

# Farmington, Utah



## Water Impact Fee Analysis



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## EXECUTIVE SUMMARY

An impact fee is a one-time fee imposed on new development activity to mitigate the impact of new development on capital facilities. In conjunction with this Impact Fee Analysis, J-U-B Engineers prepared the *Farmington City Corporation Culinary Water Impact Fee Facilities Plan* (IFFP) dated April 2021 and amended June 2022. The IFFP forms the basis for this impact fee analysis.

The recommended impact fee structure presented in this analysis has been prepared to satisfy the Impact Fees Act, Utah Code Ann. § 11-36a-101 et. seq., and represents the maximum impact fees Farmington City Corporation (“City”) may assess. The City will be required to use revenue sources other than impact fees to fund any projects that constitute repair and replacement, cure any existing deficiencies, or increase the level of service for existing users.

### Water Service Levels

Level of service (LOS) defines the water capital facility demands that a typical Equivalent Residential Connection (ERC), will require and should pay for with impact fees. The IFFP defines existing and proposed service levels as follows per ERC:

- Source component – State requirements of 800 gpd per ERC/146,000 gal per year per ERC
- Storage component – 450 gal/day per ERC
- Delivery component – 620 gal/day per ERC

### Water Service Area

There is one service area for culinary water that encompasses the boundaries of Farmington City.

### Water Capital Facilities

The IFFP identifies excess storage capacity of about 6.3 percent of existing storage, as well as 31 percent of excess capacity in the distribution system.

TABLE 1: EXCESS CAPACITY IN EXISTING SYSTEM

	Storage	Distribution
Actual Cost	\$5,089,687	\$3,070,251
% Excess Capacity 2021	6.3%	31.0%
% Excess Capacity 2031	0%	15.0%
Cost Consumed by New Development, 2021-2031	\$320,650	\$491,240
Source: <i>Farmington City Corporation Culinary Water Impact Fee Facilities Plan. Farmington City Corporation Culinary Water Asset List</i>		

Total new construction costs required by growth in new development over the next 10 years are projected to reach \$7,596,175.

TABLE 2: NEW CONSTRUCTION PROJECTS

Source	Storage	Distribution	Total
\$1,636,000	\$2,889,143	\$3,071,032	\$7,596,175
Source: <i>Farmington City Corporation Culinary Water Impact Fee Facilities Plan</i>			

## Water System Impact Fee Calculation

The gross impact fee is \$4,270.74 per ERC.

**TABLE 3: GROSS IMPACT FEE PER ERC**

<b>SUMMARY OF IMPACT FEE COSTS</b>	
Existing Capacity - Storage	\$175.12
Existing Capacity - Distribution	\$268.29
New – Source	\$893.50
New - Storage	\$1,577.90
New - Distribution	\$1,677.24
Consultant Costs	\$32.58
Fund Balance Credit	(\$353.90)
<b>Gross Cost per ERC</b>	<b>\$4,270.74</b>

However, the IFFP identifies that a portion of the new construction projects are needed to cure existing deficiencies in the culinary water system. Therefore, new development cannot be expected to pay the entire impact fee and then also contribute over time, through increased water rates, to curing existing deficiencies in the culinary water system. The IFFP allocates \$1,556,042 of new construction costs as benefits to existing development. Therefore, credits against the gross impact fee have been made as follows:

**TABLE 4: CREDIT CALCULATIONS**

<b>Year</b>	<b>ERCs</b>	<b>Cost per ERC</b>	<b>NPV</b>	<b>Maximum Fee</b>
2022	8,359	\$18.61	\$135.45	\$4,135.29
2023	8,537	\$18.23	\$121.51	\$4,149.23
2024	8,719	\$17.85	\$107.42	\$4,163.32
2025	8,905	\$17.47	\$93.15	\$4,177.59
2026	8,989	\$17.31	\$78.71	\$4,192.03
2027	9,075	\$17.15	\$63.85	\$4,206.89
2028	9,161	\$16.99	\$48.57	\$4,222.17
2029	9,248	\$16.83	\$32.85	\$4,237.89
2030	9,336	\$16.67	\$16.67	\$4,254.07

The maximum fee per ERC is calculated for a single-family residential unit which has an average of 24 drainage fixture units (DFUs).<sup>1</sup> Multi-family units average 82 percent of the fixture units of single-family residential; therefore, the fee for each multi-family unit (i.e, per door) is 82 percent of the fee per single-family residential unit.<sup>2</sup>

<sup>1</sup> See Appendix to the Farmington City Culinary Water Impact Fee Facilities Plan

<sup>2</sup> See Appendix to the Farmington City Culinary Water Impact Fee Facilities Plan

All other development will be charged on the basis of the number of DFUs, multiplied by the cost per DFU as shown in the table below.

**TABLE 5: MAXIMUM IMPACT FEES BY NUMBER OF DRAINAGE FIXTURE UNITS**

Year	Maximum Fee per ERC - Single-Family Residential	Maximum Fee per ERC - Multi-Family Residential Door	Fee per DFU
2022	\$4,135.29	\$3,390.93	\$172.30
2023	\$4,149.23	\$3,402.37	\$172.88
2024	\$4,163.32	\$3,413.92	\$173.47
2025	\$4,177.59	\$3,425.62	\$174.07
2026	\$4,192.03	\$3,437.47	\$174.67
2027	\$4,206.89	\$3,449.65	\$175.29
2028	\$4,222.17	\$3,462.18	\$175.92
2029	\$4,237.89	\$3,475.07	\$176.58
2030	\$4,254.07	\$3,488.34	\$177.25



## CHAPTER 1: OVERVIEW OF THE WATER IMPACT FEES

### Summary

An impact fee is intended to recover the City's costs of building water system capacity to serve new residential and non-residential development rather than passing these growth-related costs on to existing users through rates. The Utah Impact Fees Act allows only certain costs to be included in an impact fee so that only the fair cost of expansionary projects or existing unused capacity paid for by the City is assessed through an impact fee.

### Costs to be Included in the Impact Fee

The impact fees proposed in this analysis are calculated based upon:

- Excess capacity in the City's storage and delivery systems;
- New capital infrastructure for source, storage and delivery that will serve new development; and
- Professional and planning expenses related to the construction of system improvements that will serve new development.

The costs that cannot be included in the impact fee are as follows:

- Costs for projects that cure system deficiencies;
- Costs for projects that increase the LOS above that which is currently provided;
- Operations and maintenance costs;
- Costs of facilities funded by grants or other funds that the City does not have to repay; and
- Costs of reconstruction of facilities that do not have capacity to serve new growth.

### Utah Code Legal Requirements

Utah law requires that communities and special districts prepare an Impact Fee Analysis (IFA) before enacting an impact fee. Utah law also requires that communities/districts give notice of their intent to prepare and adopt an IFA. This IFA follows all legal requirements as outlined below. The City has retained Zions Public Finance, Inc. (ZPFI) to prepare this Impact Fee Analysis in accordance with legal requirements.

#### Notice of Intent to Prepare Impact Fee Analysis

A local political subdivision must provide written notice of its intent to prepare an IFA before preparing the Plan (Utah Code §11-36a-503). This notice must be posted on the Utah Public Notice website. The City has complied with this noticing requirement for the IFA by posting notice.

#### Preparation of Impact Fee Analysis

Utah Code requires that each local political subdivision, before imposing an impact fee, prepare an impact fee analysis. (Utah Code 11-36a-304).

Section 11-36a-304 of the Utah Code outlines the requirements of an impact fee analysis which is required to:

- (1) An impact fee analysis shall:
  - (a) identify the anticipated impact on or consumption of any existing capacity of a public facility by the anticipated development activity;

- (b) identify the anticipated impact on system improvements required by the anticipated development activity to maintain the established level of service for each public facility;
  - (c) demonstrate how the anticipated impacts described in Subsections (1)(a) and (b) are reasonably related to the anticipated development activity;
  - (d) estimate the proportionate share of:
    - (i) the costs for existing capacity that will be recouped; and
    - (ii) the costs of impacts on system improvements that are reasonably related to the new development activity; and
  - (e) identify how the impact fee was calculated.
- (2) In analyzing whether or not the proportionate share of the costs of public facilities are reasonably related to the new development activity, the local political subdivision or private entity, as the case may be, shall identify, if applicable:
- (a) the cost of each existing public facility that has excess capacity to serve the anticipated development resulting from the new development activity;
  - (b) the cost of system improvements for each public facility;
  - (c) other than impact fees, the manner of financing for each public facility, such as user charges, special assessments, bonded indebtedness, general taxes, or federal grants;
  - (d) the relative extent to which development activity will contribute to financing the excess capacity of and system improvements for each existing public facility, by such means as user charges, special assessments, or payment from the proceeds of general taxes;
  - (e) the relative extent to which development activity will contribute to the cost of existing public facilities and system improvements in the future;
  - (f) the extent to which the development activity is entitled to a credit against impact fees because the development activity will dedicate system improvements or public facilities that will offset the demand for system improvements, inside or outside the proposed development;
  - (g) extraordinary costs, if any, in servicing the newly-developed properties; and
  - (h) the time-price differential inherent in fair comparisons of amounts paid at different times.

#### Certification of Impact Fee Analysis

Utah Code states that an Impact Fee Analysis shall include a written certification from the person or entity that prepares the Impact Fee Analysis. This certification is included at the conclusion of this analysis.

## CHAPTER 2: IMPACT FROM GROWTH UPON THE CITY'S FACILITIES AND LEVEL OF SERVICE

*Utah Code 11-36a-304(1)(a)*

### Projected Water Demands

The table below shows water growth projections. The City's water system currently (year 2021) serves 7,847 equivalent residential connections (ERCs) which will grow to an estimated 9,678 ERCs by 2031. The growth between 2021 and 2031 is expected to be 1,831 ERCs.

### Water Service Area

ERCs within Farmington City are projected to grow as follows:

**TABLE 6: GROWTH IN DEMAND**

Year	ERCs
2019	7,847
2020	8,014
2021	8,185
2022	8,359
2023	8,537
2024	8,719
2025	8,905
2026	8,989
2027	9,075
2028	9,161
2029	9,248
2030	9,336
2031	9,678
2040	11,373

*Source: Farmington City Corporation Culinary Water Impact Fee Facilities Plan*

### Existing and Proposed LOS Analysis

Level of service (LOS) defines the water capital facility demands that a typical Equivalent Residential Connection (ERC) will require and should pay for with impact fees. The IFFP defines existing and proposed service levels as follows per ERC:

- Source component – State requirements of 800 gpd per ERC/146,000 gal per year per ERC
- Storage component – 450 gal/day per ERC
- Delivery component – 620 gal/day per ERC



## CHAPTER 3: IMPACT ON CAPACITY FROM DEVELOPMENT ACTIVITY

*Utah Code 11-36a-304(1)(b)(c)*

### Excess Capacity and Deficiency

There is excess capacity in the storage and distribution systems. New development can be charged a buy-in fee, as part of the overall impact fee, for the capacity it consumes. Based on information provided in the Impact Fee Facilities Plan, over the next 10 years new development will consume the existing, excess capacity in the storage system and a portion of the excess capacity in the distribution system.

TABLE 7: CONSUMPTION OF EXCESS CAPACITY

	Storage	Distribution
Actual Cost	\$5,089,687	\$3,070,251
% Excess Capacity 2021	6.3%	31.0%
% Excess Capacity 2031	0.0%	15.0%
Cost Consumed by New Development, 2021-2031	\$320,650	\$491,240
<i>Source: Farmington City Impact Fee Facilities Plan; ZPFI</i>		

## CHAPTER 4: SYSTEM IMPROVEMENTS REQUIRED FROM DEVELOPMENT ACTIVITY

### *Utah Code 11-36a-304(1)(b)(c)*

The means by which the City will meet growth demands include constructing the following projects as set forth in the Impact Fee Facilities Plan. This will occur through requiring new development to pay for its fair share of existing excess capacity consumed over the next 10 years as well as paying for its fair share of new construction projects.

New water source construction projects over the next 10 years include two wells and will reach \$3,385,000, with new development over the next 10 years responsible for \$1,636,000.

**TABLE 8: NEW CONSTRUCTION IMPROVEMENTS – WATER SOURCE**

Water Sources	Project Location	Project Description	New Development	IFFP Cost
CW-07	Just East of Northbound exit of HWY 89 to Main Street	New Well	\$1,636,000	\$1,636,000
CW-09	South East Corner of the City	New Well	\$1,749,000	\$0
<b>TOTAL</b>			<b>\$3,385,000</b>	<b>\$1,636,000</b>

*Source: Farmington City Corporation Impact Fee Facilities Plan*

In addition, two new water storage construction projects are planned over the next 10 years with a total cost of \$5,204,000, with new development over the next 10 years responsible for \$2,889,143.

**TABLE 9: NEW CONSTRUCTION IMPROVEMENTS – WATER STORAGE**

Water Storage	Project Location	Project Description	New Development	Construction Year	IFFP Cost*
CW-10	South East Corner of the City	New 1.5 MG Water Tank	\$2,272,000		\$0
CW-11	650 N. 150 E (Near C-1 Tank)	New 2 MG Water Tank	\$2,932,000	2025	\$2,889,143
<b>TOTAL</b>			<b>\$5,204,000</b>		<b>\$2,889,143</b>

*\*An average annual construction inflation cost of 3% per year has been added to the new development costs to reflect the actual year of construction for each project*

*Source: Farmington City Corporation Impact Fee Facilities Plan*

And, construction of new distribution projects will total \$4,466,347 with new development responsible for \$3,071,032 of total costs.

**TABLE 10: NEW CONSTRUCTION IMPROVEMENTS – WATER DISTRIBUTION**

Water Storage	Project Location	Project Description	New Development	Construction Year	IFFP Cost*	Existing Development
CW-01	950 N to Clark Lane along 1500 W	Future Business	\$71,605	2021	\$59,003	\$0

Water Storage	Project Location	Project Description	New Development	Construction Year	IFFP Cost*	Existing Development
		Park: 10" Loop				
CW-02	Park Lane I-15	16" Park Lane I-15 Crossing	\$2,366,691	2022	\$2,008,658	\$502,164
CW-03	1100 N to 750 N along 700 W	12" Loop	\$33,380	2023	\$32,828	\$3,648
CW-04	600 N to 200 S; Main Street to 200 E	Replace 4" with 8"	\$1,424,065	2024	\$801,399	\$801,399
CW-05	1525 W to 950 W along Glover Lane	10" Loop	\$44,071	2026	\$47,361	\$5,262
CW-06	Northridge Rd, 1400 N, 1300 N	New Pressure Reducing Valve Stations	\$382,645	2022	\$121,784	\$243,569
CW-08	South East Corner of the City	Distribution Piping	\$143,890		\$0	\$0
<b>TOTAL</b>			<b>\$4,466,347</b>		<b>\$3,071,032</b>	<b>\$1,556,042</b>

*\*An average annual construction inflation cost of 3% per year has been added to the new development costs to reflect the actual year of construction for each project*

*Source: Farmington City Corporation Impact Fee Facilities Plan*

A summary of these costs is as follows:

**TABLE 11: COST OF NEW CONSTRUCTION IMPROVEMENTS TO NEW DEVELOPMENT, 2021-2031**

	Source	Storage	Delivery	Total
New Construction Cost 2021	\$1,636,000	\$2,889,143	\$3,071,032	\$7,596,175

*Source: Farmington City Corporation Impact Fee Facilities Plan*

## CHAPTER 5: PROPORTIONATE SHARE ANALYSIS

### Maximum Legal Water Impact Fee per ERC

The Impact Fees Act requires the Impact Fee Analysis to estimate the proportionate share of the future and historic cost of existing system improvements that benefit new growth that can be recouped through impact fees. The impact fee for existing assets must be based on the historic costs while the fees for construction of new facilities must be based on reasonable future costs of the system.

The maximum impact fee is based on the combination of costs for water source, storage and distribution and includes buy-in costs for existing, excess capacity as well as the cost of construction of new facilities. Costs are summarized as follows:

TABLE 12: SUMMARY OF EXCESS CAPACITY AND NEW CONSTRUCTION COSTS

Cost Summary	Total Cost	Cost Attributable to New Development within the Next 10 Years	Cost Attributable to New Development within the Next 10 Years with Construction Inflation
<b>Water Source</b>			
Buy-In	\$0	\$0	\$0
New Construction	\$3,385,000	\$1,636,000	\$1,636,000
<b>Water Storage</b>			
Buy-In	\$5,089,687	\$320,650	\$320,650
New Construction	\$5,204,000	\$2,492,200	\$2,889,143
<b>Water Distribution</b>			
Buy-In	\$3,070,251	\$491,240	\$491,240
New Construction	\$4,466,347	\$2,847,169	\$3,071,032
<b>TOTAL</b>	<b>\$21,215,286</b>	<b>\$7,787,259</b>	<b>\$8,408,066</b>

### Buy-In to Existing, Excess Capacity

There is existing, excess capacity in the storage and distribution systems. New development should be required to pay a buy-in fee for its fair share of the excess capacity consumed over the next 10 years. Actual costs have been used in this analysis. Based on the ERCs served over the next 10 years, the buy-in cost for storage is calculated at \$175.12 per ERC and at \$268.29 per ERC for distribution. The total buy-in cost per ERC is therefore \$443.41.

TABLE 13: PROPORTIONATE SHARE ANALYSIS, EXISTING EXCESS CAPACITY

Storage	Storage	Distribution	Total
Actual Cost	\$5,089,687	\$3,070,251	\$8,159,939
% Excess Capacity 2021	6.3%	31.0%	
% Excess Capacity 2031	0.0%	15.0%	

Storage	Storage	Distribution	Total
Cost Consumed by New Development, 2021-2031	\$320,650	\$491,240	\$811,891
Growth in ERCs, 2021-2031	1,831	1,831	
<b>Cost per ERC</b>	<b>\$175.12</b>	<b>\$268.29</b>	<b>\$443.41</b>

### New Construction

Total new improvement costs attributable to new development over the next 10 years (with interest and inflationary costs added) will reach \$7,596,175.

TABLE 14: PROPORTIONATE SHARE ANALYSIS, NEW IMPROVEMENTS

	Source	Storage	Distribution	Total
New Construction Costs, 2021-2031	\$1,636,000	\$2,889,143	\$3,071,032	\$7,596,175
Growth in ERCs, 2021-2031	1,831	1,831	1,831	
<b>Cost per ERC</b>	<b>\$893.50</b>	<b>\$1,577.90</b>	<b>\$1,677.24</b>	<b>\$4,148.65</b>

### Consultant Costs

The Impact Fees Act allows for fees charged to include the reimbursement of consultant costs incurred in the preparation of the IFFP and IFA.

TABLE 15: PROPORTIONATE SHARE ANALYSIS – CONSULTANT COSTS

	Amount
JUB	\$52,803
ZPFI	\$6,855
Total Consultant Costs	\$59,658
Growth in ERC's 2021-2031	1,831
<b>Cost per ERC</b>	<b>\$32.58</b>

### Impact Fee Fund Balance

Based on information provided by the City, there was an unspent fund balance of \$648,000 as of June 2022. These funds can be used to offset the costs described in this report and a credit must therefore be made.

TABLE 16: PROPORTIONATE SHARE ANALYSIS – FUND BALANCE

Impact Fee Fund Balance Credits	Amount
Fund Balance	\$648,000
Growth in ERCs, 2021-2031	1,831
<b>Credit per ERC</b>	<b>(\$353.90)</b>

## Credits Against Impact Fees

Credits must also be calculated for the portion of future improvements that will benefit existing development. This is necessary so that new development does not pay twice – once through an impact fee and once through increased rates to pay for existing deficiencies in the water system.

Based on the IFFP, \$1,556,042 of the total new construction costs of \$7,596,175 will benefit existing development. While impact fees should pay for new development's share of the new projects, rates will need to be raised in order to cover the costs associated with the projects that benefit existing development. Credits must be made so that new development does not pay twice.

The following credits are based on the assumption of increased rates over a 10-year period to pay for the portion of new construction projects that benefit existing development. Impact fees should be sufficient to cover the costs attributable to new development.

**TABLE 17: CREDITS ON NEW CONSTRUCTION**

Year	ERCs	Cost per ERC	NPV*	Maximum Fee in 2021
2022	8,359	\$18.61	\$135.45	\$4,135.29
2023	8,537	\$18.23	\$121.51	\$4,149.23
2024	8,719	\$17.85	\$107.42	\$4,163.32
2025	8,905	\$17.47	\$93.15	\$4,177.59
2026	8,989	\$17.31	\$78.71	\$4,192.03
2027	9,075	\$17.15	\$63.85	\$4,206.89
2028	9,161	\$16.99	\$48.57	\$4,222.17
2029	9,248	\$16.83	\$32.85	\$4,237.89
2030	9,336	\$16.67	\$16.67	\$4,254.07

\*NPV = net present value discounted at a rate of 4%.

## Summary of Maximum Impact Fees

The maximum fee per ERC is calculated for a single-family residential unit which has an average of 24 drainage fixture units (DFUs).<sup>3</sup> Multi-family units average 82 percent of the fixture units of single-family residential; therefore, the fee for each multi-family unit (i.e., per door) is 82 percent of the fee per single-family residential unit.<sup>4</sup>

All other development will be charged on the basis of the number of DFUs, multiplied by the cost per DFU as soon in the table below.

<sup>3</sup> See Appendix to the Farmington City Culinary Water Impact Fee Facilities Plan

<sup>4</sup> See Appendix to the Farmington City Culinary Water Impact Fee Facilities Plan



TABLE 18: MAXIMUM IMPACT FEES BY NUMBER OF DRAINAGE FIXTURE UNITS

Year	Maximum Fee per ERC - Single-Family Residential	Maximum Fee per ERC - Multi--Family Residential Door	Fee per DFU
2022	\$4,135.29	\$3,390.93	\$172.30
2023	\$4,149.23	\$3,402.37	\$172.88
2024	\$4,163.32	\$3,413.92	\$173.47
2025	\$4,177.59	\$3,425.62	\$174.07
2026	\$4,192.03	\$3,437.47	\$174.67
2027	\$4,206.89	\$3,449.65	\$175.29
2028	\$4,222.17	\$3,462.18	\$175.92
2029	\$4,237.89	\$3,475.07	\$176.58
2030	\$4,254.07	\$3,488.34	\$177.25

## CERTIFICATION

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Zions Public Finance, Inc. certifies that the attached impact fee analysis:

1. includes only the cost of 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 the day on which each impact fee is paid;
2. does not include:
  - a. costs of operation and maintenance of public facilities; or
  - b. cost 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;
3. offset costs with grants or other alternate sources of payment; and
4. complies in each and every relevant respect with the Impact Fees Act.

**ZIONS PUBLIC FINANCE, INC.**