

REVISED HIGHLANDS ZONAL IMPACT FEE ANALYSIS

June 1, 2021



PREPARED BY:



**11 North 300 West
Washington, UT 84780**

1 INTRODUCTION

Washington City has contracted with Sunrise Engineering Inc. to prepare a zonal impact fee for the proposed Highlands Pressure Zone. An impact fee that is charged by a community may be used to pay for capital costs and the debt service associated with surplus capacity built into the system provided actual costs can be documented. The surplus capacity in the water system can be assessed to growth, and for this reason, impact fees can pay for that portion of the debt service associated with the system surplus capacity. The impact fee should also be used to pay for the cost of improvements to the system that are required to support new growth as new connections are added to the system.

A zonal impact fee is a localized impact fee that is only charged to a specific area or zone. In this case the proposed improvements are only required for the Highlands and Sullivan developments located in the proposed Highlands Pressure Zone. The cost of these improvements should not be supported by residents outside this area or “zone”. This zonal impact fee should be charged to pay the costs for projects that are required to develop in the area or “zone”. A zonal impact fee is charged in addition to the standard impact fee charged by the City.

2 IMPACT FEES

2.1 Existing Impact Fees

The existing Washington City water impact fee is \$2,412. This impact fee was determined during the City’s most recent Culinary Water Master Plan. Currently the City does not have any zonal impact fees for the water impact fee. However the City does have a Parkway zonal impact fee for the streets impact fee.

2.2 Proposed Impact Fees

A design report was prepared by Horrocks Engineers to determine the public facilities requirement to serve the new Highlands Pressure Zone. This new pressure zone will serve new residential development that is located south and east of the existing Grapevine 1 million gallon water storage tank. This zone is projected to have a maximum of 298 Equivalent Residential Units (ERU). These ERU include 250 residential buildings in the Highlands development, 8 “civic” ERU’s in that development, and 40 additional residential units from the Sullivan Development that could potentially be served in the area.

The projects presented in the report provided by Horrocks Engineers are all required for growth to occur in the Highland Pressure Zone. Because of this, all of the projects are impact fee eligible. Economic factors have led to significantly increased construction and materials prices. A public bidding process for this project resulted in the total cost for the proposed facilities of approximately \$2,135,914 including the water tank, chlorination facility, pipeline, and pumping facility.

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The water storage tank was included in the City's 2016 master plan and impact fee analysis, but at the time the tank cost estimate was \$778,000. This amount has already been factored into the overall culinary water impact fee for the City. The equivalent tank portion of the project is now estimated at \$1,331,366. For this analysis, the difference between the 2016 tank estimate and the current bid costs is considered impact fee eligible. The impact fee eligible cost of all items is \$1,470,114 and is outlined in Table 2-1.

The combined total impact fee eligible cost is divided by the projected number of new ERUs that will be added to the system. Please note that this impact fee calculation assumes that Washington City is in agreement with WCWCD Regional Water Supply Agreement and thus will not need to purchase any additional water right. Should the City choose otherwise, the impact fee should be adjusted accordingly.

It is recommended that Washington City charge a zonal impact fee for each new ERU or meter in the Highlands Pressure Zone. The recommended zonal impact fee for the proposed Highlands Pressure Zone is **\$4,933**. This zonal impact fee will be paid in addition to the City's existing culinary water impact fee.

The zonal impact fee combined with the current City culinary water impact fee results in a total impact fee of **\$7,345** for this zonal area.

Table 2-1: Impact Fee Calculation

Impact Fee Analysis Washington City - Highlands				
Proposed Improvement Projects (FY2018-2028)	Total EOPC	Impact Fee % Eligible	Eligible Costs	
Water Tank (Included in City Impact Fee)	\$ 1,331,366	42%	\$	553,366
Water Line	\$ 231,348	100%	\$	231,348
Chlorinator Building	\$ 446,500	100%	\$	446,500
Pump Station Remodel	\$ 238,900	100%	\$	238,900
Subtotal			\$	1,470,114
Total Cost Eligible For Impact Fee			\$	1,470,114
ERU in Coral Canyon 3				250
Residential ERU's Benefited Outside of Coral Canyon 3				40
Civic ERU's In Highlands Pressure Zone				8
No. of New ERUs Due to Growth				298
Maximum Zonal Impact Fee = Total Eligible Cost / New ERU's			\$	4,933.00
Total Impact Fee for Zone = Zonal Impact Fee + City Impact Fee			\$	7,345.00

APPENDIX A

Engineers Opinion of Probable Cost

SUNRISE ENGINEERING, INC.

11 North 300 West, Washington, Utah 84780

Tel: (435) 652-8450 Fax: (435) 652-8416

Engineer's Opinion of Probable Cost**Highlands Water Tank**
Washington City1-Jun-21
BCW/dws

NO.	DESCRIPTION	EST. QTY	UNIT	UNIT PRICE	AMOUNT
GENERAL CONSTRUCTION					
1	Mobilization, Pre-Con DVD, Dust Control, Subsurface Inv., Env. Comp.	7%	LS	\$ 81,800.00	\$ 81,800.00
2	8" C-900 PVC Pipe	373	LF	\$ 44.50	\$ 16,598.50
3	12" C-900 PVC Pipe	123	LF	\$ 87.50	\$ 10,762.50
4	Chain Link Fence and Gate	1	LS	\$ 46,400.00	\$ 46,400.00
5	Aluminum Staircase w/ Powder Coat	1	LS	\$ 48,400.00	\$ 48,400.00
6	500,000 Gallon Concrete Water Tank	1	LS	\$ 858,000.00	\$ 858,000.00
7	Tank Grading	1	LS	\$ 116,500.00	\$ 116,500.00
8	Tank Access Road (6" Min Road Base)	156	CY	\$ 73.00	\$ 11,388.00
9	4" SCH 40 Drain Pipe	76	LF	\$ 29.50	\$ 2,242.00
10	Reseeding the Tank Site	1.5	AC	\$ 3,850.00	\$ 5,775.00
11	Tank Mechanical Piping	1	LS	\$ 32,100.00	\$ 32,100.00
12	Restore Surface Improvements	1	LS	\$ 8,800.00	\$ 8,800.00
13	Material Testing	1	LS	\$ 11,600.00	\$ 11,600.00
SUBTOTAL					\$ 1,250,366.00
CONTINGENCY				0%	\$ -
CONSTRUCTION TOTAL					\$ 1,250,366.00
INCIDENTALS					
1	Bidding & Negotiating	0.5%	HR	\$ 6,000.00	\$ 6,000.00
2	Engineering Construction Services	5.6%	HR	\$ 75,000.00	\$ 75,000.00
SUBTOTAL					\$ 81,000.00
TOTAL PROJECT COST					\$ 1,331,366.00

In providing opinions of probable construction cost, the Client understands that the Engineer has no control over costs or the price of labor, equipment or materials, or over the Contractor's method of pricing, and that the opinion of probable construction cost provided herein is made on the basis of the Engineer's qualifications and experience. The Engineer makes no warranty, expressed or implied, as to the accuracy of such opinions compared to bid or actual costs.

SUNRISE ENGINEERING, INC.

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Tel: (435) 652-8450 Fax: (435) 652-8416

Engineer's Opinion of Probable Cost**Highlands Water Line**

Washington City

1-Jun-21

BCW/dws

NO.	DESCRIPTION	EST. QTY	UNIT	UNIT PRICE	AMOUNT
GENERAL CONSTRUCTION					
1	Mobilization, Pre-Con DVD, Dust Control, Subsurface Inv., Env. Comp.	7%	LS	\$ 15,000.00	\$ 15,000.00
2	Inlet Connection to Existing Pipe	1	EA	\$ 12,700.00	\$ 12,700.00
3	Drain Connection to Existing Pipe	1	EA	\$ 1,650.00	\$ 1,650.00
4	Waterline Connection	1	LS	\$ 6,150.00	\$ 6,150.00
5	Reseeding Disturbed Area Outside of Trail	0.12	AC	\$ 3,850.00	\$ 462.00
6	Remove Existing 8" Pipe	522	LS	\$ 13.00	\$ 6,786.00
7	Abandon Existing Air Valve	1	LS	\$ 2,650.00	\$ 2,650.00
8	12" C-900 PVC pipe	1,080	LF	\$ 60.00	\$ 64,800.00
9	Drain Discharge	1	LS	\$ 3,750.00	\$ 3,750.00
10	Restore Surface Improvements	1	LS	\$ 4,400.00	\$ 4,400.00
11	Biological Monitor (Active Season)	1	LS	\$ 71,000.00	\$ 71,000.00
12	HCP Active Season Mitigation	1	LS	\$ 40,000.00	\$ 40,000.00
SUBTOTAL					\$ 229,348.00
CONTINGENCY				0%	\$ -
CONSTRUCTION TOTAL					\$ 229,348.00
INCIDENTALS					
1	Bidding & Negotiating	0.9%	HR	\$ 2,000.00	\$ 2,000.00
2	Engineering Construction Services	9.9%	HR	\$ 22,900.00	\$ -
SUBTOTAL					\$ 2,000.00
TOTAL PROJECT COST					\$ 231,348.00

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SUNRISE ENGINEERING, INC.

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Engineer's Opinion of Probable Cost**Highlands Chlorinator Building**
Washington City1-Jun-21
BCW/dws

NO.	DESCRIPTION	EST. QTY	UNIT	UNIT PRICE	AMOUNT
GENERAL CONSTRUCTION					
1	Mobilization, Pre-Con DVD, Dust Control, Subsurface Inv., Env. Comp.	7%	LS	\$ 27,400.00	\$ 27,400.00
2	Chlorinator Structural	1	LS	\$ 121,000.00	\$ 121,000.00
3	Chlorinator Electrical/HVAC	1	S	\$ 94,400.00	\$ 94,400.00
4	8" Siemons Steel Flow Meter (Sitrans FM Mag 5100 W) FLG X F	2	EA	\$ 10,100.00	\$ 20,200.00
5	12" Siemons Steel Flow Meter (Sitrans FM Mag 5100 W) FLG X F	1	EA	\$ 12,800.00	\$ 12,800.00
6	Precast Concrete Vault	1	EA	\$ 12,500.00	\$ 12,500.00
7	8" Chlorine Mixer FLG X FLG	1	EA	\$ 15,300.00	\$ 15,300.00
8	Booster Pump	1	EA	\$ 7,200.00	\$ 7,200.00
9	Chlorinator Mechanical Piping	1	LS	\$ 50,500.00	\$ 50,500.00
10	Regal Gas Chlorinator	1	LS	\$ 27,000.00	\$ 27,000.00
11	SCADA	1	LS	\$ 31,000.00	\$ 31,000.00
SUBTOTAL					\$ 419,300.00
CONTINGENCY				0%	\$ -
CONSTRUCTION TOTAL					\$ 419,300.00
INCIDENTALS					
1	Bidding & Negotiating	0.4%	HR	\$ 2,000.00	\$ 2,000.00
2	Engineering Construction Services	5.6%	HR	\$ 25,200.00	\$ 25,200.00
SUBTOTAL					\$ 27,200.00
TOTAL PROJECT COST					\$ 446,500.00

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SUNRISE ENGINEERING, INC.

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Engineer's Opinion of Probable Cost**Highlands Pump Station Remodel**

Washington City

1-Jun-21

BCW/dws

NO.	DESCRIPTION	EST. QTY	UNIT	UNIT PRICE	AMOUNT
GENERAL CONSTRUCTION					
1	Mobilization, Pre-Con DVD, Dust Control, Subsurface Inv., Env. Comp.	7%	LS	\$ 15,500.00	\$ 15,500.00
2	Pump Station Demolition	1	LS	\$ 15,000.00	\$ 15,000.00
3	Pump Station Electrical / HVAC	1	LS	\$ 104,000.00	\$ 104,000.00
4	4" Pump	1	EA	\$ 25,200.00	\$ 25,200.00
5	Pump Station Mechanical Piping	1	LS	\$ 36,200.00	\$ 36,200.00
6	Precast Manhole	1	EA	\$ 3,550.00	\$ 3,550.00
7	Electric Motor Actuated Butterfly Valve	1	EA	\$ 9,550.00	\$ 9,550.00
8	Restore Surface Improvements	1	LS	\$ 4,400.00	\$ 4,400.00
9	SCADA	1	LS	\$ 23,500.00	\$ 23,500.00
SUBTOTAL					\$ 236,900.00
CONTINGENCY				0%	\$ -
CONSTRUCTION TOTAL					\$ 236,900.00
INCIDENTALS					
1	Bidding & Negotiating	0.8%	HR	\$ 2,000.00	\$ 2,000.00
2	Engineering Construction Services	4.0%	HR	\$ 9,500.00	\$ -
SUBTOTAL					\$ 2,000.00
TOTAL PROJECT COST					\$ 238,900.00

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APPENDIX B

Impact Fee Certification

CERTIFICATION OF IMPACT FEE ANALYSIS BY CONSULTANT

In accordance with Utah Code Annotated, § 11-36a-306 Dustyn W. Shaffer, P.E., on behalf of Sunrise Engineering, Inc., makes the following certification:

I certify that the attached zonal impact fee analysis:

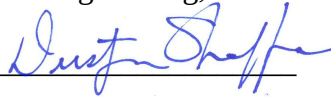
1. Includes only the costs for qualifying public facilities that are:
 - a. Allowed under the Impact Fees Act; and
 - b. Actually incurred; or
 - c. Projected to be incurred or encumbered within six years after each impact fee is paid;
2. Does not include:
 - a. Costs of operation and maintenance of public facilities;
 - b. Costs for qualifying public facilities that will raise the level of service for the facilities, through impact fees, above the level of service that is supported by existing residents;
 - c. An expense for overhead, unless the expense is calculated pursuant to a methodology that is consistent with generally accepted cost accounting practices and that methodological standards set forth by the federal Office of Management and Budget for federal grant reimbursement; and
3. Offsets costs with grants or other alternate sources of payment (if grants or other sources of payment have been applied for and received and such information was made available when the Impact Fee Analysis was prepared); and
4. Complies in each and every relevant respect with the Impact Fees Act.

Dustyn W. Shaffer, P.E. makes this certification with the following qualifications:

1. All the recommendations made in the Impact Fee Analysis documents are followed in their entirety by Washington City, Utah staff and elected officials.
2. If all or a portion of the Impact Fee Analyses are modified or amended, this certification is no longer valid.

3. All information provided to Sunrise Engineering, Inc., its contractors or suppliers is assumed to be correct, complete and accurate. This includes information provided by Washington City, Utah, and outside sources.
4. The undersigned is trained and licensed as a professional engineer and has not been trained or licensed as a lawyer. Nothing in the foregoing certification shall be deemed an opinion of law or an opinion of compliance with law which under applicable professional licensing laws or regulations or other laws or regulations must be rendered by a lawyer licensed in the State of Utah.
5. The foregoing Certification is an expression of professional opinion based on the undersigned's best knowledge, information and belief and shall not be construed as a warranty or guaranty of any fact or circumstance.
6. The foregoing certification is made only to Washington City, Utah and may not be used or relied upon by any other person or entity without the expressed written authorization of the undersigned.

Sunrise Engineering, Inc.

By: 

Dated: 6.2.21