPARTMENT: Public Works** 

FUND: Sewer FUND NUMBER: 402 RESPONSIBLE MANAGER: Henry Hash POSITION: Director

#### **Description**

The mission of the Sewer Utility is to operate and maintain a sewer collection system that will ensure the health, safety, and welfare of the citizens and visitors of Tukwila. The Sewer Utility is responsible for the maintenance of approximately 40 miles of gravity sewer main and the operation and maintenance of 12 lift stations and force mains. These lift stations pump approximately 60% of all sewage in the City (approximately 460 million gallons). The Sewer Utility maintains relationships with adjoining jurisdictions, cities, water districts, sewer districts, King County Department of Natural Resources & Parks, Wastewater Treatment Division, State Department of Ecology, State Department of Health, and King County Health Department.

# 2017-2018 Accomplishments

- Evaluated system-wide conditions for potential upgrades for Annual Sewer Repair Program.
- Ongoing construction of CBD Sanitary Sewer Rehabilitation.
- ♦ Completed construction 53rd Ave S Sewer Rehabilitation.
- Completed construction of Andover Park E Sewer Replacement.
- Continued development of the GIS as-builts of city sewer infrastructure.

#### 2019-2020 Outcome Goals

- ♦ Improve sewer system efficiency. Strategic Goal 1. Utility Comp Plan Goal 12.1
- ♦ Improve sewer system reliability. Strategic Goal 1. Utility Comp Plan Goal 12.1
- ◆ Improve sewer system capacity. Strategic Goal 1. Utility Comp Plan Goal 12.1

## 2019-2020 Indicators of Success

- Evaluate system-wide conditions for potential upgrades for Annual Sewer Repair Program.
- Ongoing construction of CBD Sanitary Sewer Rehabilitation.
- ♦ Complete update to Sewer Comprehensive Plan.
- Replace generator, control system and concrete slab at Sewer Lift Station #2.
- ♦ Upgrade the electrical at Lift Station No. 4.
- Complete construction of Fort Dent Park Sewer Relocation Project.
- Continued development of the GIS as-builts of city sewer infrastructure.

# **Performance Measures**

|  |         | Actual  |           | Projected |                        |  |
|--|---------|---------|-----------|-----------|------------------------|--|
| Sewer  |         |         | Estimated |           |                        |  |
|  | 2016    | 2017    | 2018      | 2019      | 2020                   |  |
| Maintain and Improve Sewer System  |         |         |           |           |                        |  |
| Number of linear feet TV inspected   | 10,000  | 10,000  | 10,000    | 10,000    | 10,000                 |  |
| Number of linear feet of sewer pipe jet cleaned  | 200,000 | 200,000 | 200,000   | 206,000   | 206,000                |  |
| Number of manholes cleaned   | 850     | 850     | 850       | 1,261     | 1,261                  |  |
|  |         |         |           |           |                        |  |
| Capital  |         |         |           |           |                        |  |
| Hours of 10 sewer lift stations monitoring of pump hours, start counts, and generator operation (weekly) | 11      | 11      | 11        |           | 2 FTEs<br>11hrs a week |  |
| Customers  |         |         |           |           |                        |  |
| Number of sewer customers  | 1,760   | 1,770   | 1,833     | 1,840     | 1,850                  |  |
| Number of total sewer system miles   | 40.30   | 41.00   | 41.00     | 39.00     | 39.00                  |  |

# **Revenue and Expense Summary**

|                                       |              |              | Sewer        |              |              |              |           |          |
|---------------------------------------|--------------|--------------|--------------|--------------|--------------|--------------|-----------|----------|
|                                       |              | Actual       |              |              | Budget       |              | Percent ( | Change   |
| ļ                                     |              |              | Projected    |              |              |              |           |          |
|                                       | 2016         | 2017         | 2018         | 2018         | 2019         | 2020         | 2018-19   | 2019-20  |
| Operating Revenue                     |              |              |              |              |              |              |           |          |
| Charges for Services                  |              |              |              |              |              |              |           |          |
| Sewer Sales                           | \$ 9,186,732 | \$ 9,706,584 | \$ 9,298,061 | \$ 8,644,000 | \$ 9,732,000 | \$ 9,732,000 | 12.59%    | 0.00%    |
| Total Charges for Services            | 9,186,732    | 9,706,584    | 9,298,061    | 8,644,000    | 9,732,000    | 9,732,000    | 12.59%    | 0.00%    |
| Miscellaneous Revenue                 |              |              |              |              |              |              |           |          |
| Investment Earnings                   | 42,624       | 33,110       | 107,132      | 30,000       | 55,000       | 55,000       | 83.33%    | 0.00%    |
| Total Miscellaneous Revenue           | 42,624       | 33,110       | 107,132      | 30,000       | 55,000       | 55,000       | 83.33%    | 0.00%    |
| Total Operating Revenue               | 9,229,356    | 9,739,694    | 9,405,193    | 8,674,000    | 9,787,000    | 9,787,000    | 12.83%    | 0.00%    |
| Capital Project Revenue               |              |              |              |              |              |              |           |          |
| Intergovernmental -Grants             | 270,857      | 327,675      | 229,525      | 125,000      | 125,000      | 125,000      | 0.00%     | 0.00%    |
| Transfer In from Fund 306             | -            | -            | 522,500      | -            | -            | -            | 0.00%     | 0.00%    |
| Long-Term Debt Proceeds               | -            | -            | -            | -            | -            | -            | 0.00%     | 0.00%    |
| Total Capital Project Revenue         | 270,857      | 327,675      | 752,025      | 125,000      | 125,000      | 125,000      | 0.00%     | 0.00%    |
| Total Revenue                         | 9,500,213    | 10,067,369   | 10,157,217   | 8,799,000    | 9,912,000    | 9,912,000    | 12.65%    | 0.00%    |
| Operating Expenses                    |              |              |              |              |              |              |           |          |
| Salaries & Wages                      | 349,521      | 347,059      | 363,442      | 366,890      | 389,529      | 399,958      | 6.17%     | 2.68%    |
| Personnel Benefits                    | 199,031      | 95,371       | 165,418      | 163,085      | 175,229      | 182,586      | 7.45%     | 4.20%    |
| Supplies                              | 4.323.565    | 4,563,497    | 4,555,763    | 4,374,100    | 4,788,600    | 4,788,600    | 9.48%     | 0.00%    |
| Services                              | 1,484,120    | 704,694      | 246,052      | 259,617      | 278,548      | 302,957      | 7.29%     | 8.76%    |
| Intergov't Services & Taxes           | 1,057,474    | 1,107,991    | 1,103,790    | 1,002,000    | 1,113,700    | 1,113,700    | 11.15%    | 0.00%    |
| Total Operating Expenses              | 7,413,709    | 6,818,612    | 6,434,464    | 6,165,692    | 6,745,606    | 6,787,801    | 9.41%     | 0.63%    |
| CIP Expenses                          | , ,          | , ,          | , ,          | , ,          | , ,          | , ,          |           |          |
| Salaries & Wages                      | 35,912       | 35,905       | 32,381       | _            | _            | _            | 0.00%     | 0.00%    |
| Personnel Benefits                    | 14,204       | 15,168       | 10,236       |              | _            | _            | 0.00%     | 0.00%    |
| Supplies                              | - 11,201     | -            | 1.990        | _            | _            | _            | 0.00%     | 0.00%    |
| Services                              | 171,515      | 209,777      | 213,680      | 265,000      | 533,000      | 400,000      | 101.13%   | -24.95%  |
| Capital Outlay                        | 479,411      | 1,212,377    | 1,312,542    | 1,300,000    | 2,423,000    | 1,500,000    | 86.38%    | -38.09%  |
| Principal                             | 323,226      | 322,271      | 326,225      | 326,225      | 326,892      | 330,537      | 0.20%     | 1.12%    |
| Interest                              | 39,271       | 35,941       | 33,548       | 33,547       | 119,088      | 128,194      | 254.99%   | 7.65%    |
| Total Capital Expenses                | 1,063,538    | 1,831,438    | 1,930,602    | 1,924,772    | 3,401,980    | 2,358,731    | 76.75%    | -30.67%  |
| Non-Cash Accounting Adjustments       |              |              |              |              |              |              |           |          |
| Operating Prior Period Adjustment     | (398,495)    | -            | -            | -            | -            | -            | 0.00%     | 0.00%    |
| Capital Prior Period Adjustment       | 398,495      |              |              |              |              |              | 0.00%     | 0.00%    |
| Revenue Bond Refunding                | -            | 120,472      | -            | -            | -            | -            | 0.00%     | 0.00%    |
| GASB 68 Pension Adjustment            | -            | (14,269)     | -            | -            | -            | -            | 0.00%     | 0.00%    |
| Transfer Out for Debt Service         | -            | - '          | 22,708       | 49,200       | 76,399       | 76,399       | 55.28%    | 0.00%    |
| Indirect cost allocation              | 460,100      | 469,302      | 478,688      | 478,688      | 504,022      | 522,167      | 5.29%     | 3.60%    |
| Total Non-Cash Accounting Adjustments | 460,100      | 575,505      | 501,396      | 527,888      | 580,421      | 598,566      | 9.95%     | 3.13%    |
| Total Expenses                        | 8,937,348    | 9,225,555    | 8,866,462    | 8,618,352    | 10,728,007   | 9,745,097    | 24.48%    | -9.16%   |
| Change in Fund Balance                | 562,865      | 841,814      | 1,290,755    | 180,648      | (816,007)    | 166,903      | -551.71%  | -120.45% |
|                                       |              |              |              |              |              |              |           |          |

# **Capital Projects**

The capital projects listed below are capital projects planned for the 2019-2020 biennium. The year in which the project is estimated to be completed has been provided. Additional information on the projects may be found in the Capital Improvement Program section of the budget document as well as the Capital Improvement Program document, which is adopted annually.

|   | 2019            | 2020            | Anticipated |
|---|-----------------|-----------------|-------------|
| 2019-2020 Sewer Capital Projects          | Budget          | Budget          | Completion  |
| Annual Sewer Repair                       | \$<br>369,000   | \$<br>210,000   | N/A         |
| CBD Sanitary Sewer Rehabilitation         | 1,265,000       | 1,265,000       | 2021        |
| Fort Dent Park BNSF Sewer Relocation      | 972,000         | -               | 2019        |
| Sewer Repair West of Strander Blvd Bridge | 160,000         | _               | 2019        |
| Sewer Comprehensive Plan                  | 140,000         | 140,000         | 2020        |
| GIS Inventory of Sewer System             | 50,000          | 25,000          | 2020        |
| Sewer Lift Station No. 2 Upgrades         | -               | 260,000         | 2020        |
|   | \$<br>2,956,000 | \$<br>1,900,000 |             |

#### **Sewer Fund – Debt Service Requirements**

The following chart provides information on debt service requirements, by debt issue, for the biennium.

|                    |                    | Budget     |            |  |  |  |
|--------------------|--------------------|------------|------------|--|--|--|
| Debt Service       | Project            | 2019       | 2020       |  |  |  |
| 2015 Revenue Bonds | Allentown Phase II |            |            |  |  |  |
| Principal          |                    | \$ 93,456  | \$ 97,101  |  |  |  |
| Interest           |                    | 18,930     | 16,743     |  |  |  |
|                    |                    | 112,386    | 113,843    |  |  |  |
| PWTFL 2004         | Allentown Phase II |            |            |  |  |  |
| Principal          |                    | 192,261    | 192,261    |  |  |  |
| Interest           |                    | 5,768      | 4,807      |  |  |  |
|                    |                    | 198,029    | 197,067    |  |  |  |
| PWTFL 2014         | CBD Sewer Rehab    |            |            |  |  |  |
| Principal          |                    | 41,175     | 41,175     |  |  |  |
| Interest           |                    | 2,882      | 2,676      |  |  |  |
|                    |                    | 44,057     | 43,851     |  |  |  |
| Public Safety Plan | Public Works Shop  | s          |            |  |  |  |
| 2018 Bond Issuance |                    |            |            |  |  |  |
| Interest           |                    | 76,399     | 76,399     |  |  |  |
|                    | Total              | 76,399     | 76,399     |  |  |  |
| Public Safety Plan | Public Works Shop  | S          |            |  |  |  |
| 2019 Bond Issuance |                    |            |            |  |  |  |
| Interest           |                    | 12,469     | 24,938     |  |  |  |
|                    | Total              | 12,469     | 24,938     |  |  |  |
| Total Principal    |                    | 326,892    | 330,536    |  |  |  |
| Total Interest     |                    | 116,447    | 125,562    |  |  |  |
| Total Debt Service |                    | \$ 443,339 | \$ 456,098 |  |  |  |

Amortization of premiums and discounts are not included in this schedule but are included in the Revenue and Expense Summary statement.

## **Expenditure Detail - Salaries and Benefits**

Salaries for budgeted positions are based on actual costs for existing positions and include a cost of living adjustment per contract agreements.

| Sewer                      |      |      |            |                |      |            |            |  |  |  |  |  |
|----------------------------|------|------|------------|----------------|------|------------|------------|--|--|--|--|--|
| Position                   | 2018 | 2019 | 2019 E     | Budget         | 2020 | 2020 E     | Budget     |  |  |  |  |  |
| Description                | FTE  | FTE  | Salaries   | aries Benefits |      | Salaries   | Benefits   |  |  |  |  |  |
| Maint & Ops Superintendent | 0.5  | 0.5  | \$ 48,687  | \$ 15,464      | 0.5  | \$ 52,141  | \$ 16,510  |  |  |  |  |  |
| Maint & Ops Foreman        | 1    | 1    | 86,243     | 44,953         | 1    | 88,128     | 46,832     |  |  |  |  |  |
| Sr Maint & Ops Specialist  | 1    | 1    | 80,913     | 36,200         | 1    | 82,488     | 37,632     |  |  |  |  |  |
| Maint & Ops Specialist     | 1.5  | 1.5  | 112,637    | 59,454         | 1.5  | 115,044    | 61,961     |  |  |  |  |  |
| Senior Engineer            | 0.5  | -    | -          | -              | -    | -          | -          |  |  |  |  |  |
| Development Manager        | 0    | 0.4  | 56,608     | 18,147         | 0.4  | 57,715     | 18,640     |  |  |  |  |  |
| Overtime                   |      |      | 4,442      | 440            |      | 4,442      | 440        |  |  |  |  |  |
| Clothing Allowance         |      |      |            | 570            |      |            | 570        |  |  |  |  |  |
| Department Total           | 4.5  | 4.4  | \$ 389,529 | \$ 175,229     | 4.4  | \$ 399,958 | \$ 182,586 |  |  |  |  |  |

#### **Sewer Operations and Maintenance Capital**

The Sewer Department operations and maintenance capital purchases for 2019 include a portion of the purchase of a slope mower. The total purchase is \$43,000 with 30% of the cost (\$13,000) funded by Sewer and 70% (\$30,000) by Surface Water. The Spider Slope Mower will assist the crew maintain easements and ponds throughout the city where there is a steep terrain.

#### **Expenditure Detail - Supplies, Services, and Other**

Supplies include miscellaneous operating supplies specific to sewer work and Metro Sewer charges. Services include engineering, surveying, utilities, rental of equipment, repair and maintenance charges, insurance, and credit card fees, among others. Intergovernmental includes excise tax and interfund utility tax paid to the general fund.

|  | Sewer - Administration |           |    |           |           |        |          |           |           |  |  |  |
|--|------------------------|-----------|----|-----------|-----------|--------|----------|-----------|-----------|--|--|--|
|  |                        |           | Ac | tual      |           | Budget |          |           |           |  |  |  |
|  |                        |           |    |           | Projected |        |          |           |           |  |  |  |
| Account Number   |                        | 2016      |    | 2017      | 2018      |        | 2018     | 2019      | 2020      |  |  |  |
| 402.01.535.800.31.00 Supplies -                                  | \$                     | 14        | \$ | 1,956     | \$ -      | \$     | -        | \$ -      | \$ -      |  |  |  |
| 402.01.535.800.31.01 Supplies - Office & Safety                  |                        | 2,283     |    | 2,025     | 1,988     |        | 2,000    | 3,000     | 3,000     |  |  |  |
| 402.01.535.800.31.02 Supplies - Operating                        |                        | 11,384    |    | 7,893     | 13,552    |        | 12,600   | 11,600    | 11,600    |  |  |  |
| 402.01.535.800.31.03 Supplies - Repairs & Maintenance            |                        | 3,308     |    | 1,722     | 2,737     |        | 4,000    | 4,000     | 4,000     |  |  |  |
| 402.01.535.800.31.04 Supplies - Billing                          |                        | 2,106     |    | 2,509     | 1,748     |        | 3,000    | 3,000     | 3,000     |  |  |  |
| 402.01.535.800.33.00 Supplies - Metro Sewage Treatment           |                        | 4,298,620 | 4  | 4,545,957 | 4,535,071 | 4      | ,350,000 | 4,762,000 | 4,762,000 |  |  |  |
| 402.01.535.800.35.00 Supplies - Small Tools & Minor<br>Equipment |                        | 2,983     |    | 1,435     | 668       |        | 2,500    | 2,500     | 2,500     |  |  |  |
| 402.01.535.800.35.01 Supplies - Traffic Control Devices          |                        | 2,866     |    | -         | -         |        | -        | 2,500     | 2,500     |  |  |  |
| Total Supplies   |                        | 4,323,565 | 4  | 4,563,497 | 4,555,763 | 4      | ,374,100 | 4,788,600 | 4,788,600 |  |  |  |

# **Expenditure Detail - Supplies, Services, and Other, Continued**

| Sewer -   | Admini | stration | Continued   |             | -           |             |             |
|---|--------|----------|-------------|-------------|-------------|-------------|-------------|
|   |        |          | Actual      |             |             | Budget      |             |
|   |        |          |             | Projected   |             |             |             |
| Account Number  | 20     | 16       | 2017        | 2018        | 2018        | 2019        | 2020        |
| 402.01.535.800.41.00 Prof Svcs - Consultant engineering                                       |        | 68,386   | 3,909       | 620         | 1,000       | 1,000       | 1,000       |
| services, surveying   |        | 00,000   | 0,000       | 020         | .,,,,,      | 1,000       | .,000       |
| 402.01.535.800.41.01 Prof Svcs - Utility one call services for utility line locates           |        | 527      | 632         | 515         | 300         | 700         | 700         |
| 402.01.535.800.41.02 Prof Svcs - CDL licenses, hearing tests                                  |        | 272      | 51          | 349         | 300         | 300         | 300         |
| 402.01.535.800.41.04 Prof Svcs - TV Equipment Software  |        |          | -           | 1,000       | 1,000       | 1,000       | 1,000       |
| 402.01.535.801.41.00 Prof Svcs - Project costs  |        | 271,976  | 108,642     | -           | -           | -           | -           |
| 402.01.535.800.42.00 Communication - Phone bills and Nextels                                  |        | 1,680    | 600         | 1,647       | 2,500       | 2,500       | 2,500       |
| 402.01.535.800.43.00 Travel - Mileage, meals, parking   |        | 687      | 2,076       | 1,004       | 2,000       | 2,000       | 2,000       |
| 402.01.535.800.44.00 Advertising - Advertising for seasonal help                              |        |          |             | 150         | 150         | 150         | 150         |
| and staff replacement   |        | -        | -           | 150         | 150         | 130         | 150         |
| 402.01.535.800.45.00 Rental - Rental of backhoes, trackhoes,                                  |        | (6)      | 13          | 593         | 2,000       | 2,000       | 2,000       |
| loader, and forklifts<br>402.01.535.800.45.94 Rental - Equipment Replacement Fund             |        | 52.487   | 29,783      | 52.195      | 52.195      | 56,292      | 74,230      |
| 402.01.535.800.45.95 Rental - Equipment Rental O & M  |        | 24,306   | 28,720      | 50,726      | 50,726      | 34,638      | 37,410      |
| 402.01.535.800.46.00 Insurance - WCIA   |        |          | -           | -           | -           | -           | -           |
| 402.01.535.800.46.01 Insurance - WCIA   |        | 19,465   | 4,952       | 5,470       | 5,446       | 10,968      | 12,667      |
| 402.01.535.800.47.00 Public Utility - Electrical, gas, water, and                             |        | ,        | ,           |             |             | ,           | •           |
| sewer from lift stations  |        | 1,111    | 150         | 1,000       | 1,000       | 1,000       | 1,000       |
| 402.01.535.800.47.02 Public Utility - Waste Materials Disposal                                |        | -        | -           | 4,000       | 4,000       | 3,000       | 3,000       |
| 402.01.535.800.47.21 Public Utility - Electric  |        | 17,025   | 18,093      | 18,257      | 16,000      | 20,000      | 21,000      |
| 402.01.535.800.47.25 Public Utility - Water and Sewer   |        | 16,814   | 16,755      | 17,221      | 17,000      | 19,000      | 20,000      |
| 402.01.535.800.48.00 R&M - Pump station repairs and   |        | 45,216   | 31,776      | 14,068      | 24,000      | 24,000      | 24,000      |
| replacement done by outside vendors 402.01.535.800.48.01 R&M - Painting of sewer pump station |        | ,        | ,           | ,           | ,           | ,           | ,           |
| interiors   |        | -        | =           | 7,500       | 12,500      | 12,500      | 12,500      |
| 402.01.535.800.48.03 R&M - Repairs of sewer main lines  |        | 153      | _           | -           | 2,500       | 2,500       | 2,500       |
| 402.01.535.800.48.04 R&M - Sewer pump station computer  |        | 1,881    | 3,120       | 7,559       | 10,000      | 10,000      | 10,000      |
| alarm system  |        | 1,001    | 3,120       | 7,559       | 10,000      | 10,000      | 10,000      |
| 402.01.535.801.44.00 Advertising  |        | -        | 858         | -           | -           | -           | -           |
| 402.01.535.801.48.00 R&M - Equipment  |        | 906,022  | 391,714     | -           | -           | -           | -           |
| 402.01.535.800.49.00 Misc - Training, classes, minor software purchases                       |        | 2,089    | 1,763       | 4,125       | 5,000       | 5,000       | 5,000       |
| 402.01.535.800.49.08 Misc - PPI credit card fees  |        | 54,030   | 61,088      | 58,053      | 50,000      | 70,000      | 70,000      |
| Total Services  | 1      | ,484,120 | 704,694     | 246,052     | 259,617     | 278,548     | 302,957     |
| 402.01.535.800.53.00 Ext Taxes & Operating Assmnts  |        | 137,700  | 136,301     | 140,401     | 135,000     | 135,000     | 135,000     |
| 402.01.535.800.54.02 Interfund Taxes - Interfund Utility Tax                                  |        | 919,774  | 971,689     | 963,389     | 867,000     | 978,700     | 978,700     |
| Total Intergovernmental   | 1      | ,057,474 | 1,107,991   | 1,103,790   | 1,002,000   | 1,113,700   | 1,113,700   |
| Total Supplies, Services and Other  | \$ 6   | ,865,158 | \$6,376,182 | \$5,905,604 | \$5,635,717 | \$6,180,848 | \$6,205,257 |

Services include construction management for capital projects. Capital includes capital projects related to the sewer fund.

| Se   | ewer | - Capital Ou | ıtlays      |             |             |             |             |  |
|--|------|--------------|-------------|-------------|-------------|-------------|-------------|--|
|  |      |              | Actual      |             | Budget      |             |             |  |
|  |      |              |             | Projected   |             |             |             |  |
| Account Number   |      | 2016         | 2017        | 2018        | 2018        | 2019        | 2020        |  |
| 402.98.594.353.31.00 Supplies -Office and Operating      | \$   | -            | \$ -        | \$ 1,990    | \$ -        | \$ -        | \$ -        |  |
| Total Supplies   |      | -            | -           | 1,990       | -           | -           |             |  |
| 402.98.594.353.41.00 Prof Svcs - Construction management |      | 170,175      | 209,757     | 213,529     | 265,000     | 533,000     | 400,000     |  |
| 402.98.594.353.44.00 Advertising - Bid ads               |      | -            | -           | 151         | -           | -           | -           |  |
| Total Services   |      | 171,515      | 209,777     | 213,680     | 265,000     | 533,000     | 400,000     |  |
| 402.01.594.350.64.00 Capital - Machinery & Equipment     |      | -            | 6,364       | -           | -           | 13,000      | -           |  |
| 402.98.594.353.64.00 Capital - Machinery & Equipment     |      | -            | -           | 5,194       | -           | -           | -           |  |
| 402.98.594.353.65.00 Capital - Construction Projects     |      | 479,411      | 1,206,013   | 1,307,349   | 1,300,000   | 2,423,000   | 1,500,000   |  |
| Total Other  |      | 479,411      | 1,212,377   | 1,312,542   | 1,300,000   | 2,436,000   | 1,500,000   |  |
| Total Capital Outlay                                     | \$   | 650,926      | \$1,422,154 | \$1,528,213 | \$1,565,000 | \$2,969,000 | \$1,900,000 |  |

# City of Tukwila CAPITAL IMPROVEMENT PROGRAM

2017 - 2022

# SEWER ENTERPRISE FUND 402.98

| CIP<br>Page # | PROJECT TITLE                              | 2019  | 2020  | 2021  | 2022 | 2023 | 2024  | TOTAL | *Other<br>Sources | After Six<br>Years |
|---------------|--|-------|-------|-------|------|------|-------|-------|-------------------|--------------------|
|               |  |       |       |       |      |      |       |       |                   |                    |
| 76            | Annual Sewer Repair Program                | 369   | 210   | 200   | 200  | 200  | 200   | 1,379 | 0                 | 200                |
| 77            | CBD Sanitary Sewer Rehabilitation          | 1,265 | 1,265 | 665   | 0    | 0    | 0     | 3,195 | 0                 | 0                  |
| 78            | Fort Dent Park BNSF Sewer Relocation       | 972   | 0     | 0     | 0    | 0    | 0     | 972   | 0                 | 0                  |
| 79            | Sewer Repair West of Strander Blvd Bridge  | 160   | 0     | 0     | 0    | 0    | 0     | 160   | 0                 | 0                  |
| 80            | Sewer Comprehensive Plan                   | 140   | 140   | 0     | 0    | 0    | 0     | 280   | 0                 | 0                  |
| 81            | GIS Inventory of Sewer System              | 50    | 25    | 0     | 0    | 0    | 0     | 75    | 0                 | 500                |
| 82            | Southcenter Blvd Sewer Upgrade             | 0     | 0     | 180   | 0    | 0    | 0     | 180   | 0                 | 1,647              |
| 83            | Sewer Lift Stations & Generator Upgrades   | 0     | 0     | 100   | 460  | 460  | 810   | 1,830 | 0                 | 960                |
| 84            | Sewer Lift Station No. 2 Upgrades          | 0     | 260   | 710   | 0    | 0    | 0     | 970   | 0                 | 7,100              |
| 85            | Sewer Replacement at 14025 Interurban Ave  | 0     | 0     | 0     | 75   | 0    | 0     | 75    | 0                 | 865                |
| 86            | Future Sewer Lift Station No. 13           | 0     | 0     | 0     | 0    | 278  | 0     | 278   | 0                 | 2,520              |
|               | Valley View West Hill Sewer Transfer Area  | 0     | 0     | 0     | 0    | 0    | 0     | 0     | 0                 | 0                  |
|               | Abandon Sewer Lift Station No. 9           | 0     | 0     | 0     | 0    | 0    | 0     | 0     | 0                 | 1,120              |
|               | Sewer Lift Station No. 12                  | 0     | 0     | 0     | 0    | 0    | 0     | 0     | 0                 | 4,400              |
|               | APW Sewer connection to KC Metro           | 0     | 0     | 0     | 0    | 0    | 0     | 0     | 0                 | 300                |
|               | Sewer Repair at 14438 59th Ave S           | 0     | 0     | 0     | 0    | 0    | 0     | 0     | 0                 | 550                |
|               | Allentown Phase III - Sewer Revitalization | 0     | 0     | 0     | 0    | 0    | 0     | 0     | 0                 | 1,440              |
|               | Ryan Hill - Sewer Revitalization           | 0     | 0     | 0     | 0    | 0    | 0     | 0     | 0                 | 1,900              |
|               | Grand Total                                | 2,956 | 1,900 | 1,855 | 735  | 938  | 1,010 | 9,394 | 0                 | 23,502             |

<sup>\*\*</sup> Denotes other funding sources, grants, or mitigation.

#### Changes from 2017 to 2019 CIP:

Deleted

Andover Park East Sewer Replacement, completed in 2018. 53rd Ave S Sewer Rehabilitation, sewer completed in 2018.

Project sheets scheduled beyond 2024 can be found in the City's website under Public Works Capital Improvement Program.

| Sewer Lift Station Locations                |   |
|---|---|
| Lift Station No. 1 - Master Telemetry Panel | 600 Minkler Blvd Shops                              |
| Lift Station No. 2 - Backup Dialer          | 1105 Andover Pk W (at Minkler Blvd)                 |
| Lift Station No. 3                          | 550 Minkler Blvd                                    |
| Lift Station No. 4                          | 6790 Todd Blvd - Southcenter South                  |
| Lift Station No. 5                          | 6830 Fort Dent Way (entrance to Park)               |
| Lift Station No. 6                          | 6820 Fort Dent Way (only serves Park)               |
| Lift Station No. 7 - Abandoned in 2011      | was at 14601 Interurban - replaced by gravity sewer |
| Lift Station No. 8                          | 13359 56th Ave S - Foster Point (new in 2007)       |
| Lift Station No. 9                          | 12638 Interurban - Suburban Propane                 |
| Lift Station No. 10                         | 12218 51st PI S - Allentown (new in 2007)           |
| Lift Station No. 11                         | 18799 Southcenter Pkwy (new in 2012)                |
| Lift Station No. 12                         | 255 Andover Park W - Key Bank parking lot at mall   |
| Lift Station No. 13                         | Future - Tukwila Pkwy & Andover Park W              |

2019 to 2024

PROJECT: Annual Sewer Repair Program Project No. Varies

**DESCRIPTION:**Reduce sewer line infiltration and inflow (I & I) through groundwater intrusion or storm events as a

result of damaged deteriorating systems or illicit connections. Include small repairs and capital maintenance.

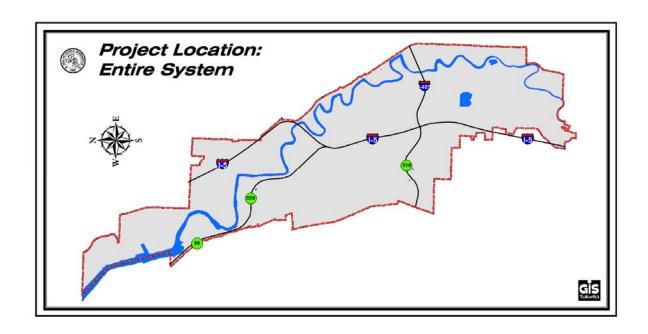
JUSTIFICATION: Decrease treatment, discharge, and pumping costs.

**STATUS:** Annual program is determined after pipeline TV inspection reports are completed.

**MAINT. IMPACT:** Less maintenance costs through rehabilitation of aging system.

**COMMENT:** Ongoing project, only one year actuals shown in first column.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 3       | 15        | 10   | 10   |      |      |      |      |        | 38    |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      |      |      |        | 0     |
| Construction        | 0       |           | 359  | 200  | 200  | 200  | 200  | 200  | 200    | 1,559 |
| TOTAL EXPENSES      | 3       | 15        | 369  | 210  | 200  | 200  | 200  | 200  | 200    | 1,597 |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 3       | 15        | 369  | 210  | 200  | 200  | 200  | 200  | 200    | 1,597 |
| TOTAL SOURCES       | 3       | 15        | 369  | 210  | 200  | 200  | 200  | 200  | 200    | 1,597 |



2019 to 2024

PROJECT: CBD Sanitary Sewer Rehabilitation Project No. 91140203

**DESCRIPTION:**The asbestos concrete pipe in the CBD (commercial business district) is approximately 45 years old and

becoming soft. Slip lining the pipe will reinforce the strength with little impact to roadways and minimal excavation.

JUSTIFICATION:

If the pipe collapses, the street will have to be excavated and the cost of the repairs will be significant. In the last five years we have had four major pipe failures on Andover Park West and Andover Park East.

In 2014 and 2015, over 10,500 feet of asbestos sanitary sewer pipe were relined. In 2016 through 2018,

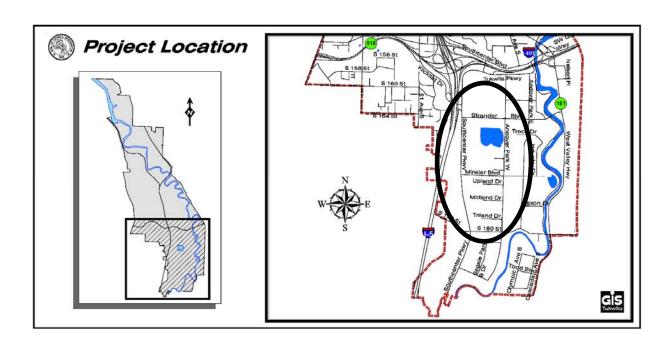
20,000 feet of asbestos sewer is scheduled to be relined.

MAINT. IMPACT: Reduced maintenance and repair costs.

STATUS:

**COMMENT:** A Public Works Trust Fund loan was successfully obtained in 2012 for \$750k.

| FINANCIAL           | Through | Estimated |       |       |      |      |      |      |        |       |
|---------------------|---------|-----------|-------|-------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019  | 2020  | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |       |       |      |      |      |      |        |       |
| Design              | 394     | 50        | 45    | 45    | 40   |      |      |      |        | 574   |
| Land (R/W)          | 1       |           |       |       |      |      |      |      |        | 1     |
| Const. Mgmt.        | 310     | 85        | 120   | 120   | 75   |      |      |      |        | 710   |
| Construction        | 1,983   | 539       | 1,100 | 1,100 | 550  |      |      |      |        | 5,272 |
| TOTAL EXPENSES      | 2,688   | 674       | 1,265 | 1,265 | 665  | 0    | 0    | 0    | 0      | 6,557 |
| FUND SOURCES        |         |           |       |       |      |      |      |      |        |       |
| Awarded Grant       |         |           |       |       |      |      |      |      |        | 0     |
| PW Trust Fund       | 750     |           |       |       |      |      |      |      |        | 750   |
| Mitigation Actual   |         |           |       |       |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |       |       |      |      |      |      |        | 0     |
| Utility Revenue     | 1,938   | 674       | 1,265 | 1,265 | 665  | 0    | 0    | 0    | 0      | 5,807 |
| TOTAL SOURCES       | 2,688   | 674       | 1,265 | 1,265 | 665  | 0    | 0    | 0    | 0      | 6,557 |



2019 to 2024

PROJECT: Fort Dent Park BNSF Sewer Relocation Project No. 91530101

**DESCRIPTION:** The installation of 510 fee of sewer force main under the BNSF railroad tracks.

JUSTIFICATION:

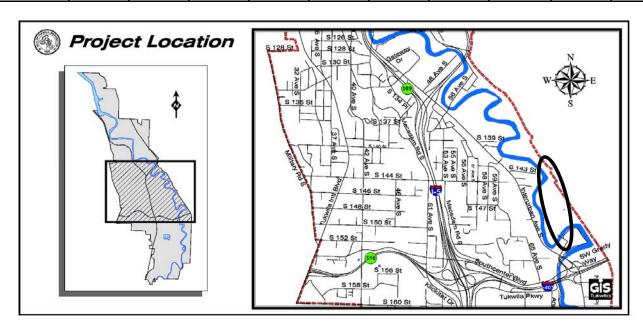
The BNSF Railroad is constructing a third set of tracks and is requiring that the City relocate the sewer

force main under the railroad tracks.

**STATUS:** Funding is required for the sewer relocation that was installed in 1975.

**MAINT. IMPACT:** Normal maintenance once relocated.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 169     | 15        |      |      |      |      |      |      |        | 184   |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           | 128  |      |      |      |      |      |        | 128   |
| Construction        |         |           | 844  |      |      |      |      |      |        | 844   |
| TOTAL EXPENSES      | 169     | 15        | 972  | 0    | 0    | 0    | 0    | 0    | 0      | 1,156 |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 169     | 15        | 972  | 0    | 0    | 0    | 0    | 0    | 0      | 1,156 |
| TOTAL SOURCES       | 169     | 15        | 972  | 0    | 0    | 0    | 0    | 0    | 0      | 1,156 |



2019 to 2024

PROJECT: Sewer Repair West of Strander Blvd Bridge Project No. 90840203

**DESCRIPTION:** Repair cracked and sunken sewer line west of Strander Blvd bridge.

JUSTIFICATION:

If the sewer line collapses, the sewer will back up, causing property damage. Relining other mains in the area can not be done until this require is completed.

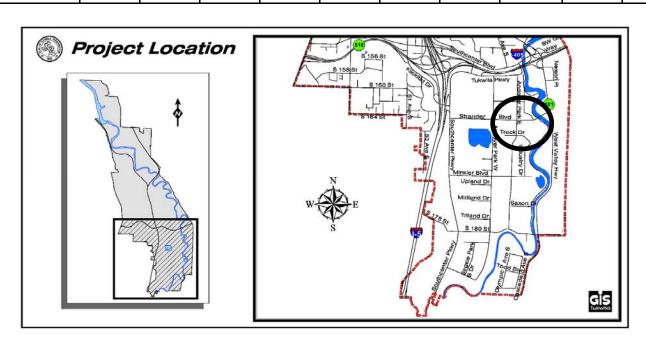
in the area can not be done until this repair is completed.

**STATUS:** Line was damaged during installation of storm drain in 2004.

**MAINT. IMPACT:** 

**COMMENT:** Project will require dewatering due to the depth of 25 ft., soils, and the proximity to the Green River.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        | -     |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 2       |           | 20   |      |      |      |      |      |        | 22    |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           | 20   |      |      |      |      |      |        | 20    |
| Construction        |         |           | 120  |      |      |      |      |      |        | 120   |
| TOTAL EXPENSES      | 2       | 0         | 160  | 0    | 0    | 0    | 0    | 0    | 0      | 162   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 2       | 0         | 160  | 0    | 0    | 0    | 0    | 0    | 0      | 162   |
| TOTAL SOURCES       | 2       | 0         | 160  | 0    | 0    | 0    | 0    | 0    | 0      | 162   |



2019 to 2024

**PROJECT: Sewer Comprehensive Plan** Project No. 91040202

Prepare new Sewer Comprehensive Plan incorporating any new or regulatory Growth Management **DESCRIPTION:** 

Act Comprehensive Plan issues related to sewer.

Sewer Comprehensive Plan needs to be consistent with City Comprehensive Plan, Department of JUSTIFICATION:

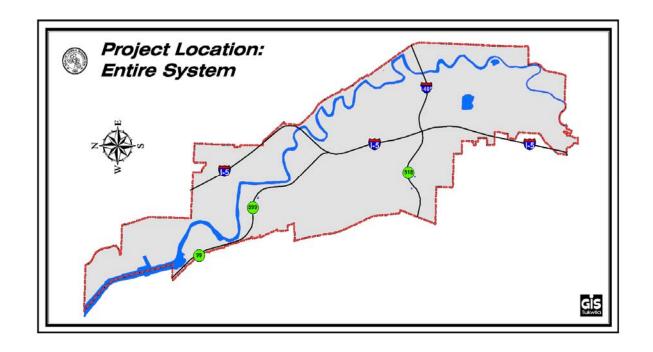
Ecology and Department of Health. Update is required every 6 years.

2013 Sewer update was adopted by Council on 6/2/14. Next update is scheduled for 2021. STATUS:

MAINT. IMPACT:

**COMMENT:** 

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 158     |           | 140  | 140  |      |      |      |      |        | 438   |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      |      |      |        | 0     |
| Construction        |         |           |      |      |      |      |      |      |        | 0     |
| TOTAL EXPENSES      | 158     | 0         | 140  | 140  | 0    | 0    | 0    | 0    | 0      | 438   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 158     | 0         | 140  | 140  | 0    | 0    | 0    | 0    | 0      | 438   |
| TOTAL SOURCES       | 158     | 0         | 140  | 140  | 0    | 0    | 0    | 0    | 0      | 438   |



2019 2024

**PROJECT: GIS Inventory of Sewer System** Project No. 80540202

GIS (Geographic Information Systems) provides current as-built data for the sanitary sewer system in the Central **DESCRIPTION:** 

Business District. This project will expand the as-built database for Tukwila's entire sewer system.

GIS mapping of the sewers will provide information that is easily addressable by City staff and the public. With the JUSTIFICATION:

GIS data, the City will be able to develop an asset management plan to determine the sewer assets that need to

be upgraded or replaced.

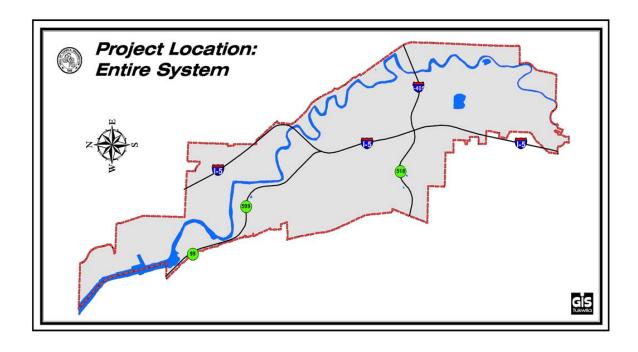
In 2007, the Commercial Business District (CBD) was surveyed for GIS mapping. Full data collection should be STATUS:

completed by 2019. Combined Asset Management System in 2017.

The survey will provide staff with up-to-date information on the location of manholes for the sanitary sewers. MAINT. IMPACT:

#### **COMMENT:**

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 169     | 75        | 50   | 25   |      |      |      |      | 500    | 819   |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      |      |      |        | 0     |
| Construction        |         |           |      |      |      |      |      |      |        | 0     |
| TOTAL EXPENSES      | 169     | 75        | 50   | 25   | 0    | 0    | 0    | 0    | 500    | 819   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        | ,     |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 169     | 75        | 50   | 25   | 0    | 0    | 0    | 0    | 500    | 819   |
| TOTAL SOURCES       | 169     | 75        | 50   | 25   | 0    | 0    | 0    | 0    | 500    | 819   |



2019 2024

**PROJECT: Southcenter Blvd Sewer Upgrade** Project No. 99840202

Upgrade 3,200 LF of 8" to a larger capacity 12" system from Macadam Rd to the I-405 undercrossing **DESCRIPTION:** 

on Southcenter Blvd.

Flows have greatly increased with additional connections to the basin from the North Hill apartment JUSTIFICATION:

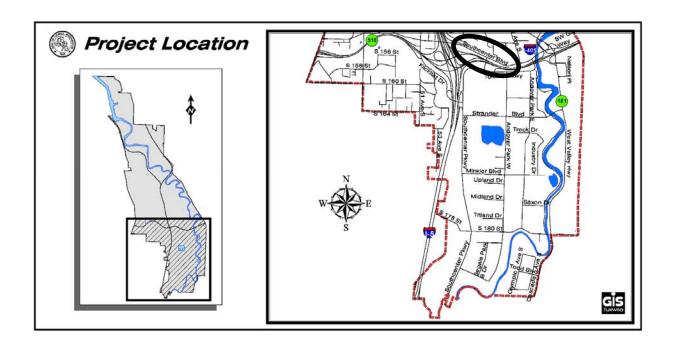
buildings causing the system to be deficient in terms of capacity for peak discharges.

STATUS:

Improved service would reduce maintenance liability. MAINT. IMPACT:

**COMMENT:** Coordinate with I-405 improvements to Southcenter Blvd and Future Lift Station No. 13.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              |         |           |      |      | 180  |      |      |      |        | 180   |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      |      |      | 207    | 207   |
| Construction        |         |           |      |      |      |      |      |      | 1,440  | 1,440 |
| TOTAL EXPENSES      | 0       | 0         | 0    | 0    | 180  | 0    | 0    | 0    | 1,647  | 1,827 |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Bond/PWTF Loan      |         |           |      |      |      |      |      |      | 1,380  | 1,380 |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 0       | 0         | 0    | 0    | 180  | 0    | 0    | 0    | 267    | 447   |
| TOTAL SOURCES       | 0       | 0         | 0    | 0    | 180  | 0    | 0    | 0    | 1,647  | 1,827 |



2019 to 2024

PROJECT: Sewer Lift Stations & Generator Upgrades Project No. 90440206

**DESCRIPTION:** This funding will be used to replace/upgrade the seven sewer lift stations and backup generators in phases.

JUSTIFICATION:

Aging system requires the replacement of motors, pumps, and controls at older lift stations to reduce

maintenance. Generators have a lifespan of 15 years and need to be replaced more frequently than pumps.

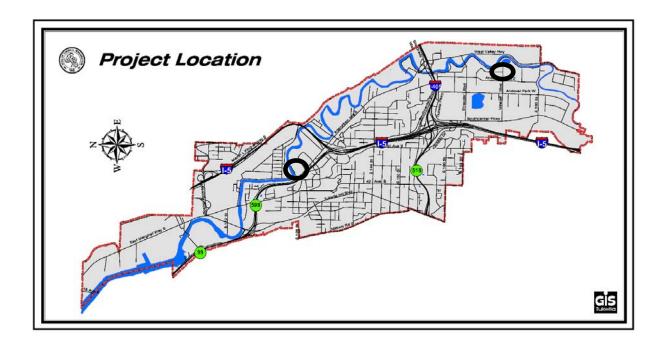
STATUS: Sewer Lift Stations No. 3 & 4 are at the end of their life cycles and need to be rebuilt with backup generators

and are scheduled for 2021/22. Lift Station No. 5 is in beyond.

MAINT. IMPACT: New pumps will reduce the liability of the existing pumps that are obsolete and prone to fail.

**COMMENT:** Additional right-of-way or property will be required for the new backup generators to be installed.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              |         |           |      |      | 100  |      |      |      | 150    | 250   |
| Generators          |         |           |      |      |      | 10   | 10   | 10   | 10     | 40    |
| Const. Mgmt.        |         |           |      |      |      | 50   | 50   | 100  | 100    | 300   |
| Construction        |         |           |      |      |      | 400  | 400  | 700  | 700    | 2,200 |
| TOTAL EXPENSES      | 0       | 0         | 0    | 0    | 100  | 460  | 460  | 810  | 960    | 2,790 |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 0       | 0         | 0    | 0    | 100  | 460  | 460  | 810  | 960    | 2,790 |
| TOTAL SOURCES       | 0       | 0         | 0    | 0    | 100  | 460  | 460  | 810  | 960    | 2,790 |



2019 to 2024

PROJECT: Sewer Lift Station No. 2 Upgrades Project No. 90440205

DESCRIPTION: Install new pumps, motors, control system, backup generator and 2,700 LF of force main from

Minkler Blvd. to Strander Blvd.

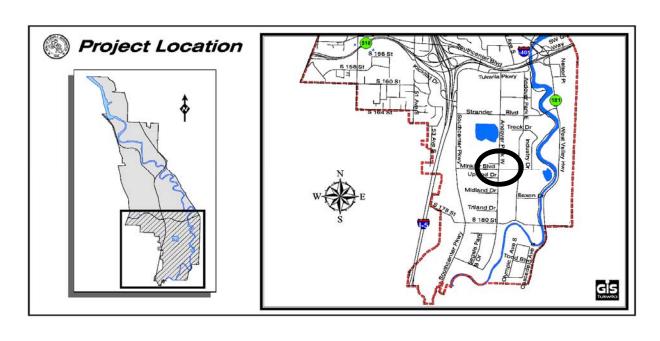
**JUSTIFICATION:** The lift station upgrade will be required upon full development of Tukwila South.

**STATUS:** Generator replacement, concrete slab, and replacement of pump's motor control system are scheduled in 2020.

**MAINT. IMPACT:** Reduce liability if the existing slab breaks the power connection.

**COMMENT:** See Tukwila South development agreement for funding and ULID requirements.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 97      | 16        |      |      |      |      |      |      | 100    | 213   |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      | 60   | 60   |      |      |      | 1,000  | 1,120 |
| Construction        | 35      |           |      | 200  | 650  |      |      |      | 6,000  | 6,885 |
| TOTAL EXPENSES      | 132     | 16        | 0    | 260  | 710  | 0    | 0    | 0    | 7,100  | 8,218 |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Bond/ULID  |         |           |      |      |      |      |      |      | 7,100  | 7,100 |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 132     | 16        | 0    | 260  | 710  | 0    | 0    | 0    | 0      | 1,118 |
| TOTAL SOURCES       | 132     | 16        | 0    | 260  | 710  | 0    | 0    | 0    | 7,100  | 8,218 |



2019 to 2024

PROJECT: Sewer Replacement at 14025 Interurban Ave S Project No. 90540209

Replace 1,500 LF of 8" sewer line with a 12" line at 14025 Interurban Ave S from the Golden Nugget to

the Foster Green Apartments.

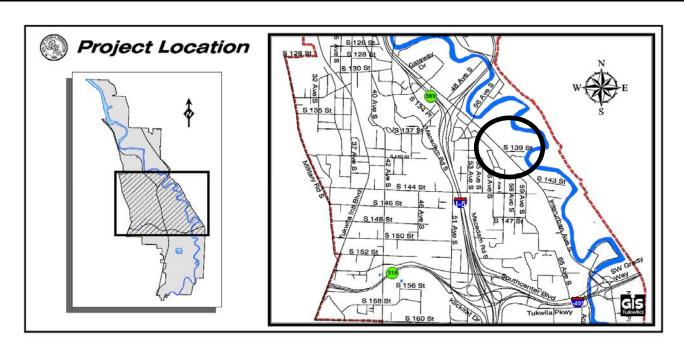
**JUSTIFICATION:** The existing main has sags and is undersized.

STATUS:

MAINT. IMPACT: Reduced maintenance costs.

**COMMENT:** 

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              |         |           |      |      |      | 75   |      |      |        | 75    |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      |      |      | 115    | 115   |
| Construction        |         |           |      |      |      |      |      |      | 750    | 750   |
| TOTAL EXPENSES      | 0       | 0         | 0    | 0    | 0    | 75   | 0    | 0    | 865    | 940   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 0       | 0         | 0    | 0    | 0    | 75   | 0    | 0    | 865    | 940   |
| TOTAL SOURCES       | 0       | 0         | 0    | 0    | 0    | 75   | 0    | 0    | 865    | 940   |



2019 to 2024

PROJECT: Future Sewer Lift Station No. 13 Project No. 99740205

Due to utility conflicts with existing utilities, a new sewer lift station will be required near 65th Ave S and

Southcenter Blvd. A gravity sewer main is not possible under I-405.

JUSTIFICATION: Existing line is undersized and has a severe sag. Increased development on the North Hill exacerbates

the deficiency.

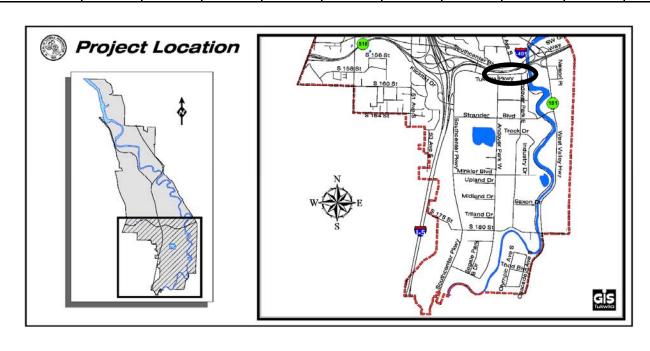
**STATUS:** Design will be coordinated with WSDOT and Seattle Public Utilities.

MAINT. IMPACT: Less flushing maintenance to clear debris from sag and from the improved HOV manhole alignment.

COMMENT: Other alternatives are being reviewed due to WSDOT requirements. Formerly known as Gravity Sewer

under I-405 to Tukwila Parkway.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 77      |           |      |      |      |      | 278  |      |        | 355   |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      |      |      | 320    | 320   |
| Construction        |         |           |      |      |      |      |      |      | 2,200  | 2,200 |
| TOTAL EXPENSES      | 77      | 0         | 0    | 0    | 0    | 0    | 278  | 0    | 2,520  | 2,875 |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Bond                |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 77      | 0         | 0    | 0    | 0    | 0    | 278  | 0    | 2,520  | 2,875 |
| TOTAL SOURCES       | 77      | 0         | 0    | 0    | 0    | 0    | 278  | 0    | 2,520  | 2,875 |



# **ATTACHMENT F**

# City of Tukwila

# **SURFACE WATER ENTERPRISE FUND**

2019 - 2024 Analysis in 000's

| REVENUES                               | 2015<br>Actual | 2016<br>Actual | 2017<br>Actual | 2018<br>Budget | 2018<br>Estimate | 2019  | 2020  | 2021   | 2022   | 2023  | 2024  | Total  |
|--|----------------|----------------|----------------|----------------|------------------|-------|-------|--------|--------|-------|-------|--------|
|  | +20%           | +15%           | +5%            | +3%            |                  | +5%   | +3%   | +5%    | +3%    | +5%   | +3%   |        |
| Annual Billings (Current) (1)          | 5,086          | 5,851          | 6,148          | 6,300          | 6,347            | 6,663 | 6,863 | 7,206  | 7,422  | 7,793 | 8,027 | 43,974 |
| Other Revenues                         | 28             | 298            | 157            | 30             | 50               | 40    | 50    | 50     | 60     | 65    | 70    | 335    |
| Grants/Bond Proceeds (2)               | 789            | 147            | 194            | 2,656          | 150              | 2,367 | 1,077 | 3,277  | 6,148  | 188   | 129   | 13,186 |
| Total Revenues                         | 5,903          | 6,296          | 6,499          | 8,986          | 6,547            | 9,070 | 7,990 | 10,533 | 13,630 | 8,046 | 8,226 | 57,495 |
| EXPENDITURES                           |                |                |                |                |                  |       |       | ,      |        |       |       |        |
| Operations & Maintenance               | 1,909          | 1,996          | 2,033          | 2,139          | 2,139            | 2,414 | 2,330 | 2,360  | 2,454  | 2,552 | 2,654 | 14,764 |
| Debt Service (3)                       | 316            | 305            | 303            | 303            | 303              | 301   | 300   | 298    | 285    | 283   | 282   | 2,031  |
| Debt Service for PW Shops              |                |                |                | 116            | 703              | 220   | 251   | 560    | 560    | 560   | 560   | 2,711  |
| Interfund Utility Tax (4) 10%          | 510            | 587            | 617            | 636            | 640              | 670   | 691   | 726    | 748    | 786   | 810   | 4,431  |
| Engineering Labor <sup>(6)</sup>       | 344            | 217            | 208            | 573            | 310              | 590   | 607   | 621    | 640    | 659   | 679   | 3,796  |
| Subtotal                               | 3,079          | 3,105          | 3,161          | 3,767          | 4,095            | 4,195 | 4,179 | 4,565  | 4,687  | 4,840 | 4,985 | 27,451 |
| SSWM Capital - CIP Program             | 2,662          | 2,117          | 3,098          | 4,963          | 4,406            | 4,400 | 2,751 | 5,504  | 7,639  | 2,151 | 2,202 | 24,647 |
| Total Expenditures                     | 5,741          | 5,222          | 6,259          | 8,730          | 8,501            | 8,595 | 6,930 | 10,069 | 12,326 | 6,991 | 7,187 | 52,098 |
| FUND BALANCE                           |                |                |                |                |                  |       |       |        |        |       |       |        |
| Change in Fund Balance <sup>(a)</sup>  | 162            | 1,074          | 240            | 256            | (1,954)          | 475   | 1,060 | 464    | 1,304  | 1,055 | 1,039 | 5,397  |
| Beginning Balance                      | 2,063          | 1,252          | 2,603          | 2,603          | 2,999            | 1,045 | 1,520 | 2,580  | 3,044  | 4,348 | 5,403 | 1,045  |
| Ending Balance                         | 2,225          | 2,326          | 2,843          | 2,859          | 1,045            | 1,520 | 2,580 | 3,044  | 4,348  | 5,403 | 6,442 | 6,442  |
| Fund Balance:                          |                |                |                |                |                  |       |       |        |        |       |       |        |
| Reserved <sup>(b)</sup> 20% of revenue | 834            | 1,230          | 1,261          | 1,266          | 1,230            | 1,230 | 1,341 | 1,383  | 1,451  | 1,496 | 1,572 | 1,572  |
| L                                      |                |                |                |                |                  |       |       |        |        |       |       |        |

| Fund Balance:                          |       |       |       |       |       |       |       |       |       |       |       |       |
|--|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| Reserved <sup>(b)</sup> 20% of revenue | 834   | 1,230 | 1,261 | 1,266 | 1,230 | 1,230 | 1,341 | 1,383 | 1,451 | 1,496 | 1,572 | 1,572 |
| Unreserved                             | 1,391 | 1,096 | 1,582 | 1,593 | (185) | 290   | 1,239 | 1,662 | 2,897 | 3,907 | 4,871 | 4,871 |
| Ending Balance                         | 2,225 | 2,326 | 2,843 | 2,859 | 1,045 | 1,520 | 2,580 | 3,044 | 4,348 | 5,403 | 6,442 | 6,442 |

<sup>(</sup>a) Revenues in excess of (less than) expenditures

 $<sup>^{\</sup>mbox{\scriptsize (b)}}$  Annual reserve balance requirement equals 20% of the prior year operating revenues.

### ATTACHMENT F-1

# NOTES TO SURFACE WATER ENTERPRISE FUND

1) Reflects proposed rate increases of 5% in 2019, 3% in 2020, and 5% and 3% in 2021 through 2024. We will continue with the annual rate model review to confirm that the proposed Surface Water rate increases are necessary.

The National Pollution Discharge Elimination System (NPDES) permit required by the State Department of Ecology is having a significant impact on the Surface Water fund.

- 2) Potential grants and/or bond revenue. Included is the estimated Department of Ecology grant for NPDES and King County Flood Control District Opportunity grants as well as significant grant funding for the Chinook Wind Project.
- 3) Debt schedule includes PWTF loans and the 2006 Allentown Bond.

| Debt Service includes:        | <b>Expires</b> | <u>2019</u>         | <u>2020</u>         |
|-------------------------------|----------------|---------------------|---------------------|
| 2004 PWTF Duwamish (15%)      | 7/01/21        | 11,770.55           | 11,712.56           |
| 2004 PWTF Cascade View Const. | 7/01/24        | 228,808.47          | 227,697.75          |
| 2004 PWTF Allentown (12%)     | 7/01/24        | 38,328.11           | 38,142.05           |
| 2006 Bond Allentown (12%)     | 12/31/26       | 21,752.10           | 22,034.19           |
| 2018 Public Works Shops (23%) | 12/31/38       | 219,831.00          | 250,675.00          |
|                               | Total          | <u>\$520,490.23</u> | <u>\$550,261.55</u> |

- 4) An Interfund Utility Tax was approved in October 2009 for the water, sewer, and surface water utilities. Gross revenues are currently taxed 10% through December 31, 2021.
- 5) The Working Capital Reserve Fund's policy was updated in 2012 per Resolution No. 1774 to maintain an adequate fund balance in each of the enterprise funds. For the Enterprise Funds, the unrestricted fund balance shall equal or exceed 20% of the previous year's revenue, exclusive of significant non-operating, non-recurring revenues.
- 6) Cost of engineering to support capital projects, NPDES, and operation efforts in-house.

### **Surface Water Enterprise Fund**

The City's Enterprise Funds account for utility operations that are self-supported through user charges. The utilities are financed and operated like a private business enterprise which requires periodic determination of revenues earned; expenses incurred, and net income for capital maintenance, public policy, management control and accountability. The Surface Water Enterprise Fund accounts for operations and capital improvements for the City's storm drainage and surface water management function. Surface Water projects are required to meet Federal, State and local mandates. The largest contributor to the surface water enterprise fund is the City of Tukwila.

**DEPARTMENT:** Public Works

FUND: Surface Water FUND NUMBER: 412 RESPONSIBLE MANAGER: Henry Hash POSITION: Director

### **Description**

The surface water program provides for engineering studies, preliminary engineering, construction, and maintenance of public surface water and drainage facilities to include control and monitoring of storm and surface water quantity and quality. The Green River Basin management agreement and the Green River levees are also included in this program. The costs of operating and maintaining the system are included with the capital projects necessary for system improvements.

# 2017-2018 Accomplishments

- Completed Small Drainage Project identified on the approved list for 2017 & 2018.
- Continued development of the GIS as-builts of city infrastructure that complies with NPDES.
- Completed construction of Gilliam Creek 42nd Ave S culvert (with 42nd Ave S street improvements).
- ♦ Completed construction 53rd Ave S surface water drainage.

#### 2019-2020 Outcome Goals

- ♦ Improve surface water system efficiency. Strategic Goal 1. Utility Comp Plan Goal 12.1
- ♦ Improve surface water system reliability. Strategic Goal 1. Utility Comp Plan Goal 12.1
- ♦ Improve surface water system capacity. Strategic Goal 1. Utility Comp Plan Goal 12.1

### 2019-2020 Indicators of Success

- Complete small drainage projects identified on the approved list for 2017 and 2018.
- Begin design and construction of Chinook Wind.
- Construct East Marginal Way S storm water outfalls.
- ♦ Construct Riverton Creek Flap Gate Removal
- ♦ Continue development of Tukwila 205 Levee Certification.
- Continue development of the GIS as-builts of city infrastructure that complies with NPDES.

# **Performance Measures**

|   |         | Actual  |         | Projected |         |  |  |
|---|---------|---------|---------|-----------|---------|--|--|
| Public Works - Surface Water  | 2016    | 2017    | 2018    | 2019      | 2020    |  |  |
| Maintain & Improve Surface Water  |         |         |         |           |         |  |  |
| System  |         |         |         |           |         |  |  |
| Number of linear feet TV inspected  | 10,000  | 10,000  | 10,000  | 10,000    | 10,000  |  |  |
| Number of linear feet of storm lines cleaned  | 12,000  | 12,000  | 12,000  | 12,000    | 12,000  |  |  |
| Number of linear feet of ditches cleaned  | 2,000   | 2,000   | 2,000   | 2,000     | 2,000   |  |  |
| Number of manholes/catch basins/or stormceptors cleaned   | 1,500   | 1,500   | 1,500   | 1,500     | 1,500   |  |  |
| Number of times cleaned four water quality ponds  | Once/yr | Once/yr | Once/yr | Once/yr   | Once/yr |  |  |
| Number of times cleaned large pot type water quality vaults   | Once/yr | Once/yr | Once/yr | Once/yr   | Once/yr |  |  |
| Number of times clean 10 large trash racks  | 250     | 250     | 250     | 250       | 250     |  |  |
| Capital   |         |         |         |           |         |  |  |
| Hours of 5 storm lift stations monitoring of pump hours, start counts, and generator operation (weekly) | 5       | 5       | 5       | 5         | 5       |  |  |
| NPDES (National Pollutant Discharge   |         |         |         |           |         |  |  |
| Number of illicit discharge events  | 13      | 13      | 13      | 13        | 13      |  |  |
| Number vehicles washed using the<br>SudsSafe Car Wash   | 50      | 50      | 50      | 50        | 50      |  |  |
| Customers   |         |         |         |           |         |  |  |
| Number of surface water customers   | 5,260   | 5,270   | 5,275   | 5,260     | 5,270   |  |  |
| Number of total drainage system miles   | 71.00   | 71.00   | 71.00   | 71.00     | 71.00   |  |  |

# **Revenue and Expense Summary**

| Charges for Services   Surface Water Sales   \$ 5,850,799   \$ 6,147,930   \$ 6,226,899   \$ 6,306,000   \$ 6,683,000   \$ 6,883,000   \$ 5,68%   3,00     Total Charges for Services   5,850,799   6,147,930   6,326,899   6,306,000   6,663,000   6,663,000   5,66%   3,00     Intergovernmental Revenue   89,822   8,435   63,000   63,000   120,000   277,000   90,48%   130,33     Miscellaneous Revenue   10,498   29,101   52,938   53,285   24,000   40,000   50,000   66,67%   25,000     Sale of Capital Assets   (4,798)   (440)   -   -   -   -   0,00%   0,00     Sale of Capital Assets   (4,798)   (440)   -   -   -   -   -   0,00%   0,00     Total Miscellaneous Revenue   298,335   157,657   53,285   24,000   40,000   50,000   66,67%   25,000     Total Miscellaneous Revenue   298,335   157,657   53,285   24,000   40,000   50,000   66,67%   25,000     Total Miscellaneous Revenue   6,238,957   6,314,022   6,443,185   6,393,000   6,823,000   7,190,000   6,67%   25,000     Total Revenue   6,238,957   6,314,022   6,443,185   6,393,000   2,247,000   800,000   -13,34%   64,400     Total Revenue   6,295,926   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0,93%   -11,910     Total Revenue   6,295,926   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0,93%   -11,910     Total Revenue   6,295,926   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0,33%   -11,910     Total Revenue   6,295,926   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0,33%   -11,910     Total Revenue   6,295,926   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0,33%   -11,910     Total Revenue   6,295,926   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0,33%   -11,910     Total Revenue   6,295,926   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0,00 |                                       |                                       | Sur          | face Water F | und          |              |              |          |          |
|---|---------------------------------------|---------------------------------------|--------------|--------------|--------------|--------------|--------------|----------|----------|
| Part  |                                       |                                       | Actual       |              |              | Budget       |              | Percent  | Change   |
| Part  |                                       |                                       |              | Projected    |              |              |              |          |          |
| Charges for Services   Surface Water Sales   \$ 5,850,799   \$ 6,147,930   \$ 6,326,899   \$ 6,306,000   \$ 6,683,000   \$ 6,863,000   5,66%   3,00     Total Charges for Services   5,850,799   6,147,930   6,326,899   6,306,000   6,663,000   6,663,000   5,66%   3,00     Intergovernmental Revenue   89,822   8,435   63,000   63,000   120,000   277,000   90,48%   130,33     Miscellaneous Revenue   Investment Earnings   29,101   52,938   53,285   24,000   40,000   50,000   66,67%   25,000     Sale of Capital Assets   (4,798)   (440)   -   -   -   -   0,00%   0,000     Sale of Capital Assets   (4,798)   (440)   -   -   -   -   0,00%   0,000     Total Miscellaneous Revenue   298,335   157,657   53,285   24,000   40,000   50,000   66,67%   25,000     Total Miscellaneous Revenue   298,335   157,657   53,285   24,000   40,000   50,000   66,67%   25,000     Total Operating Revenue   6,238,957   6,314,022   6,443,185   6,393,000   6,823,000   7,190,000   6,67%   25,000     Total Revenue   6,238,957   6,314,022   6,443,185   6,393,000   2,247,000   800,000   43,34%   64,400     Total Revenue   6,295,928   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0,33%   11,910     Total Revenue   6,295,928   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0,33%   11,910     Total Revenue   6,295,928   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0,33%   11,910     Total Revenue   6,295,928   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0,33%   11,910     Total Revenue   6,295,928   6,499,402   9,036,185   8,986,000   9,700,000   7,990,000   0,33%   11,910     Total Revenue   6,295,928   886,206   901,728   762,122   1,045,012   1,089,529   1,115,653   4,26%   2,20%   1,045,012    |                                       | 2016                                  | 2017         | -            | 2018         | 2019         | 2020         | 2018-19  | 2019-20  |
| Surface Water Sales   \$ 5,850,799   \$ 6,147,930   \$ 6,326,899   \$ 6,306,000   \$ 6,863,000   \$ 5,685,000   \$ 5,685   \$ 3.00   Intergovernmental Revenue   89,822   8,435   63,000   63,000   120,000   277,000   90,48%   130,33   Miscellaneous Revenue   1   | Operating Revenue                     |                                       |              |              |              |              |              |          |          |
| Total Charges for Services  | Charges for Services                  |                                       |              |              |              |              |              |          |          |
| Intergovernmental Revenue   89,822   8,435   63,000   63,000   120,000   277,000   90,48%   130,83     Miscellaneous Revenue   Interestment Earnings   29,101   52,938   53,285   24,000   40,000   50,000   66,67%   25,000   20,000     Sale of Capital Assets   (47,98)   (440)   0.00%   0.00     Sale of Capital Assets   (47,98)   (440)   0.00%   0.00     Collect Revenue   240   160   0.00%   0.00     Total Miscellaneous Revenue   298,335   157,657   53,285   24,000   40,000   50,000   66,67%   25,000     Collad Operating Revenue   6,238,957   6,314,022   6,443,185   6,393,000   6,823,000   7,190,000   6,73%   5.38     Capital Project Revenue   6,238,957   6,314,022   6,443,185   6,393,000   2,247,000   800,000   -13,34%   -64,40     Collad Revenue   6,295,926   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0.93%   -11,91     Collad Revenue   6,295,926   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0.93%   -11,91     Collad Revenue   6,295,926   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0.93%   -11,91     Collad Revenue   6,295,926   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0.93%   -11,91     Collad Revenue   6,295,926   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0.93%   -11,91     Collad Revenue   6,295,926   6,499,402   9,036,185   3,986,000   9,070,000   7,990,000   0.93%   -11,91     Collad Revenue   6,295,926   6,499,402   9,036,185   3,986,000   9,070,000   7,990,000   0.93%   -11,91     Collad Revenue   6,295,926   6,499,402   9,036,185   3,986,000   9,070,000   7,990,000   0.93%   -11,91     Collad Revenue   6,295,926   6,499,402   9,036,185   3,986,000   9,070,000   7,990,000   0.93%   -11,91     Collad Revenue   6,295,926   6,499,402   24,404   -14,40  | Surface Water Sales                   | \$ 5,850,799                          | \$ 6,147,930 | \$ 6,326,899 | \$ 6,306,000 | \$ 6,663,000 | \$ 6,863,000 | 5.66%    | 3.00%    |
| Miscellaneous Revenue Investment Earnings   | Total Charges for Services            | 5,850,799                             | 6,147,930    | 6,326,899    | 6,306,000    | 6,663,000    | 6,863,000    | 5.66%    | 3.00%    |
| Intestment Earnings   | Intergovernmental Revenue             | 89,822                                | 8,435        | 63,000       | 63,000       | 120,000      | 277,000      | 90.48%   | 130.83%  |
| Capital contributions   | Miscellaneous Revenue                 |                                       |              |              |              |              |              |          |          |
| Salar of Capital Assets   | Investment Earnings                   | 29,101                                | 52,938       | 53,285       | 24,000       | 40,000       | 50,000       | 66.67%   | 25.00%   |
| Other Misc Revenue         240         160         -         -         -         0.00%         0.00           Total Miscellaneous Revenue         298,335         157,657         53,285         24,000         40,000         50,000         66,67%         25,000           Total Operating Revenue         6,238,957         6,314,022         6,443,185         6,393,000         6,823,000         7,190,000         6,73%         5,38           Capital Project Revenue         1ntergovernmental Revenue - Grants         56,969         185,380         2,593,000         2,593,000         2,247,000         800,000         -13,34%         -64,40°           Fotal Revenue         6,295,926         6,499,402         9,036,185         8,986,000         9,070,000         7,990,000         0.93%         -11,91           Operating Expenses         8         86,206         901,728         762,122         1,045,012         1,089,529         1,115,653         4.26%         2,40           Operating Expenses         8         86,206         901,772         762,122         1,045,012         1,089,529         1,115,653         4.26%         2,40           Operating Expenses         8         801,372         711,193         762,122         1,045,012         1,089,529  | Capital contributions                 | 273,792                               | 104,998      | -            | -            | -            | -            | 0.00%    | 0.00%    |
| Other Misc Revenue         240         160         -         -         -         -         0.00%         0.00           Total Miscellaneous Revenue         298,335         157,657         53,285         24,000         40,000         50,000         66,67%         25,000           Total Percent Revenue         6,238,957         6,314,022         6,443,185         6,393,000         6,823,000         7,190,000         6.73%         5.38           Capital Project Revenue         6,295,926         6,499,402         9,036,185         8,986,000         9,070,000         7,990,000         -13,34%         -64,40°           Fotal Revenue         6,295,926         6,499,402         9,036,185         8,986,000         9,070,000         7,990,000         0.93%         -11,91           Operating Expenses         8         886,206         901,728         762,122         1,045,012         1,089,529         1,115,653         4.26%         2.40°           Personnel Benefits         370,125         251,945         376,492         494,934         482,172         496,998         4.26%         2.40°           Supplies         45,694         43,356         50,625         43,500         42,500         42,500         42,500         42,500         42,500   | Sale of Capital Assets                | (4,798)                               | (440)        | -            | -            | -            | -            | 0.00%    | 0.00%    |
| Total Miscellaneous Revenue   298,335   157,657   53,285   24,000   40,000   50,000   66.67%   25,000     Total Operating Revenue   6,238,957   6,314,022   6,443,185   6,393,000   6,823,000   7,190,000   6.73%   5.38     Capital Project Revenue   Intergovernmental Revenue - Grants   56,969   185,380   2,593,000   2,593,000   2,247,000   800,000   -13,34%   -64.40*     Total Revenue   6,295,926   6,499,402   9,036,185   8,986,000   9,070,000   7,990,000   0.93%   -11.91*     Operating Expenses   Salaries & Wages   886,206   901,728   762,122   1,045,012   1,089,529   1,115,653   4.26%   2.40*     Personnel Benefits   370,125   251,945   375,492   494,934   482,172   496,996   2.58%   3.00*     Supplies   45,694   43,356   50,625   43,500   42,500   42,500   42,200   42,000          | Other Misc Revenue                    |                                       | , ,          | -            | _            | _            | _            | 0.00%    | 0.00%    |
| Capital Project Revenue Intergovermmental Revenue - Grants  |                                       |                                       |              | 53,285       | 24,000       | 40,000       | 50,000       |          | 25.00%   |
| Capital Project Revenue Intergovermmental Revenue - Grants  | Total Operating Revenue               | 6 238 957                             | 6 314 022    | 6 443 185    | 6 393 000    | 6 823 000    | 7 190 000    | 6 73%    | 5.38%    |
| Intergovernmental Revenue - Grants   56,969   185,380   2,593,000   2,593,000   2,247,000   800,000   -13,34%   -64,40°   |                                       | 0,200,007                             | 0,011,022    | 0, 1.10, 100 | 0,000,000    | 0,020,000    | 1,100,000    | 0.7070   | 0.0070   |
| Total Revenue 6,295,926 6,499,402 9,036,185 8,986,000 9,070,000 7,990,000 0.93% -11.91  Deparating Expenses  Salaries & Wages 886,206 901,728 762,122 1,045,012 1,089,529 1,115,653 4,26% 2.40  Personnel Benefits 370,125 251,945 375,492 494,934 482,172 496,998 -2.58% 3.07  Supplies 45,694 43,356 50,625 43,500 42,500 42,500 -2.30% 0.00  Services 691,372 711,193 761,438 549,694 761,013 662,881 38,44% -12.89  IntergoVt Services & Taxes 655,744 688,572 699,077 686,000 720,300 741,300 5.00% 2.92  Total Operating Expenses 2,649,140 2,596,794 2,648,763 2,819,140 3,095,515 3,059,331 9.80% -1.17  Capital Expenses  Salaries & Wages 85,567 31,116 226,658 0.00% 0.00  Personnel Benefits 34,766 12,425 56,613 0.00% 0.00  Personnel Benefits 34,766 12,425 56,613 0.00% 0.00  Supplies 1,374 - 52,667 50,000 50,000 50,000 0.00% 0.00  Services 377,319 398,934 1,137,151 1,518,000 1,795,000 1,364,000 18,25% 2-24,011  Capital Outlay 399,680 2,117,068 4,043,083 4,395,000 2,555,000 1,337,000 41,87% 476,779  Principal 288,331 288,146 288,912 288,913 231,981 261,025 1568,67% 12,525  Total Capital Expenses 1,743,652 2,862,530 5,818,986 6,265,816 4,921,023 3,301,773 -21,46% 32,907  Non-Cash Accounting Adjustments 0,2667 50,000 644,519 85,974 18,987 63,46% 0.00  GASB 68 Pension Adjustment 5,51,71 115,620 188,987 188,987 63,46% 0.00  GASB 68 Pension Adjustment 5,51,71 115,620 188,987 188,987 63,46% 0.00  GASB 68 Pension Adjustment 5,51,71 115,620 188,987 188,987 63,46% 0.00  Indirect cost allocation 508,361 518,528 528,899 528,899 665,756 689,723 25,88% 3.60  Total Expenses 4,901,153 5,977,852 9,052,809 9,729,475 8,871,281 7,239,814 -8.82% 1-8.39  Change in Fund Balance 1,394,772 521,550 (16,625) (743,475) 198,719 750,186 -126,73% 277,515   |                                       | 56 969                                | 185 380      | 2 593 000    | 2 593 000    | 2 247 000    | 800 000      | -13 34%  | -64 40%  |
| Departing Expenses  | intergovernmental revenue - Grants    | 30,303                                | 100,000      | 2,000,000    | 2,000,000    | 2,247,000    | 000,000      | -10.0470 | -04.4070 |
| Salaries & Wages         886,206         901,728         762,122         1,045,012         1,089,529         1,115,653         4.26%         2.40°           Personnel Benefits         370,125         251,945         375,492         494,934         482,172         496,998         -2.58%         3.07°           Supplies         65,684         43,356         50,625         43,500         42,500         42,500         42,500         2.30%         0.00°           Services         691,372         711,193         761,438         549,694         761,013         662,881         38.44%         -12.89°           Intergot/ Services & Taxes         655,744         688,572         699,077         686,000         720,300         741,300         5.00%         2.92°           Total Operating Expenses         2,649,140         2,596,794         2,648,753         2,819,140         3,095,515         3,059,331         9.80%         -1.17°           Capital Expenses         85,567         31,116         226,658         -         -         -         0.00%         0.00°           Services         377,319         398,934         1,137,151         1,518,000         1,795,000         50,000         50,000         10,00%         0.00°      <   | Total Revenue                         | 6,295,926                             | 6,499,402    | 9,036,185    | 8,986,000    | 9,070,000    | 7,990,000    | 0.93%    | -11.91%  |
| Salaries & Wages         886,206         901,728         762,122         1,045,012         1,089,529         1,115,653         4.26%         2.40°           Personnel Benefits         370,125         251,945         375,492         494,934         482,172         496,998         -2.58%         3.07°           Supplies         65,684         43,356         50,625         43,500         42,500         42,500         42,500         2.30%         0.00°           Services         691,372         711,193         761,438         549,694         761,013         662,881         38.44%         -12.89°           Intergot/ Services & Taxes         655,744         688,572         699,077         686,000         720,300         741,300         5.00%         2.92°           Total Operating Expenses         2,649,140         2,596,794         2,648,753         2,819,140         3,095,515         3,059,331         9.80%         -1.17°           Capital Expenses         85,567         31,116         226,658         -         -         -         0.00%         0.00°           Services         377,319         398,934         1,137,151         1,518,000         1,795,000         50,000         50,000         10,00%         0.00°      <   | Operating Expenses                    |                                       |              |              |              |              |              |          |          |
| Personnel Benefits   370,125   251,945   375,492   494,934   482,172   496,998   -2.58%   3.07  | . • .                                 | 886 206                               | 901 728      | 762 122      | 1 045 012    | 1 089 529    | 1 115 653    | 4 26%    | 2.40%    |
| Supplies         45,694         43,356         50,625         43,500         42,500         42,500         -2.30%         0.00°           Services         691,372         711,193         761,438         549,694         761,013         662,881         38.44%         -12.89°           Intergovt Services & Taxes         655,744         688,572         699,077         2,819,140         3,095,515         3,059,331         5.00%         2.92°           Fotal Operating Expenses         2,649,140         2,596,794         2,648,753         2,819,140         3,095,515         3,059,331         9.80%         -1.17°           Capital Expenses         85,567         31,116         226,658         -         -         -         0.00%         0.00°           Personnel Benefits         34,766         12,425         56,613         -         -         -         0.00%         0.00°           Services         377,319         398,934         1,137,151         1,518,000         1,795,000         1,364,000         18,25%         -24,01°           Capital Outlay         939,680         2,117,068         4,043,083         4,395,000         2,555,000         1,337,000         -41,87%         -47,67°           Principal         288,313 </td <td>9</td> <td></td> <td>,</td> <td>,</td> <td></td> <td></td> <td></td> <td></td> <td></td>  | 9                                     |                                       | ,            | ,            |              |              |              |          |          |
| Services         691,372         711,193         761,438         549,694         761,013         662,881         38.44%         -12.89*           Intergovt Services & Taxes         655,744         688,572         699,077         686,000         720,300         741,300         5.00%         2.92*           Total Operating Expenses         2,649,140         2,596,794         2,648,753         2,819,140         3,095,515         3,059,331         9.80%         -1.17*           Capital Expenses         8         5,567         31,116         226,658         -         -         -         -         0.00%         0.00*           Supplies         1,374         -         52,667         50,000         50,000         50,000         50,000         0.00%         0.00*           Services         377,319         398,934         1,137,151         1,518,000         1,795,000         1,364,000         18.25%         -24,01*           Principal         288,331         288,146         288,912         298,001         258,000         1,337,000         41.87%         47.67*           Interest         16,614         14,841         13,903         13,903         231,981         261,025         1568.57%         12.52*   |                                       |                                       |              |              |              |              |              |          |          |
| Intergov't Services & Taxes   | · ·                                   | · · · · · · · · · · · · · · · · · · · |              | ,            | ,            | ,            | ,            |          |          |
| Total Operating Expenses   2,649,140   2,596,794   2,648,753   2,819,140   3,095,515   3,059,331   9.80%   -1.17°   |                                       | 1                                     |              |              |              |              | -            |          |          |
| Capital Expenses Salaries & Wages Salaries & Salaries Salaries & Salaries Salaries & Salaries Salaries & Salaries & Salaries Salaries &       |                                       |                                       |              |              |              | ,            |              |          | -1.17%   |
| Salaries & Wages         85,567         31,116         226,658         -         -         -         -         0.00%         0.00%           Personnel Benefits         34,766         12,425         56,613         -         -         -         0.00%         0.00%         0.00%           Supplies         1,374         -         52,667         50,000         50,000         50,000         0.00%         0.00%         0.00%           Services         377,319         398,934         1,137,151         1,518,000         1,795,000         1,364,000         18.25%         -24,01%           Capital Outlay         939,680         2,117,068         4,043,083         4,395,000         2,555,000         1,337,000         -41.87%         -47.67%           Principal         288,331         288,146         288,912         288,913         289,042         289,748         0.04%         0.24%           Interest         16,614         14,841         13,903         13,903         231,981         261,025         1568,57%         12,52*           Total Capital Expenses         1,743,652         2,862,530         5,818,986         6,265,816         4,921,023         3,301,773         -21.46%         -32.90*           Non  | , , ,                                 | 2,0.0,0                               | 2,000,101    | 2,0 .0,. 00  | 2,0.0,1.0    | 0,000,010    | 0,000,001    | 0.0070   |          |
| Personnel Benefits         34,766         12,425         56,613         -         -         -         -         0.00%         0.00%           Supplies         1,374         -         52,667         50,000         50,000         50,000         0.00%         0.00%           Services         377,319         398,934         1,137,151         1,518,000         1,795,000         1,364,000         18.25%         -24.01°           Capital Outlay         939,680         2,117,068         4,043,083         4,395,000         2,555,000         1,337,000         -41.87%         -47.67°           Principal         288,331         288,146         288,912         288,913         289,042         289,748         0.04%         0.24°           Interest         16,614         14,841         13,903         231,981         261,025         1568.57%         12.52°           Total Capital Expenses         1,743,652         2,862,530         5,818,986         6,265,816         4,921,023         3,301,773         -21.46%         -32.90°           Non-Cash Accounting Adjustments         -         -         -         -         -         -         -         -         -         0.00%         0.00°           GASB 68 Pension A  |                                       |                                       |              |              |              |              |              |          |          |
| Supplies         1,374         -         52,667         50,000         50,000         50,000         0.00%         0.00%           Services         377,319         398,934         1,137,151         1,518,000         1,795,000         1,364,000         18.25%         -24.01°           Capital Outlay         939,680         2,117,068         4,043,083         4,395,000         2,555,000         1,337,000         -41.87%         -47.67°           Principal         288,331         288,146         288,912         288,913         289,042         289,748         0.04%         0.24°           Interest         16,614         14,841         13,903         13,903         231,981         261,025         1568.57%         12.52°           Fotal Capital Expenses         1,743,652         2,862,530         5,818,986         6,265,816         4,921,023         3,301,773         -21.46%         -32.90°           Non-Cash Accounting Adjustments         -         -         -         -         -         -         -         -         0.00%         0.00°           GASB 68 Pension Adjustment         -         -         -         -         -         -         -         -         -         -         -         -  | · ·                                   |                                       | ,            | ,            | -            | -            | -            |          |          |
| Services         377,319         398,934         1,137,151         1,518,000         1,795,000         1,364,000         18.25%         -24.01°           Capital Outlay         939,680         2,117,068         4,043,083         4,395,000         2,555,000         1,337,000         -41.87%         -47.67°           Principal         288,331         288,146         288,912         288,913         289,042         289,748         0.04%         0.24°           Interest         16,614         14,841         13,903         13,903         231,981         261,025         1568.57%         12.52°           Total Capital Expenses         1,743,652         2,862,530         5,818,986         6,265,816         4,921,023         3,301,773         -21.46%         -32.90°           Non-Cash Accounting Adjustments         -         -         -         -         -         -         -         0.00%         0.00°           GASB 68 Pension Adjustment         -         -         -         -         -         -         -         -         0.00%         0.00°           GASB 68 Pension Adjustment         -         -         -         -         -         -         -         -         0.00%         0.00°         0.00°<   |                                       | · · · · · · · · · · · · · · · · · · · | 12,425       | ,            | -            | -            | -            |          | 0.00%    |
| Capital Outlay 939,680 2,117,068 4,043,083 4,395,000 2,555,000 1,337,000 -41.87% -47.67% Principal 288,331 288,146 288,912 288,913 289,042 289,748 0.04% 0.24% Interest 16,614 14,841 13,903 13,903 231,981 261,025 1568.57% 12.52% [Total Capital Expenses] 1,743,652 2,862,530 5,818,986 6,265,816 4,921,023 3,301,773 -21.46% -32.90% [Non-Cash Accounting Adjustments] Operating Prior Period Adjustment 0.00% 0.00% [ASB 68 Pension Adjustment] 0.00% 0.00% [ASB 68 Pension Adjustment] 0.00% 0.00% [ASB 68 Pension Adjustment] 0.00% 0.00% [Indirect cost allocation] 508,361 518,528 528,899 528,899 665,756 689,723 25.88% 3.60% [Total Non-Cash Accounting Adjustments] 508,361 518,528 585,070 644,519 854,743 878,710 32.62% 2.80% [Total Expenses] 1,394,772 521,550 (16,625) (743,475) 198,719 750,186 -126.73% 277.51% [Total Plance] 1,394,772 521,550 (16,625) (743,475) 198,719 750,186 -126.73% 277.51% [Total Plance] 1,394,772 521,550 (16,625) (743,475) 198,719 750,186 -126.73% 277.51% [Total Plance] 1,394,772 521,550 (16,625) (743,475) 198,719 750,186 -126.73% 277.51% [Total Plance] 1,394,772 521,550 (16,625) (743,475) 198,719 750,186 -126.73% 277.51% [Total Plance] 1,394,772 521,550 (16,625) (743,475) 198,719 750,186 [Total Plance] 1,394,772 521,550 (16,625) [Total Plance] 1,394,772 521,550 (16,625) [Total Plance] 1,394,772 521,550 (16,625) [Total Plance] 1,394,772 521,550 [Total Plance] 1,394,772 521,550 [Total Plance] 1,394,772 521,550 [Total Plance] 1,394,772 521,550 [Total Plance] 1,394,772 [To  | · ·                                   |                                       | -            | ,            | ,            | ,            | ,            |          | 0.00%    |
| Principal Interest         288,331         288,146         288,912         288,913         289,042         289,748         0.04%         0.24%           Interest         16,614         14,841         13,903         13,903         231,981         261,025         1568.57%         12.52%           Total Capital Expenses         1,743,652         2,862,530         5,818,986         6,265,816         4,921,023         3,301,773         -21.46%         -32.90%           Non-Cash Accounting Adjustments         -         -         -         -         -         -         0.00%         0.00%           Capital Prior Period Adjustment         -         -         -         -         -         -         0.00%         0.00%           GASB 68 Pension Adjustment         -         -         -         -         -         -         -         0.00%         0.00%           GASB 68 Pension Adjustment         -         -         -         -         -         -         -         -         0.00%         0.00%           Transfer Out for Debt Service         -         -         -         561,711         115,620         188,987         188,987         63.46%         0.00%           Indirect cost allocation  | Services                              |                                       | ,            |              | , ,          |              |              |          |          |
| Interest  |                                       |                                       |              |              |              |              |              |          | -47.67%  |
| Total Capital Expenses  | •                                     |                                       |              |              |              | ,            | ,            |          | 0.24%    |
| Non-Cash Accounting Adjustments Operating Prior Period Adjustment Capital Prior Period Adjustment GASB 68 Pension Adjustment GASB 68 Pension Adjustment Transfer Out for Debt Service GOUND GOUN      |                                       |                                       |              |              |              |              |              |          | 12.52%   |
| Operating Prior Period Adjustment         -         -         -         -         -         -         0.00%         0.00%           Capital Prior Period Adjustment         -         -         -         -         -         -         0.00%         0.00%           GASB 68 Pension Adjustment         -         -         -         -         -         -         -         0.00%         0.00%           Transfer Out for Debt Service         -         -         -         56,171         115,620         188,987         188,987         63.46%         0.00%           Indirect cost allocation         508,361         518,528         528,899         528,899         665,756         689,723         25.88%         3.60%           Total Non-Cash Accounting Adjustments         508,361         518,528         585,070         644,519         854,743         878,710         32.62%         2.80%           Total Expenses         4,901,153         5,977,852         9,052,809         9,729,475         8,871,281         7,239,814         -8.82%         -18.39           Change in Fund Balance         1,394,772         521,550         (16,625)         (743,475)         198,719         750,186         -126.73%         277.51%   | Total Capital Expenses                | 1,743,652                             | 2,862,530    | 5,818,986    | 6,265,816    | 4,921,023    | 3,301,773    | -21.46%  | -32.90%  |
| Capital Prior Period Adjustment 0.00% 0.00% GASB 68 Pension Adjustment 0.00% 0.00% Transfer Out for Debt Service 56,171 115,620 188,987 188,987 63.46% 0.00% Indirect cost allocation 508,361 518,528 528,899 528,899 665,756 689,723 25.88% 3.60% Total Non-Cash Accounting Adjustments 508,361 518,528 585,070 644,519 854,743 878,710 32.62% 2.80%  Total Expenses 4,901,153 5,977,852 9,052,809 9,729,475 8,871,281 7,239,814 -8.82% -18.39  Change in Fund Balance 1,394,772 521,550 (16,625) (743,475) 198,719 750,186 -126.73% 277.51%   | Non-Cash Accounting Adjustments       |                                       |              |              |              |              |              |          |          |
| GASB 68 Pension Adjustment 0.00% 0.000 Transfer Out for Debt Service 56,171 115,620 188,987 188,987 63.46% 0.000 Indirect cost allocation 508,361 518,528 528,899 528,899 665,756 689,723 25.88% 3.600 Total Non-Cash Accounting Adjustments 508,361 518,528 585,070 644,519 854,743 878,710 32.62% 2.800  Total Expenses 4,901,153 5,977,852 9,052,809 9,729,475 8,871,281 7,239,814 -8.82% -18.39  Change in Fund Balance 1,394,772 521,550 (16,625) (743,475) 198,719 750,186 -126.73% 277.510   |                                       | -                                     | -            | -            | -            | -            | -            |          | 0.00%    |
| Transfer Out for Debt Service         -         -         56,171         115,620         188,987         188,987         63.46%         0.000           Indirect cost allocation         508,361         518,528         528,899         528,899         665,756         689,723         25.88%         3.600           Total Non-Cash Accounting Adjustments         508,361         518,528         585,070         644,519         854,743         878,710         32.62%         2.800           Total Expenses         4,901,153         5,977,852         9,052,809         9,729,475         8,871,281         7,239,814         -8.82%         -18.39           Change in Fund Balance         1,394,772         521,550         (16,625)         (743,475)         198,719         750,186         -126.73%         277.510  | Capital Prior Period Adjustment       | -                                     | -            | -            | -            | -            | -            | 0.00%    | 0.00%    |
| Indirect cost allocation         508,361         518,528         528,899         528,899         665,756         689,723         25.88%         3.60           Total Non-Cash Accounting Adjustments         508,361         518,528         585,070         644,519         854,743         878,710         32.62%         2.80           Total Expenses         4,901,153         5,977,852         9,052,809         9,729,475         8,871,281         7,239,814         -8.82%         -18.39           Change in Fund Balance         1,394,772         521,550         (16,625)         (743,475)         198,719         750,186         -126.73%         277.51   | GASB 68 Pension Adjustment            | -                                     | -            | -            | -            | -            | -            | 0.00%    | 0.00%    |
| Total Non-Cash Accounting Adjustments         508,361         518,528         585,070         644,519         854,743         878,710         32.62%         2.80           Fotal Expenses         4,901,153         5,977,852         9,052,809         9,729,475         8,871,281         7,239,814         -8.82%         -18.39           Change in Fund Balance         1,394,772         521,550         (16,625)         (743,475)         198,719         750,186         -126.73%         277.51  | Transfer Out for Debt Service         | -                                     | -            | 56,171       | 115,620      | 188,987      | 188,987      | 63.46%   | 0.00%    |
| Total Expenses 4,901,153 5,977,852 9,052,809 9,729,475 8,871,281 7,239,814 -8.82% -18.39 Change in Fund Balance 1,394,772 521,550 (16,625) (743,475) 198,719 750,186 -126.73% 277.514   | Indirect cost allocation              | 508,361                               | 518,528      | 528,899      | 528,899      | 665,756      | 689,723      | 25.88%   | 3.60%    |
| Change in Fund Balance 1,394,772 521,550 (16,625) (743,475) 198,719 750,186 -126.73% 277.510  | Total Non-Cash Accounting Adjustments | 508,361                               | 518,528      | 585,070      | 644,519      | 854,743      | 878,710      | 32.62%   | 2.80%    |
|   | Total Expenses                        | 4,901,153                             | 5,977,852    | 9,052,809    | 9,729,475    | 8,871,281    | 7,239,814    | -8.82%   | -18.39%  |
| Net working capital (Fund Balance) 3,612,324 4,123,345 3,595,700 3,379,870 3,794,419 4,544,605 12.27% 19.77   | Change in Fund Balance                | 1,394,772                             | 521,550      | (16,625)     | (743,475)    | 198,719      | 750,186      | -126.73% | 277.51%  |
|   | Net working capital (Fund Balance)    | 3,612,324                             | 4,123,345    | 3,595,700    | 3,379,870    | 3,794,419    | 4,544,605    | 12.27%   | 19.77%   |

# **Capital Projects**

The capital projects listed below are capital projects planned for the 2017-2018 biennium. The year in which the project is estimated to be completed has been provided. Additional information on the projects may be found in the Capital Improvement Program section of the budget.

|  | 2019        | 2020         | Anticipated |
|--|-------------|--------------|-------------|
| 2019-2020 Surface Water Capital Projects | Budget      | Budget       | Completion  |
| E Marginal Wy Stormwater Outfalls        | 1,166,000   | 211,000      | 2019        |
| Riverton Creek Flap Gate Removal         | 1,142,000   | 15,000       | 2019        |
| Gilliam Creek Fish Barrier Removal       | -           | 554,000      | 2022        |
| Tukwila 205 Levee Certification          | 525,000     | 230,000      | 2022        |
| Chinook Wind                             | 215,000     | 335,000      | 2020        |
| GIS Inventory of Surface Water           | 67,000      | 100,000      | N/A         |
| Other (Annual Maint, etc.)               | 1,285,000   | 1,306,000    | N/A         |
|  | \$4,400,000 | \$ 2,751,000 |             |

# **Debt Service Requirements**

The following chart provides information on debt service requirements, by debt issue, for the biennium.

|                    |                       | Budget     |            |  |  |  |  |
|--------------------|-----------------------|------------|------------|--|--|--|--|
| Debt Service       | Project               | 2019       | 2020       |  |  |  |  |
| 2015 Revenue Bonds | Allentown Phase II    |            |            |  |  |  |  |
| Principal          |                       | \$ 18,088  | \$ 18,794  |  |  |  |  |
| Interest           |                       | 3,664      | 3,241      |  |  |  |  |
|                    | Total                 | 21,752     | 22,034     |  |  |  |  |
| PWTFL 2001         | Duwamish/ Valley View |            |            |  |  |  |  |
| Principal          |                       | 11,597     | 11,597     |  |  |  |  |
| Interest           |                       | 174        | 116        |  |  |  |  |
|                    | Total                 | 11,771     | 11,713     |  |  |  |  |
| PWTFL 2004         | Allentown Phase II    |            |            |  |  |  |  |
| Principal          |                       | 37,212     | 37,212     |  |  |  |  |
| Interest           |                       | 1,116      | 930        |  |  |  |  |
|                    | Total                 | 38,328     | 38,142     |  |  |  |  |
| PWTFL 2004         | Cascade View          |            |            |  |  |  |  |
| Principal          |                       | 222,144    | 222,144    |  |  |  |  |
| Interest           |                       | 6,664      | 5,554      |  |  |  |  |
|                    | Total                 | 228,808    | 227,698    |  |  |  |  |
| Public Safety Plan | Public Works Shops    |            |            |  |  |  |  |
| 2018 Bond Issuance |                       |            |            |  |  |  |  |
| Interest           |                       | 188,987    | 188,987    |  |  |  |  |
|                    | Total                 | 188,987    | 188,987    |  |  |  |  |
| Public Safety Plan | Public Works Shops    |            |            |  |  |  |  |
| 2019 Bond Issuance |                       |            |            |  |  |  |  |
| Interest           |                       | 30,844     | 61,688     |  |  |  |  |
|                    | Total                 | 30,844     | 61,688     |  |  |  |  |
| Total Principal    |                       | 289,041    | 289,746    |  |  |  |  |
| Total Interest     |                       | 231,449    | 260,515    |  |  |  |  |
| Total Debt Service |                       | \$ 520,490 | \$ 550,261 |  |  |  |  |

Amortization of premiums and discounts are not included in this schedule but are included in the Revenue and Expense Summary statement.

### **Expenditure Detail - Salaries and Benefits**

Salaries for budgeted positions are based on actual costs for existing positions and include a cost of living adjustment per contract agreements.

| Surface Water Fund         |      |      |             |            |      |             |            |  |  |  |  |  |
|----------------------------|------|------|-------------|------------|------|-------------|------------|--|--|--|--|--|
| Position                   | 2018 | 2019 | 2019 Bu     | dgeted     | 2020 | 2020 Bu     | dgeted     |  |  |  |  |  |
| Description                | FTE  | FTE  | Salaries    | Benefits   | FTE  | Salaries    | Benefits   |  |  |  |  |  |
| Maint & Ops Superintendent | 0.5  | 0.5  | \$ 48,687   | \$ 15,464  | 0.5  | \$ 52,141   | \$ 16,510  |  |  |  |  |  |
| Maint & Ops Foreman        | 1.5  | 1.5  | 129,653     | 55,885     | 1.5  | 132,192     | 53,072     |  |  |  |  |  |
| Maint & Ops Specialist     | 5.5  | 5.5  | 411,305     | 197,717    | 5.5  | 420,464     | 205,972    |  |  |  |  |  |
| Senior Engineer            | 1    | 1    | 125,361     | 48,000     | 1    | 127,968     | 49,670     |  |  |  |  |  |
| Engineer (NPDES Coord)     | 1    | 1    | 105,862     | 41,283     | 1    | 108,144     | 42,864     |  |  |  |  |  |
| Sr. Maint & Ops Specialist | 1    | 1    | 65,068      | 37,599     | 1    | 66,360      | 39,206     |  |  |  |  |  |
| Inspector SW               | 1    | 1    | 75,655      | 36,444     | 1    | 77,654      | 38,029     |  |  |  |  |  |
| Project Manager SW         | 1    | 1    | 110,939     | 46,595     | 1    | 113,730     | 48,491     |  |  |  |  |  |
| Extra Labor                |      |      | 8,000       | 793        |      | 8,000       | 793        |  |  |  |  |  |
| Overtime                   |      |      | 9,000       | 892        |      | 9,000       | 892        |  |  |  |  |  |
| Clothing Allowance         |      |      |             | 1,500      |      |             | 1,500      |  |  |  |  |  |
| Department Total           | 12.5 | 12.5 | \$1,089,529 | \$ 482,172 | 12.5 | \$1,115,653 | \$ 496,997 |  |  |  |  |  |

### **Surface Water Operations and Maintenance Capital**

The Surface Water Department operations and maintenance capital purchases for 2019 include a portion of the purchase of a slope mower. The total purchase is \$43,000 with 70% of the cost (\$30,000) funded by Surface Water and 30% (\$13,000) from Sewer. The Spider Slope Mower will assist the crew maintain easements and ponds throughout the city where there is a steep terrain.

### **Expenditure Detail Operations - Supplies, Services, and Other**

Supplies include supplies specific to administering the surface water program. Services now includes costs for King County processing the City's Surface Water billing. It also includes engineering, surveying, repair and replacement costs of equipment, utilities, registrations, and credit card fees, among others. Intergovernmental includes excise tax and interfund utility tax.

| Surface   | Surface Water - Administration |        |    |        |    |          |    |        |    |        |    |        |
|---|--------------------------------|--------|----|--------|----|----------|----|--------|----|--------|----|--------|
|   |                                | Actual |    |        |    |          |    |        |    | Budget |    |        |
|   |                                |        |    |        | Р  | rojected |    |        |    |        |    |        |
| Account Number  |                                | 2016   |    | 2017   |    | 2018     |    | 2018   |    | 2019   |    | 2020   |
| 412.01.538.301.31.00 Supplies - Office & Operating                              | \$                             | -      | \$ | -      | \$ | 526      | \$ | -      | \$ | -      | \$ | -      |
| 412.01.538.380.31.00 Supplies -   |                                | 1,044  |    | 651    |    | -        |    | -      |    | -      |    | -      |
| 412.01.538.380.31.01 Supplies - Community Education                             |                                | 46     |    | 280    |    | 123      |    | 1,000  |    | -      |    | -      |
| 412.01.538.380.31.02 Supplies -Operating  |                                | 34,665 |    | 27,598 |    | 45,426   |    | 36,000 |    | 36,000 |    | 36,000 |
| 412.01.538.380.31.03 Supplies - Office & Safety                                 |                                | 2,362  |    | 9,727  |    | 2,393    |    | 1,500  |    | 1,500  |    | 1,500  |
| 412.01.538.380.31.04 Supplies - Billing   |                                | 1,885  |    | 3,015  |    | -        |    | -      |    | -      |    | -      |
| 412.01.538.380.35.00 Small Tools & Minor Equipment - Minor tools                |                                | 2,826  |    | 932    |    | 1,156    |    | 4,000  |    | 4,000  |    | 4,000  |
| 412.01.538.380.35.01 Small Tools & Minor Equipment - Traffic<br>Control Devices |                                | 2,866  |    | 1,154  |    | 1,000    |    | 1,000  |    | 1,000  |    | 1,000  |
| Total Supplies  |                                | 45,694 |    | 43,356 |    | 50,625   |    | 43,500 |    | 42,500 |    | 42,500 |

# **Expenditure Detail Operations - Supplies, Services, and Other, Continued**

| Surface Water - Administration Continued   |             |             |             |             |             |             |  |  |  |  |  |  |
|--|-------------|-------------|-------------|-------------|-------------|-------------|--|--|--|--|--|--|
|  |             | Actual      |             |             | Budget      |             |  |  |  |  |  |  |
|  |             |             | Projected   |             |             |             |  |  |  |  |  |  |
| Account Number   | 2016        | 2017        | 2018        | 2018        | 2019        | 2020        |  |  |  |  |  |  |
| 412.01.538.301.42.00 Communication   | 957         | 1,276       | 1,180       | -           | -           | -           |  |  |  |  |  |  |
| 412.01.538.301.43.00 Travel - Mileage, parking   | -           | 222         | 8           | -           | -           | -           |  |  |  |  |  |  |
| 412.01.538.301.48.00 R&M - Equipment repair  | 13,100      | -           | -           | -           | -           | -           |  |  |  |  |  |  |
| 412.01.538.301.49.00 Misc - Project expense  | -           | 150         | -           | -           | -           | -           |  |  |  |  |  |  |
| 412.01.538.380.41.00 Prof Svcs - Engineering and surveying   | 258,019     | 244,987     | 241,767     | 2,000       | 2,000       | 2,000       |  |  |  |  |  |  |
| 412.01.538.380.41.01 Prof Svcs - Utility one call services   | 527         | 632         | 586         | 400         | 650         | 650         |  |  |  |  |  |  |
| 412.01.538.380.41.02 Prof Svcs - CDLs hearing and physicals  | 744         | 945         | 891         | 1,200       | 1,200       | 1,200       |  |  |  |  |  |  |
| 412.01.538.380.41.06 Prof Svcs - King County Storm Water<br>Billing                                      | -           | -           | -           | -           | 168,000     | 65,000      |  |  |  |  |  |  |
| 412.01.538.380.42.00 Communication - Phone bills and Nextels   | 1,190       | 520         | 1,572       | 2,000       | 2,000       | 2,000       |  |  |  |  |  |  |
| 412.01.538.380.43.00 Travel - Mileage, meals and parking   | 3,784       | 1,187       | 961         | 2,000       | 2,000       | 2,000       |  |  |  |  |  |  |
| 412.01.538.380.44.00 Advertising - Ads for jobs  | 4,685       | 650         | 500         | 500         | 500         | 500         |  |  |  |  |  |  |
| 412.01.538.380.45.00 Rental - Trackhoes, backhoes, loaders, forklifts, and surface water supplies        | 2,027       | 1,665       | 712         | 4,000       | 4,000       | 4,000       |  |  |  |  |  |  |
| 412.01.538.380.45.94 Rental - Equipment Replacement Fund   | 87,553      | 230,345     | 230,345     | 230,345     | 292,665     | 294,765     |  |  |  |  |  |  |
| 412.01.538.380.45.95 Rental - Equipment Rental O & M   | 80,180      | 103,921     | 100,241     | 100,241     | 110,721     | 110,162     |  |  |  |  |  |  |
| 412.01.538.380.46.01 Insurance - WCIA  | 19,465      | 22,278      | 24,616      | 24,508      | 27,077      | 29,784      |  |  |  |  |  |  |
| 412.01.538.380.47.00 Public Utility - Electrical, gas, water and sewer utilities for storm lift stations | 839         | 1,405       | 5,000       | 5,000       | 1,000       | 1,000       |  |  |  |  |  |  |
| 412.01.538.380.47.01 Public Utility - Hauling dirt, asphalt & concrete disposal, garbage disp.           | 26,619      | 16,375      | 57,957      | 60,000      | 50,000      | 50,000      |  |  |  |  |  |  |
| 412.01.538.380.47.02 Public Utility - Electrical service   | 388         | 431         | 742         | 500         | 500         | 500         |  |  |  |  |  |  |
| 412.01.538.380.47.03 Public Utility - Storm filter cleaning  | -           | -           | -           | -           | 20,000      | 20,000      |  |  |  |  |  |  |
| 412.01.538.380.47.04 Public Utility - Spill Response & Disposal  | 21          | 2,544       | 5,196       | 30,000      | 20,000      | 20,000      |  |  |  |  |  |  |
| 412.01.538.380.47.21 Public Utility - Electric   | 8,372       | 8,268       | 9,248       | 7,500       | 9,300       | 9,700       |  |  |  |  |  |  |
| 412.01.538.380.47.25 Public Utility - Water  | 1,448       | 2,210       | 2,056       | 1,500       | 2,400       | 2,500       |  |  |  |  |  |  |
| 412.01.538.380.47.26 Public Utility - Surface Water  | 2,737       | 2,816       | 3,139       | 2,500       | 4,000       | 4,120       |  |  |  |  |  |  |
| 412.01.538.380.48.00 R&M -   | 152,999     | 40,255      | 32,523      | 33,000      | 33,000      | 33,000      |  |  |  |  |  |  |
| 412.01.538.380.48.02 Telemetry and Alarm - Pump Stations   | -           | -           | 4,000       | 4,000       | 4,000       | 4,000       |  |  |  |  |  |  |
| 412.01.538.380.49.00 Misc - Reg, tuition, memberships, software upgrades, publications &                 | 5,195       | 6,002       | 3,983       | 6,000       | 6,000       | 6,000       |  |  |  |  |  |  |
| 412.01.538.380.49.01 Misc - King County recording lien fees for delinquent surface water bills           | 3,800       | 3,200       | 15,000      | 15,000      | -           | -           |  |  |  |  |  |  |
| 412.01.538.380.49.08 Misc - PPI credit card fees   | 16,724      | 18,908      | 19,215      | 17,500      | -           | -           |  |  |  |  |  |  |
| Total Services   | 691,372     | 711,193     | 761,438     | 549,694     | 761,013     | 662,881     |  |  |  |  |  |  |
| 412.01.538.380.53.00 Ext taxes & operating assessments   | 69,214      | 71,736      | 62,855      | 50,000      | 50,000      | 50,000      |  |  |  |  |  |  |
| 412.01.538.380.54.12 Interfund Taxes - Utility tax   | 586,530     | 616,836     | 636,222     | 636,000     | 670,300     | 691,300     |  |  |  |  |  |  |
| Total Intergovernmental  | 655,744     | 688,572     | 699,077     | 686,000     | 720,300     | 741,300     |  |  |  |  |  |  |
| Total Supplies, Services and Other   | \$1,392,810 | \$1,443,121 | \$1,511,140 | \$1,279,194 | \$1,523,813 | \$1,446,681 |  |  |  |  |  |  |

# **Expenditure Detail Capital - Supplies, Services, and Other**

Supplies include items for capital projects. Services include construction management costs. Capital includes construction and purchase of capital assets.

| Surface Water - Capital Outlays                          |     |           |     |           |         |       |       |        |     |          |     |          |
|--|-----|-----------|-----|-----------|---------|-------|-------|--------|-----|----------|-----|----------|
|  |     |           |     | Actual    |         |       |       |        | Е   | Budget   |     |          |
|  |     | Projected |     |           |         |       |       |        |     |          |     |          |
| Account Number   |     | 2016      |     | 2017      | 20      | 18    | 2     | 018    |     | 2019     |     | 2020     |
| 412.98.594.382.31.00 Supplies -Office and Operating      | \$  | 1,374     | \$  | -         | \$ 5    | 2,667 | \$    | 50,000 | \$  | 50,000   | \$  | 50,000   |
| Total Supplies   |     | 1,374     |     | -         | 5       | 2,667 |       | 50,000 |     | 50,000   |     | 50,000   |
| 412.98.594.382.41.00 Prof Svcs - Construction management |     | 301,531   |     | 397,938   | 1,13    | 6,744 | 1,5   | 18,000 | 1   | ,795,000 | 1   | ,364,000 |
| 412.98.594.382.42.00 Communication - Postage             |     | -         |     | -         |         | 12    |       | -      |     | -        |     | -        |
| 412.98.594.382.44.00 Advertising - Bid ads               |     | 1,946     |     | 995       |         | -     |       | -      |     | -        |     | -        |
| 412.98.594.382.48.00 R&M - Crushed rock, other repair    |     | 73,842    |     | -         |         | -     |       | -      |     | -        |     | -        |
| 412.98.594.382.49.00 Misc - Other                        |     | -         |     | -         |         | 394   |       | -      |     | -        |     | -        |
| Total Services   |     | 377,319   |     | 398,934   | 1,13    | 7,151 | 1,5   | 18,000 | 1   | ,795,000 | 1   | ,364,000 |
| 412.01.594.380.64.00 Capital - Machinery & equipment     |     | -         |     | 6,364     |         | -     |       | -      |     | 30,000   |     | -        |
| 412.98.594.382.61.00 Capital - Land                      |     | -         |     | -         |         | -     |       | -      |     | 125,000  |     | -        |
| 412.98.594.382.64.00 Capital - Machinery & equipment     |     | -         |     | -         |         | 5,194 |       | -      |     | -        |     | -        |
| 412.98.594.382.65.00 Capital - Construction projects     |     | 939,680   | 2   | 2,117,068 | 4,03    | 7,889 | 4,3   | 95,000 | 2   | ,430,000 | 1   | ,337,000 |
| Total Other  |     | 939,680   | 2   | 2,123,432 | 4,04    | 3,083 | 4,3   | 95,000 | 2   | ,585,000 | 1   | ,337,000 |
| Total Capital Outlays                                    | \$1 | ,318,373  | \$2 | 2,522,366 | \$ 5,23 | 2,900 | \$5,9 | 63,000 | \$4 | ,430,000 | \$2 | ,751,000 |

# City of Tukwila CAPITAL IMPROVEMENT PROGRAM

tor 2019 - 2024

# SURFACE WATER 412 Fund

| CIP<br>Page # | PROJECT TITLE                              | 2019  | 2020  | 2021  | 2022     | 2023  | 2024  | TOTAL  | **Other<br>Sources | After Six<br>Years |
|---------------|--|-------|-------|-------|----------|-------|-------|--------|--------------------|--------------------|
| 88            | Annual Small Drainage Bragram              | 710   | 710   | 710   | 709      | 710   | 710   | 4,259  | 0                  | 713                |
|               | Annual Small Drainage Program              |       |       |       |          |       |       | ,      |                    |                    |
| 89            | Storm Water Quality Retrofit Program       | 359   | 115   | 1,035 | 65       | 105   | 105   | 1,784  | 1,094              | 115                |
| 90            | NPDES Program                              | 50    | 50    | 55    | 55<br>45 | 60    | 60    | 330    | 110                | 65                 |
| 91            | WRIA 9 Watershed Planning                  | 13    | 14    | 14    | 15       | 15    | 16    | 87     | 87                 | 16                 |
| 92            | East Marginal Wy S Stormwater Outfalls     | 1,166 | 211   | 0     | 0        | 0     | 0     | 1,377  | 1,106              | 0                  |
| 93            | Riverton Creek Flap Gate Removal           | 1,142 | 15    | 15    | 15       | 15    | 15    | 1,217  | 847                | 15                 |
| 94            | Gilliam Creek Fish Barrier Removal         | 0     | 554   | 1,200 | 1,200    | 15    | 15    | 2,984  | 2,365              | 760                |
| 95            | Tukwila 205 Levee Certification            | 525   | 230   | 865   | 4,600    | 0     | 0     | 6,220  | 5,808              | 0                  |
| 96            | Chinook Wind                               | 215   | 335   | 15    | 15       | 15    | 15    | 610    | 325                | 0                  |
| 97            | Green the Green                            | 103   | 117   | 105   | 115      | 120   | 125   | 685    | 294                | 130                |
| 98            | Surface Water GIS Inventory                | 67    | 100   | 0     | 150      | 0     | 0     | 317    | 0                  | 0                  |
| 99            | Nelson Side Channel                        | 50    | 200   | 600   | 600      | 15    | 15    | 1,480  | 1,150              | 15                 |
| 100           | S 131st PI Drainage Improvements           | 0     | 100   | 690   | 0        | 0     | 0     | 790    | 0                  | 0                  |
| 101           | Northwest Gilliam Storm Drainage System    | 0     | 0     | 0     | 100      | 840   | 0     | 940    | 0                  | 0                  |
| 102           | Surface Water Comprehensive Plan           | 0     | 0     | 200   | 0        | 0     | 0     | 200    | 0                  | 0                  |
| 103           | S 146th St Pipe & 35th Ave S Drainage      | 0     | 0     | 0     | 0        | 166   | 716   | 882    | 0                  | 0                  |
| 104           | Tukwila Pkwy/Gilliam Creek Outfalls        | 0     | 0     | 0     | 0        | 75    | 410   | 485    | 0                  | 0                  |
|               | Soils Reclamation Facility                 | 0     | 0     | 0     | 0        | 0     | 0     | 0      | 0                  | 1,375              |
|               | S 143rd Street Storm Drainage System       | 0     | 0     | 0     | 0        | 0     | 0     | 0      | 0                  | 1,096              |
|               | Nelsen Pl/Longacres Surface Water Phase II | 0     | 0     | 0     | 0        | 0     | 0     | 0      | 0                  | 345                |
|               | Duwamish Rvrbk Stabilization at S 104th St | 0     | 0     | 0     | 0        | 0     | 0     | 0      | 0                  | 595                |
|               | TUC Surface Water Conveyance               | 0     | 0     | 0     | 0        | 0     | 0     | 0      | 0                  | 541                |
|               | Grand Total                                |       | 2,751 | 5,504 | 7,639    | 2,151 | 2,202 | 24,647 | 13,186             | 5,781              |

<sup>\*\*</sup> Denotes other funding sources, grants, or mitigation.

Project sheets scheduled beyond 2024 can be found in the City's website under Public Works Capital Improvement Program.

### Changes from 2017 to 2019 CIP:

#### Deletions:

Gilliam Creek 42 Ave S Surface Water Culvert, surface water completed in 2018. 53rd Ave S Surface Water Drainage, completed in 2018.

### **Surface Water Lift Station Locations**

| Storm Lift Station No. 15 | 5910 S 180th St - Mizuki Grill        |
|---------------------------|---------------------------------------|
| Storm Lift Station No. 16 | 7420 S 180th St (underpass)           |
| Storm Lift Station No. 17 | 530 Strander Blvd - Bicentennial Park |
| Storm Lift Station No. 18 | 4225 S 122nd St - Allentown           |
| Storm Lift Station No. 19 | Fort Dent Park (Parks Dept.)          |

2019 to 2024

PROJECT: Annual Small Drainage Program Project No. 9XX41201

**DESCRIPTION:** Select, design, and construct small drainage projects throughout the City.

JUSTIFICATION: Provide drainage corrections for existing/ongoing drainage problems throughout the City, including culvert

replacements, drain extensions, and pavement upgrades.

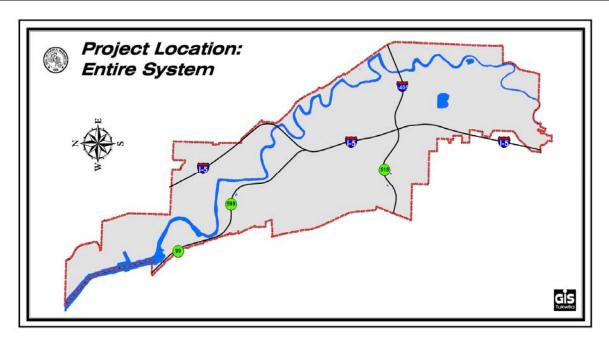
**STATUS:** Projects for this annual program are taken from Small Drainage Project List.

**MAINT. IMPACT:** Reduces maintenance.

COMMENT: Ongoing project, only one year shown in first column. Construction expenses may occur over two calendar

years.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 50      | 80        | 80   | 80   | 80   | 80   | 80   | 80   | 80     | 690   |
| Streamgages/Monitor | 31      | 35        | 35   | 35   | 36   | 36   | 36   | 36   | 40     | 320   |
| Const. Mgmt.        | 90      | 45        | 80   | 80   | 80   | 80   | 80   | 80   | 80     | 695   |
| Construction        | 448     | 600       | 515  | 515  | 514  | 513  | 514  | 514  | 513    | 4,646 |
| TOTAL EXPENSES      | 619     | 760       | 710  | 710  | 710  | 709  | 710  | 710  | 713    | 6,351 |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         | 50        |      |      |      |      |      |      |        | 50    |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 619     | 710       | 710  | 710  | 710  | 709  | 710  | 710  | 713    | 6,301 |
| TOTAL SOURCES       | 619     | 760       | 710  | 710  | 710  | 709  | 710  | 710  | 713    | 6,351 |



2019 2024

**PROJECT: Storm Water Quality Retrofit Program** Project No. 91241202

**DESCRIPTION:** Provide, design, and install water quality testing and improvements at selected drainage locations.

Most surface water is discharged directly to receiving water bodies untreated. JUSTIFICATION:

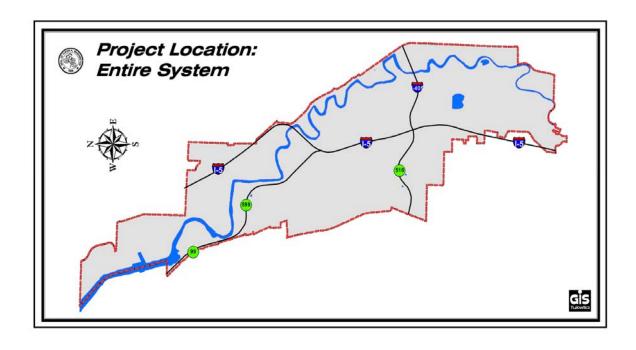
Water quality was added to Interurban Ave S in 2015 and 53rd Ave S in 2018. STATUS:

Expected to increase maintenance. MAINT. IMPACT:

Combine with other CIP projects for design and construction, where feasible. A 2017 WA State Department of **COMMENT:** 

Ecology grant was awarded for \$244,375 with a City match of \$43,125.

| FINANCIAL           | Through | Estimated |      |      |       |      |      |      |        |       |
|---------------------|---------|-----------|------|------|-------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021  | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |       |      |      |      |        |       |
| Design              | 1       |           | 299  | 20   | 20    | 10   | 10   | 15   | 20     | 395   |
| Land (R/W)          |         |           |      |      |       |      |      |      |        | 0     |
| Const. Mgmt.        |         |           | 15   | 15   | 15    | 15   | 15   | 10   | 15     | 100   |
| Construction        |         |           | 45   | 80   | 1,000 | 40   | 80   | 80   | 80     | 1,405 |
| TOTAL EXPENSES      | 1       | 0         | 359  | 115  | 1,035 | 65   | 105  | 105  | 115    | 1,900 |
| FUND SOURCES        |         |           |      |      |       |      |      |      |        |       |
| Awarded Grant       |         |           | 244  |      |       |      |      |      |        | 244   |
| Proposed Grant      |         |           |      |      | 850   |      |      |      |        | 850   |
| Mitigation Actual   |         |           |      |      |       |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |       |      |      |      |        | 0     |
| Utility Revenue     | 1       | 0         | 115  | 115  | 185   | 65   | 105  | 105  | 115    | 806   |
| TOTAL SOURCES       | 1       | 0         | 359  | 115  | 1,035 | 65   | 105  | 105  | 115    | 1,900 |



2019 2024

PROJECT: **NPDES Program** Project No. 99341210

Provide programmatic implementation requirements of NPDES. The Master Drainage Program specifies **DESCRIPTION:** 

a NPDES reporting and action plan for City compliance. The services/supplies funds will also include any illicit

discharge (spill cleanup) costs that may occur in the City's right-of-way.

State NPDES requirements include an annual report, public education and outreach, illicit discharge detection JUSTIFICATION:

and illumination, approved technical standards, staff training, inspections of public and private systems, and

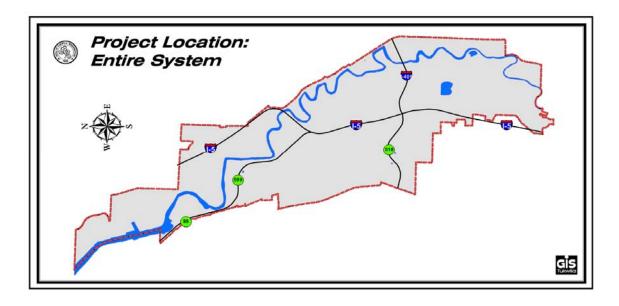
drainage system maps.

STATUS: All current NPDES requirements have been implemented. LID added to TMC in 2017.

Additional cleaning and documentation will require added staff resources. **MAINT. IMPACT:** 

National Pollutant Discharge Elimination System (NPDES). Additional NPDES requirements will be ongoing. **COMMENT:** Costs shown include emergency supplies, testing equipment, DOE testing, and annual public outreach surveys.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Staff               | 1,156   | 222       |      |      |      |      |      |      |        | 1,378 |
| Services/Supplies   | 403     | 50        | 50   | 50   | 55   | 55   | 60   | 60   | 65     | 848   |
| Const. Mgmt.        |         |           |      |      |      |      |      |      |        | 0     |
| Construction        | 12      |           |      |      |      |      |      |      |        | 12    |
| TOTAL EXPENSES      | 1,571   | 272       | 50   | 50   | 55   | 55   | 60   | 60   | 65     | 2,238 |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       | 150     |           |      |      |      |      |      |      |        | 150   |
| Proposed Grant      |         |           |      | 50   |      |      | 60   |      |        | 110   |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 1,421   | 272       | 50   | 0    | 55   | 55   | 0    | 60   | 65     | 1,978 |
| TOTAL SOURCES       | 1,571   | 272       | 50   | 50   | 55   | 55   | 60   | 60   | 65     | 2,238 |



2019 to 2024

PROJECT: WRIA 9 Watershed Planning Project No. 91641205

**DESCRIPTION:** City participation in an Interlocal Agreement with WRIA 9 jurisdictions and administered by King County.

Endangered Species Act (ESA) related project. Services provided by King County Dept. of Natural

JUSTIFICATION: Resources (KCDNRP) under an Interlocal agreement between participating jurisdictions in Water

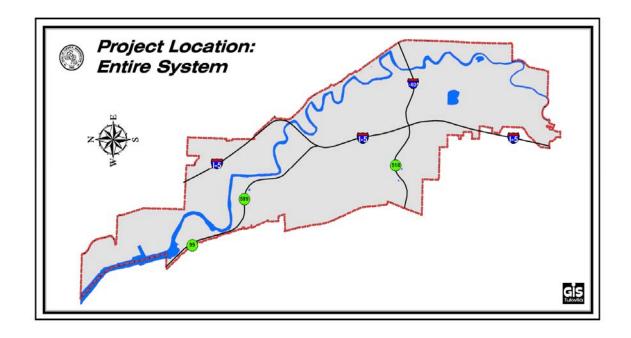
Resource Inventory Area 9 (WRIA 9) and King County. City's contribution is \$12,448 per year.

**STATUS:** Interlocal Agreement has been adopted by all cities with an extension through 2025.

**MAINT. IMPACT:** Policies and recommendations will impact maintenance.

**COMMENT:** Ongoing project, only one year actuals are shown in the first column.

| FINANCIAL                  | Through | Estimated |      |      |      |      |      |      |        |       |
|----------------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)               | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES                   |         |           |      |      |      |      |      |      |        |       |
| Design                     | 12      | 13        | 13   | 14   | 14   | 15   | 15   | 16   | 16     | 128   |
| Land (R/W)                 |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.               |         |           |      |      |      |      |      |      |        | 0     |
| Construction               |         |           |      |      |      |      |      |      |        | 0     |
| TOTAL EXPENSES             | 12      | 13        | 13   | 14   | 14   | 15   | 15   | 16   | 16     | 128   |
| FUND SOURCES               |         |           |      |      |      |      |      |      |        |       |
| King Conservation District | ct      |           | 13   | 14   | 14   | 15   | 15   | 16   | 16     | 103   |
| Proposed Grant             |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual          |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected        |         |           |      |      |      |      |      |      |        | 0     |
| City Oper. Revenue         | 12      | 13        | 0    | 0    | 0    | 0    | 0    | 0    | 0      | 25    |
| TOTAL SOURCES              | 12      | 13        | 13   | 14   | 14   | 15   | 15   | 16   | 16     | 128   |



2019 2024

PROJECT: **East Marginal Wy S Stormwater Outfalls** Project No. 91041204

**DESCRIPTION:** Establish legal drainage connections from East Marginal Way South to the Duwamish River.

Drainage from E Marginal Wy S is discharged through outfalls owned and operated by the Boeing Co., JUSTIFICATION:

Jorgensen Forge, and two King County Airport storm systems without easements.

Jorgensen Forge outfall was closed in 2011 under an order from the US EPA. The Boeing Company STATUS:

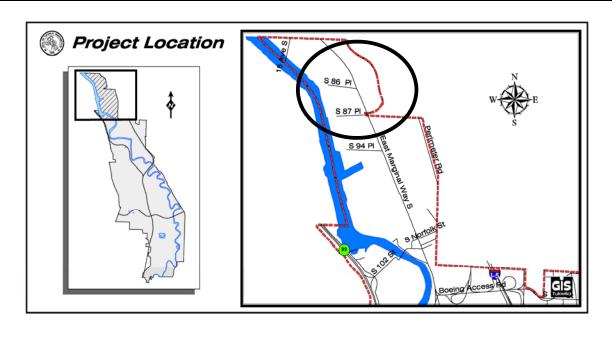
contacted the City in 2009 requesting that the City take over ownership of their storm line and outfall. A

consultant is preparing design for rerouting the Jorgensen outfall and adding water quality features.

Clarifies maintenance responsibility and will ensure reliability of system. **MAINT. IMPACT:** 

City adopted Boeing's Z Line in 2015. Phase II: Line pipe, add water quality device and connect Jorgenson's **COMMENT:** drainage to Boeing's Z Line in 2017 and 2018. DOE design and construction grant awarded in 2015 for \$1.1m.

| FINANCIAL           | Through | Estimated |       |      |      |      |      |      |        |       |
|---------------------|---------|-----------|-------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019  | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |       |      |      |      |      |      |        |       |
| Design              | 201     | 75        |       |      |      |      |      |      |        | 276   |
| Monitoring          | 21      | 11        | 11    | 11   |      |      |      |      |        | 54    |
| Const. Mgmt.        |         |           | 271   |      |      |      |      |      |        | 271   |
| Construction        |         |           | 884   | 200  |      |      |      |      |        | 1,084 |
| TOTAL EXPENSES      | 222     | 86        | 1,166 | 211  | 0    | 0    | 0    | 0    | 0      | 1,685 |
| FUND SOURCES        |         |           |       |      |      |      |      |      |        |       |
| Awarded Grant       | 120     | 56        | 1,106 |      |      |      |      |      |        | 1,282 |
| Awarded Grant       |         |           |       |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |       |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |       |      |      |      |      |      |        | 0     |
| Utility Revenue     | 102     | 30        | 60    | 211  | 0    | 0    | 0    | 0    | 0      | 403   |
| TOTAL SOURCES       | 222     | 86        | 1,166 | 211  | 0    | 0    | 0    | 0    | 0      | 1,685 |



2019 to 2024

PROJECT: **Riverton Creek Flap Gate Removal** Project No. 99830103

Remove two culverts and flap gates at Duwamish River; install pipe arch, create open channel **DESCRIPTION:** 

confluence, install trail bridge over new channel, restore/revegetate 200 feet of creek channel and

450 ft. of pond shoreline.

Increase available salmonid rearing habitat and increase flood refuge in lower Duwamish River. JUSTIFICATION:

Improve fish access to Riverton Creek and enhance salmon rearing and resting area.

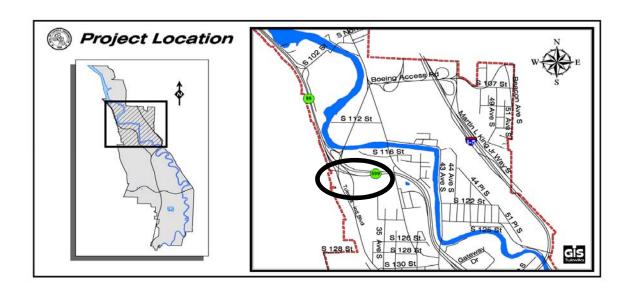
STATUS: Design underway in 2018. Construction grant of \$846k from WA State RCO.

Expected to increase maintenance. **MAINT. IMPACT:** 

Project used as mitigation for East Marginal Way Pipe Replacement Project and HPA COMMENT:

Control #133763-1 requires work to be completed by June 11, 2019, which will need to be extended.

| FINANCIAL           | Through | Estimated |       |      |      |      |      |      |        |       |
|---------------------|---------|-----------|-------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019  | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |       |      |      |      |      |      |        |       |
| Design              | 204     | 100       | 40    |      |      |      |      |      |        | 344   |
| Land (R/W)          |         |           |       |      |      |      |      |      |        | 0     |
| Monitoring          |         |           |       | 15   | 15   | 15   | 15   | 15   | 15     | 90    |
| Const. Mgmt.        |         |           | 184   |      |      |      |      |      |        | 184   |
| Construction        |         |           | 918   |      |      |      |      |      |        | 918   |
| TOTAL EXPENSES      | 204     | 100       | 1,142 | 15   | 15   | 15   | 15   | 15   | 15     | 1,536 |
| FUND SOURCES        |         |           |       |      |      |      |      |      |        |       |
| Awarded Grant       | 72      |           | 847   |      |      |      |      |      |        | 919   |
| Proposed Grant      |         |           |       |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |       |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |       |      |      |      |      |      |        | 0     |
| Utility Revenue     | 132     | 100       | 295   | 15   | 15   | 15   | 15   | 15   | 15     | 617   |
| TOTAL SOURCES       | 204     | 100       | 1,142 | 15   | 15   | 15   | 15   | 15   | 15     | 1,536 |



2019 to 2024

PROJECT: Gilliam Creek Fish Barrier Removal Project No. 99830105

DESCRIPTION: Construct fish passage improvements at existing flap gate location and replace/modify the flap gate

which may include a self-regulating tide gate.

**JUSTIFICATION:** Enable fish access to lower Gilliam Creek under wider range of flow conditions.

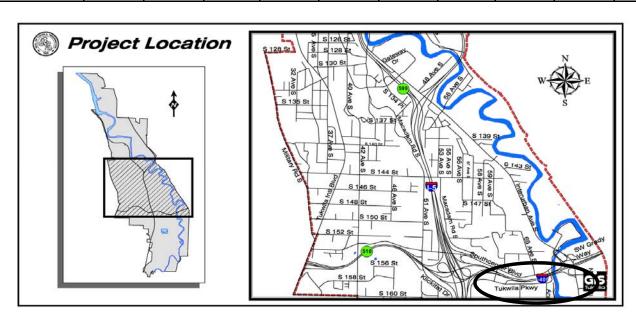
STATUS: Analysis of lower Gilliam Creek is being conducted in 2018 to determine the best solution for fish passage

and to address potential flooding.

**MAINT. IMPACT:** Expected to have an increase in monitoring/maintenance.

**COMMENT:** Grant proposals to State RCO and KC Flood Control District.

| FINANCIAL           | Through | Estimated |      |      |       |       |      |      |        |       |
|---------------------|---------|-----------|------|------|-------|-------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021  | 2022  | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |       |       |      |      |        |       |
| Design              | 39      | 22        |      | 554  |       |       |      |      | 110    | 725   |
| Land (R/W)          |         |           |      |      |       |       |      |      |        | 0     |
| Monitoring          |         |           |      |      |       |       | 15   | 15   | 15     | 45    |
| Const. Mgmt.        |         |           |      |      | 200   | 200   |      |      | 85     | 485   |
| Construction        |         |           |      |      | 1,000 | 1,000 |      |      | 550    | 2,550 |
| TOTAL EXPENSES      | 39      | 22        | 0    | 554  | 1,200 | 1,200 | 15   | 15   | 760    | 3,805 |
| FUND SOURCES        |         |           |      |      |       |       |      |      |        |       |
| Awarded Grant       |         |           |      |      |       |       |      |      |        | 0     |
| Proposed Grant      |         |           |      | 325  | 1,020 | 1,020 |      |      | 500    | 2,865 |
| Mitigation Actual   |         |           |      |      |       |       |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |       |       |      |      |        | 0     |
| City Oper. Revenue  | 39      | 22        | 0    | 229  | 180   | 180   | 15   | 15   | 260    | 940   |
| TOTAL SOURCES       | 39      | 22        | 0    | 554  | 1,200 | 1,200 | 15   | 15   | 760    | 3,805 |



2019 to 2024

PROJECT: Tukwila 205 Levee Certification Project No. 91341203

**DESCRIPTION:** Obtain levee certification for the Tukwila 205 Levee.

The US Army Corps of Engineers no longer provides levee certification services to federally authorized

levees. The existing certification expired in August of 2013. Certification is required for the Federal

Emergency Management Agency to accreditate the levee system as providing a 100-year level of

flood protection.

JUSTIFICATION:

**COMMENT:** 

**STATUS:** Phase I was a overview of entire levee system and Phase II includes identification of levee deficiencies.

MAINT. IMPACT:

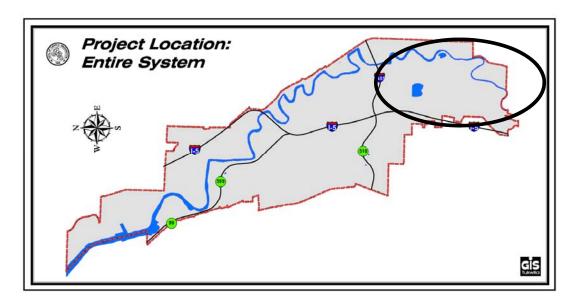
Certification process is expected to lead to additional levee repair projects that are required to meet the

certification criteria. Certification is valid for a 10-year period.

Costs listed in 2019 through 2022 are estimates for potential repairs that would be grant dependent. King County Flood Control District's Opportunity Grant Program currently has \$63k per year. The Army Corps of Engineers is currently designing a levee repair project near Mitchell Moving, GACO, and Segale Properties with

construction in 2019. Overall costs for Corps/Flood District project is \$55 million, with no City funding.

| FINANCIAL              | Through | Estimated |      |      |      |       |      |      |        |       |
|------------------------|---------|-----------|------|------|------|-------|------|------|--------|-------|
| (in \$000's)           | 2017    | 2018      | 2019 | 2020 | 2021 | 2022  | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES               |         |           |      |      |      |       |      |      |        |       |
| Certification Phase I  | 350     |           |      |      |      |       |      |      |        | 350   |
| Certification Phase II | 93      | 220       | 250  |      |      |       |      |      |        | 563   |
| Design                 |         |           | 275  |      |      |       |      |      |        | 275   |
| Const. Mgmt.           |         |           |      | 30   | 115  | 600   |      |      |        | 745   |
| Construction           |         |           |      | 200  | 750  | 4,000 |      |      |        | 4,950 |
| TOTAL EXPENSES         | 443     | 220       | 525  | 230  | 865  | 4,600 | 0    | 0    | 0      | 6,883 |
| FUND SOURCES           |         |           |      |      |      |       |      |      |        |       |
| KC Flood Control       | 113     | 63        | 63   | 63   | 63   | 63    | 63   | 63   | 63     | 617   |
| Proposed Grants        |         |           |      | 150  | 780  | 4,500 |      |      |        | 5,430 |
| Mitigation Actual      |         |           |      |      |      |       |      |      |        | 0     |
| Mitigation Expected    |         |           |      |      |      |       |      |      |        | 0     |
| Utility Revenue        | 330     | 157       | 462  | 17   | 22   | 37    | (63) | (63) | (63)   | 836   |
| TOTAL SOURCES          | 443     | 220       | 525  | 230  | 865  | 4,600 | 0    | 0    | 0      | 6,883 |



2019 2024

PROJECT: **Chinook Wind** Project No. 91441202

King County purchased site and will restore it as a salmon estuary and passive park in partnership **DESCRIPTION:** 

with the City.

The WRIA 9 Salmon Recovery Plan recommends creating 20-acres of off-channel habitat within the JUSTIFICATION:

Duwamish Transition Zone and lists this section of the river as critical habitat for salmon recovery

within the Green/Duwamish Watershed.

Property purchased and site cleared by King County in 2015 using King Conservation Futures and STATUS:

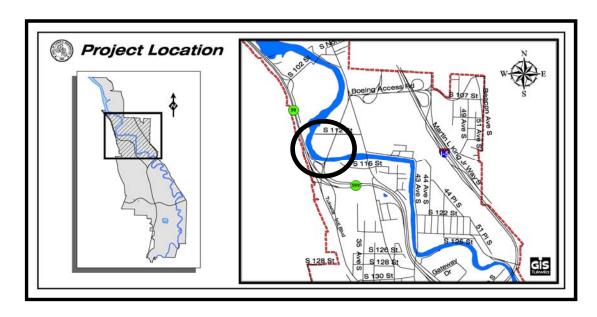
King County Mitigation Bank. Site planned to be turned over to Tukwila.

MAINT. IMPACT: Passive park will require additional maintenance and will include Duwamish Gardens.

Grant funding for construction is from the KC Mitigation Bank. City applied for State RCO grant of \$138k COMMENT:

for trail & parking.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 7       | 9         | 75   | 25   |      |      |      |      |        | 116   |
| Land (R/W)          | 52      |           | 125  |      |      |      |      |      |        | 177   |
| Monitoring          |         |           | 15   | 15   | 15   | 15   | 15   | 15   | 15     | 105   |
| Const. Mgmt.        |         |           |      | 20   |      |      |      |      |        | 20    |
| Construction        |         |           |      | 275  |      |      |      |      |        | 275   |
| TOTAL EXPENSES      | 59      | 9         | 215  | 335  | 15   | 15   | 15   | 15   | 15     | 693   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      | 138  |      |      |      |      |        | 138   |
| Proposed Grant      |         |           | 50   | 137  |      |      |      |      |        | 187   |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| City Oper. Revenue  | 59      | 9         | 165  | 60   | 15   | 15   | 15   | 15   | 15     | 368   |
| TOTAL SOURCES       | 59      | 9         | 215  | 335  | 15   | 15   | 15   | 15   | 15     | 693   |



2019 to 2024

PROJECT: Green the Green Project No. 91641202

Interdepartmental effort to provide trees along the Green River and its tributaries in order to provide shade **DESCRIPTION:** 

and cooler water temperatures to threatened salmon and steelhead.

WRIA 9 has identified warm water temperatures as an impediment to salmon recovery, and has also started JUSTIFICATION:

a funding program called, "ReGreen the Green" which aims to support revegetation projects along the river.

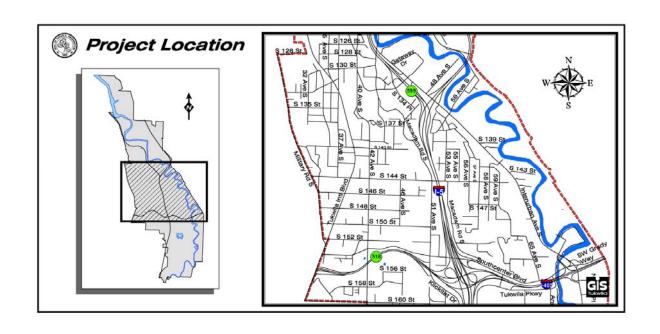
Project sites have been identified. Other planting opportunities are being identified in a collaborative effort STATUS:

between Public Works and DCD.

Expected to increase maintenance. **MAINT. IMPACT:** 

Proposed grant funding is from WRIA9 King County Flood Control District and others. COMMENT:

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 14      |           | 20   | 20   | 20   | 25   | 25   | 25   | 30     | 179   |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Monitoring          |         |           |      | 20   | 20   | 30   | 30   | 40   | 40     | 180   |
| Const. Mgmt.        | 1       | 5         | 15   | 10   | 15   | 10   | 15   | 10   | 10     | 91    |
| Construction        |         | 15        | 68   | 67   | 50   | 50   | 50   | 50   | 50     | 400   |
| TOTAL EXPENSES      | 15      | 20        | 103  | 117  | 105  | 115  | 120  | 125  | 130    | 850   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       | 8       |           | 44   | 50   |      |      |      |      |        | 102   |
| Proposed Grant      |         |           |      |      | 50   | 50   | 50   | 50   | 50     | 250   |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| City Oper. Revenue  | 7       | 20        | 59   | 67   | 55   | 65   | 70   | 75   | 80     | 498   |
| TOTAL SOURCES       | 15      | 20        | 103  | 117  | 105  | 115  | 120  | 125  | 130    | 850   |



2019 2024

Project No. 90241201 80241201 **PROJECT: Surface Water GIS Inventory** 

The GIS (Geographic Information Systems) inventory establishes citywide as-built drawings for the public **DESCRIPTION:** 

drainage systems. This is an ongoing project as all CIP and development infrastructure improvements will

need to be mapped.

State NPDES requirements include provisions for permitted jurisdictions to compile accurate drainage JUSTIFICATION:

system maps for all outfalls 24" or greater.

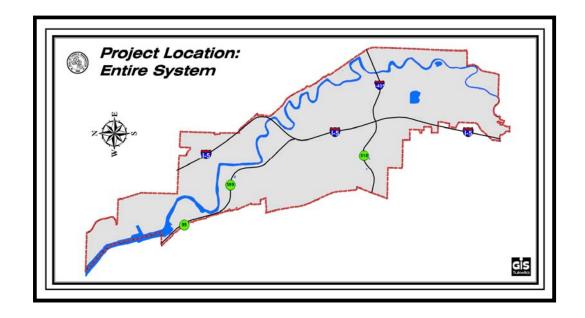
GIS mapping was completed citywide in 2013. Future contracts will keep maps up to date as projects STATUS:

change the existing system. Combined Asset Management System scheduled for 2017.

GIS information will allow maintenance to better track storm facility maintenance needs. MAINT. IMPACT:

**COMMENT:** National Pollution Discharge Elimination System (NPDES). Department of Ecology grants for NPDES permit.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 1,421   | 100       | 67   | 100  |      | 150  |      |      |        | 1,838 |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      |      |      |        | 0     |
| Construction        |         |           |      |      |      |      |      |      |        | 0     |
| TOTAL EXPENSES      | 1,421   | 100       | 67   | 100  | 0    | 150  | 0    | 0    | 0      | 1,838 |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       | 218     | 50        |      |      |      |      |      |      |        | 268   |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   | 100     |           |      |      |      |      |      |      |        | 100   |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 1,103   | 50        | 67   | 100  | 0    | 150  | 0    | 0    | 0      | 1,470 |
| TOTAL SOURCES       | 1,421   | 100       | 67   | 100  | 0    | 150  | 0    | 0    | 0      | 1,838 |



2019 to 2024

PROJECT: **Nelsen Salmon Habitat Side Channel** Project No. 91641203

Create an off-channel salmon rearing habitat side channel by connecting a segment of historic river **DESCRIPTION:** 

channel with the Green River.

WRIA 9 has identified this project a proposed action in the Salmon Habitat Plan. JUSTIFICATION:

The project area is primarily within State lands. The project will involve adjacent properties, and the need STATUS:

for flood protection will need to be analyzed. The Project scope and project area, including any potential

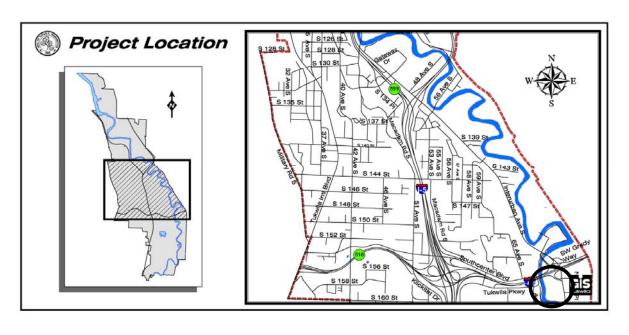
property acquisition, needs to be defined and a feasibility study performed.

Expected to increase maintenance **MAINT. IMPACT:** 

Property acquisition to the north could create the opportunity for a side channel and additional flood storage. **COMMENT:** 

Grant funding proposed from King County Flood Control District and State.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              |         |           | 50   | 200  |      |      |      |      |        | 250   |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Monitoring          |         |           |      |      |      |      | 15   | 15   | 15     | 45    |
| Const. Mgmt.        |         |           |      |      | 100  | 100  |      |      |        | 200   |
| Construction        |         |           |      |      | 500  | 500  |      |      |        | 1,000 |
| TOTAL EXPENSES      | 0       | 0         | 50   | 200  | 600  | 600  | 15   | 15   | 15     | 1,495 |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      | 150  | 500  | 500  |      |      |        | 1,150 |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| City Oper. Revenue  | 0       | 0         | 50   | 50   | 100  | 100  | 15   | 15   | 15     | 345   |
| TOTAL SOURCES       | 0       | 0         | 50   | 200  | 600  | 600  | 15   | 15   | 15     | 1,495 |



2019 to 2024

PROJECT: **S 131st Place Drainage Improvements** Project No. 91641204

Design and replace an existing 36" culvert under S. 131st Pl. Raise the roadway approximately 18" and/or **DESCRIPTION:** 

provide a concrete wall or other means to keep Southgate Creek within its banks during storm events.

Southgate Creek overtops its bank several times per year during storm events and runs through private property. JUSTIFICATION:

Debris is deposited within a private driveway and storm system.

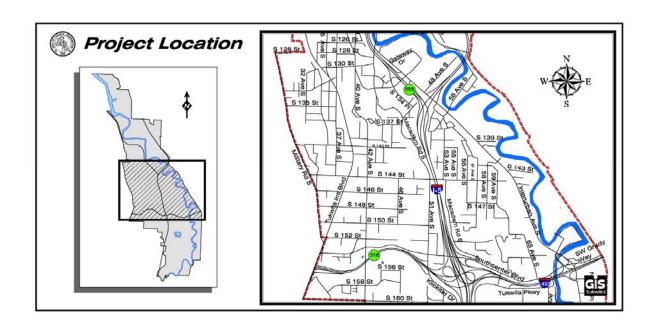
Maintenance is performed annually on the creek to remove excess sedimentation to reduce the likelihood STATUS:

of flooding.

MAINT. IMPACT: Reduce the frequency of stream sediment removal and storm cleanup.

**COMMENT:** Project will require an HPA. Look at combining with a future overlay project to reduce overall costs.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              |         |           |      | 100  |      |      |      |      |        | 100   |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      | 90   |      |      |      |        | 90    |
| Construction        |         |           |      |      | 600  |      |      |      |        | 600   |
| TOTAL EXPENSES      | 0       | 0         | 0    | 100  | 690  | 0    | 0    | 0    | 0      | 790   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| City Oper. Revenue  | 0       | 0         | 0    | 100  | 690  | 0    | 0    | 0    | 0      | 790   |
| TOTAL SOURCES       | 0       | 0         | 0    | 100  | 690  | 0    | 0    | 0    | 0      | 790   |



2019 to 2024

PROJECT: **Northwest Gilliam Basin Storm Drainage System** Project No. 90341206

Upgrade existing storm drainage system. Provide water quality treatment manholes at the downstream **DESCRIPTION:** end of the retrofitted drainage systems. Provide asphalt overlay and extruded asphalt curb for all streets.

Reduces right-of-way and private property flooding by increasing the hydraulic capacity of the existing JUSTIFICATION:

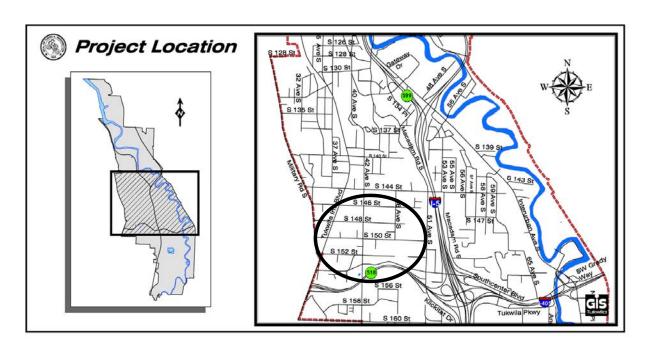
storm drainage system. Water quality manholes remove sediment and oil from street runoff.

S 146th St was completed in 2009 and S 150th in 2015 with Thorndyke Safe Routes to School. STATUS: Remaining streets include S 148th St and S 152nd St.

**MAINT. IMPACT:** Expected to decrease maintenance.

Where feasible, combine with future water quality and overlay projects to reduce costs and construction impact. **COMMENT:** 

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              |         |           |      |      |      | 100  |      |      |        | 100   |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      | 40   |      |        | 40    |
| Construction        |         |           |      |      |      |      | 800  |      |        | 800   |
| TOTAL EXPENSES      | 0       | 0         | 0    | 0    | 0    | 100  | 840  | 0    | 0      | 940   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 0       | 0         | 0    | 0    | 0    | 100  | 840  | 0    | 0      | 940   |
| TOTAL SOURCES       | 0       | 0         | 0    | 0    | 0    | 100  | 840  | 0    | 0      | 940   |



2019 2024

PROJECT: **Surface Water Comprehensive Plan** Project No. 91041202

Periodically revise and update the adopted Surface Water Comprehensive Plan to: 1) Incorporate the latest requirements of the National Pollution Discharge Elimination System (NPDES) and Endangered Species Act **DESCRIPTION:** 

(ESA); 2) Update Capital Improvement Projects to reflect current needs and completed projects; 3) Include GIS

based basin and system maps as they become available; and 4) Revise Storm Water ordinance as needed.

The latest requirements from regulatory agencies as well as newly identified City needs must be included in JUSTIFICATION:

a regularly updated Surface Water Comprehensive Plan.

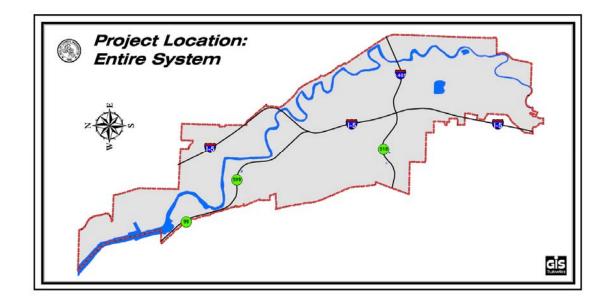
The Surface Water Comprehensive Plan was completed in 2003 and updated in 2013. Future updates are STATUS:

planned on a 7-year cycle with the next update in 2021.

**MAINT. IMPACT:** 

**COMMENT:** 

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              | 163     |           |      |      | 200  |      |      |      |        | 363   |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      |      |      |        | 0     |
| Construction        |         |           |      |      |      |      |      |      |        | 0     |
| TOTAL EXPENSES      | 163     | 0         | 0    | 0    | 200  | 0    | 0    | 0    | 0      | 363   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 163     | 0         | 0    | 0    | 200  | 0    | 0    | 0    | 0      | 363   |
| TOTAL SOURCES       | 163     | 0         | 0    | 0    | 200  | 0    | 0    | 0    | 0      | 363   |



2019 to 2024

PROJECT: S 146th St Pipe and 35th Ave S Drainage System Project No. 90341214

**DESCRIPTION:**Replace existing storm drainage system on S 146th St and provide new storm drainage system for 35th Ave S.

Provide asphalt overlay and extruded asphalt curb for both streets.

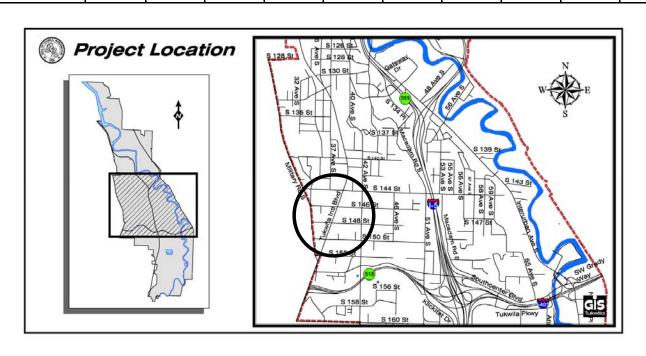
**JUSTIFICATION:** Reduce right-of-way and private property flooding by increasing the capacity of the storm drainage system.

**STATUS:** Maintenance is monitoring area during storm events.

**MAINT. IMPACT:** Expanded system will require additional maintenance.

### COMMENT:

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              |         |           |      |      |      |      | 166  |      |        | 166   |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      |      | 111  |        | 111   |
| Construction        |         |           |      |      |      |      |      | 605  |        | 605   |
| TOTAL EXPENSES      | 0       | 0         | 0    | 0    | 0    | 0    | 166  | 716  | 0      | 882   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 0       | 0         | 0    | 0    | 0    | 0    | 166  | 716  | 0      | 882   |
| TOTAL SOURCES       | 0       | 0         | 0    | 0    | 0    | 0    | 166  | 716  | 0      | 882   |



2019 2024

PROJECT: Tukwila Parkway/Gilliam Creek Surface Water Outfalls Project No. 91241205

Install a new 84" manhole structure on the existing 48" Andover Park W/Tukwila Parkway pipe and a **DESCRIPTION:** 

72" manhole structure on the 30" pipe west of Andover Park E/Tukwila Parkway and provide slide gates

with discharge ports.

JUSTIFICATION:

The existing 48" and 30" City stormwater pipes discharge to a 108" WSDOT pipe that conveys Gilliam Creek.

The flow line of the WSDOT pipe is approximately 1.6 feet above that of the City pipes that discharge to it. This

results in a backwater condition within the City pipes for several hundred feet and prevents inspection and

cleaning of those pipes.

STATUS: Maintenance inspected system in 2015 and determined pipes are in adequate condition.

**MAINT. IMPACT:** After project completion, maintenance will be able to clean and inspect the pipes.

**COMMENT:** New manhole structures will include the slide gates which will control water flow during maintenance.

| FINANCIAL           | Through | Estimated |      |      |      |      |      |      |        |       |
|---------------------|---------|-----------|------|------|------|------|------|------|--------|-------|
| (in \$000's)        | 2017    | 2018      | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | BEYOND | TOTAL |
| EXPENSES            |         |           |      |      |      |      |      |      |        |       |
| Design              |         |           |      |      |      |      | 75   |      |        | 75    |
| Land (R/W)          |         |           |      |      |      |      |      |      |        | 0     |
| Const. Mgmt.        |         |           |      |      |      |      |      | 85   |        | 85    |
| Construction        |         |           |      |      |      |      |      | 325  |        | 325   |
| TOTAL EXPENSES      | 0       | 0         | 0    | 0    | 0    | 0    | 75   | 410  | 0      | 485   |
| FUND SOURCES        |         |           |      |      |      |      |      |      |        |       |
| Awarded Grant       |         |           |      |      |      |      |      |      |        | 0     |
| Proposed Grant      |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Actual   |         |           |      |      |      |      |      |      |        | 0     |
| Mitigation Expected |         |           |      |      |      |      |      |      |        | 0     |
| Utility Revenue     | 0       | 0         | 0    | 0    | 0    | 0    | 75   | 410  | 0      | 485   |
| TOTAL SOURCES       | 0       | 0         | 0    | 0    | 0    | 0    | 75   | 410  | 0      | 485   |

