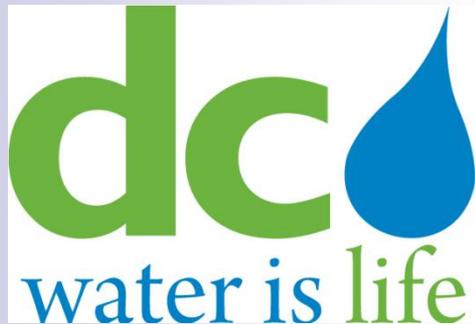


Independent Review of the Proposed Rates for 2017 – 2018

DC Water Public Hearing

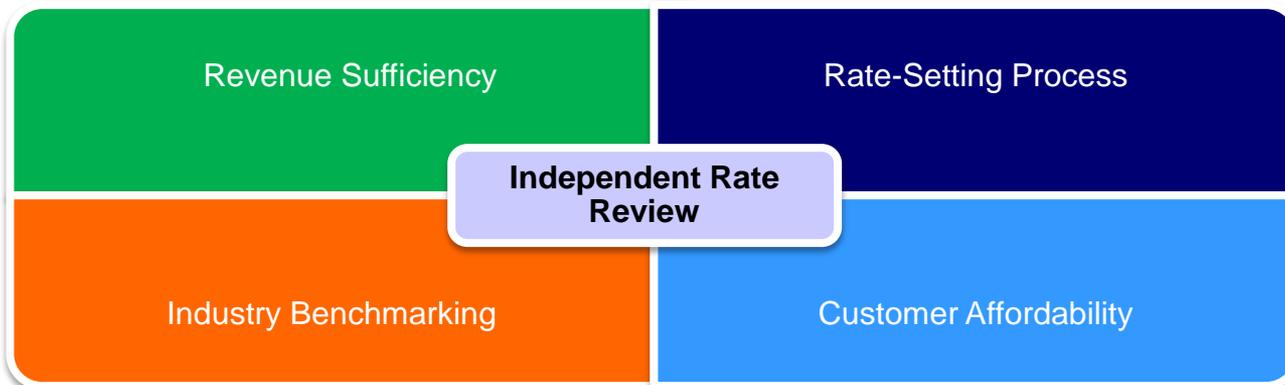
May 11, 2016



Amawalk
Consulting Group LLC

Outline

- Financial Overview
- Financial Performance
- Operating Performance
- Why is a Rate Increase Necessary
- Steps DC Water Takes to Minimize Rate Increases
- Summary of 2017 – 2018 Rate Proposal
- Industry Comparison
- Affordability of User Charges
- Conclusion
- Appendix



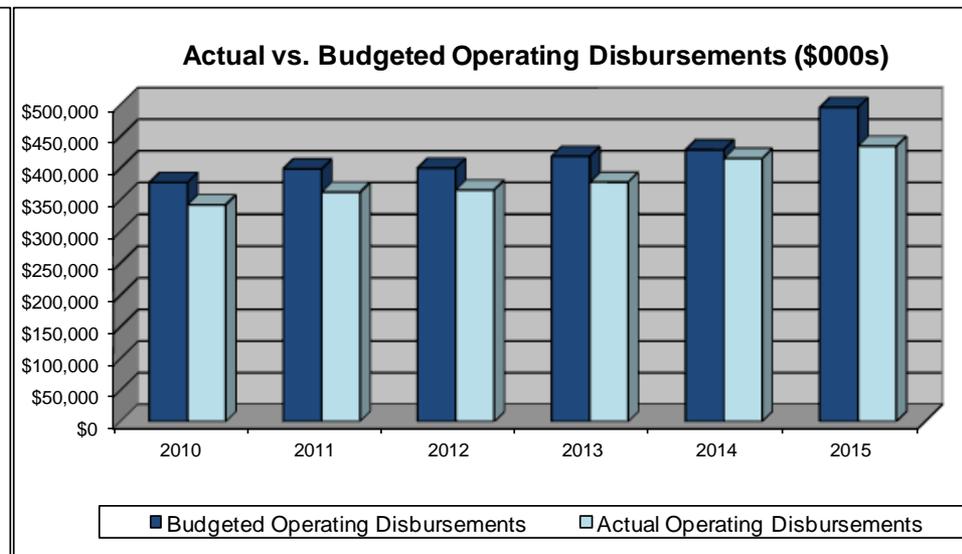
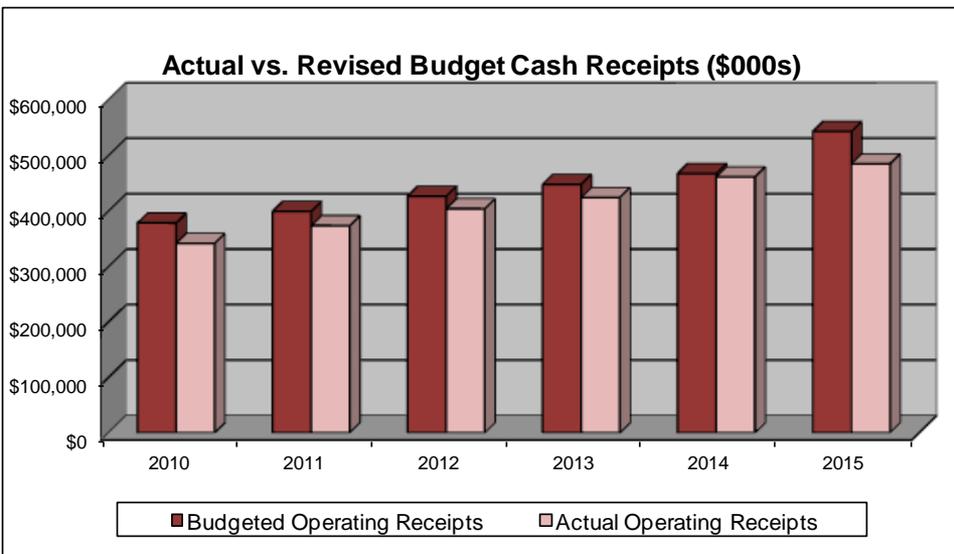
Financial Overview

- Successful implementation of significant rate structure changes in 2016: YTD cash receipts are consistent with expectations
 - Multi-tiered rates, including lifeline rates
 - Dedicated funding for water system replacement work
 - Expansion of Customer Assistance Program (CAP) to credit 100% of the Water System Replacement Fee
- A current financial plan that provides a strong ability to manage risks:
 - Higher Rate Stabilization Fund balances: a \$103 million increase from the prior plan for 2024
 - More cash-financed construction: a \$236 million increase from the prior plan for 2017-24
 - Annual capital cash needs that decline from the 2014 peak of \$682 million to \$472 million in 2017 and \$414 million in 2018; lower amounts thereafter
- DC Water's performance is recognized by the bond rating agencies: recent upgrades from S&P and Moody's.

DC Water continues to meet or exceed the Board's financial goals, including innovative efforts to generate revenue (and reduce needed rate increases) through non-water initiatives.

Financial Performance

- From 2010 – 2015: actual expenditures averaged 8.8% < budget; actual cash receipts averaged 1.2% > budget.
- For all of 2016, it is expected that expenditures will be less than budget and cash receipts will be consistent with the budget.



While not a guarantee of future results, this track record offers a degree of comfort that expenditure and revenue estimates are prudently developed.

Operating Performance

- The new digester facilities & waste-to-energy facilities are yielding multiple benefits – lower expenses, fewer biosolids and a high quality product.
- No change in total staffing levels is anticipated.
- Success in convincing USEPA to extend the period for the LTCP pushes back certain capital costs (about \$400 million) from 2020-25 to 2026-30.
- CIP projects are on time and consistent with budgets; change orders and claims continue to be a small % of costs.
- On target for implementing a 1% per year replacement cycle for pipe-related assets.

DC Water continues to meet or exceed the Board's operating goals including compliance with Consent Orders and permits, fire hydrant availability and other elements of service delivery. Strong operating performance helps manage the cost of providing service and mitigates risks.

Why is a Rate Increase Necessary?

■ Increases in capital spending:

- 37.3% of the CIP is legally mandated.
- Debt service will rise to 33.0% of total disbursements in 2017 and 34.7% in 2018, increasing by 7.4% and 11.2% vs. the prior year, respectively.

■ Increases in operating expenses:

- Total O&M expenses, excluding PILOT/ROW, decrease by \$4.0 million for 2017 and increase by \$9.0 million for 2018.

■ Water use is declining:

- Most revenues are derived from water consumption-based charges but long-term water demand is declining, similar to other cities such as New York, Philadelphia, and Boston.
- Year-to-date water use is lower than in 2015, even when excluding adjustments made for the Federal Government.

Steps DC Water Takes to Minimize Rate Increases

- A. DC Water effectively manages its capital contract costs.
 - ❑ In 2015, actual bids, in aggregate, were lower than estimates: 1.0% higher for facilities contracts and 7.0% lower for streets contracts.
 - ❑ Change orders and claims payments are a relatively small % of construction.

- B. Successful implementation of the digester facilities and waste-to-energy facilities is yielding multiple benefits.

- C. Maintaining a strong rate of bill collection and minimizing accounts receivable so that paying customers do not subsidize delinquent property owners.

- D. Pursuing innovative strategies to increase revenues from sources other than ratepayers – these include marketing the end products of the biosolids digestion facilities and offering DC Water services to other utilities for a fee.

Summary of 2017 – 2018 Rate Proposal

	Units	Approved	Proposed	Proposed	Change FY 2017		Change FY 2018	
		FY 2016	FY 2017	FY 2018	\$	%	\$	%
DC Water Rates								
Water								
Residential 0-4 Ccf (Lifeline)	Ccf	\$3.08	\$3.23	\$3.39	\$0.15	5.0%	\$0.16	5.0%
Residential > 4 Ccf	Ccf	3.87	4.06	4.26	0.19	5.0	0.20	5.0
Multi-Family	Ccf	3.45	3.62	3.80	0.17	5.0	0.18	5.0
Non-Residential	Ccf	3.99	4.19	4.40	0.20	5.0	0.21	5.0
Sewer (Excluding CRIAC)	Ccf	5.44	5.71	6.00	0.27	5.0	0.29	5.0
Clean Rivers IAC	ERU	20.30	22.24	25.18	1.94	9.6	2.94	13.2
Customer Metering Fee	5/8"	3.86	3.86	3.86	-	-	-	-
Water System Replacement Fee	5/8"	6.30	6.30	6.30	-	-	-	-
District Rates								
PILOT Fee	Ccf	0.47	0.48	0.49	0.01	2.0	0.01	2.0
Right of Way Fee	Ccf	0.17	0.17	0.18	-	-	0.01	1.0
Stormwater Fee	ERU	2.67	2.67	2.67	-	-	-	-

Average residential customer charges (6.2Ccf) would be \$96.35 for 2017 and \$102.30 for 2018, an increase of \$4.70 per month or 5.1% and \$5.95 per month or 6.2% compared to the prior year, respectively.

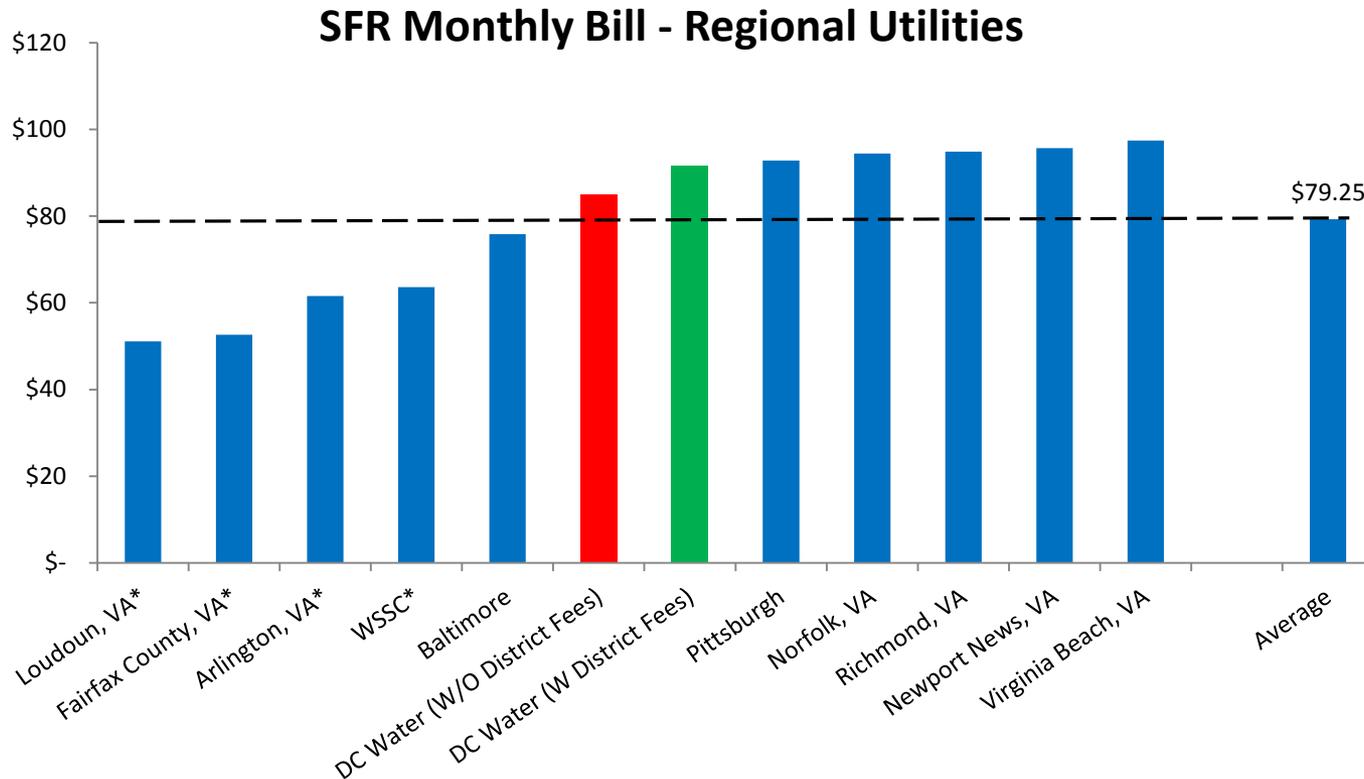
Industry Comparisons: Multi-Year Rates

- Reasons for multi-year budgeting/rate-setting:
 - Increases the period of revenue certainty
 - Provides rate certainty for customers
 - Instills greater spending discipline
 - Reduces the administrative burden; i.e., makes the budget/rate process more efficient
- Factors to consider: Setting rates for 2 years instead of one increases the risk of swings in interest rates, unforeseen expenses and other matters affecting the budget; DC Water has a significant capability to mitigate risks.
- Peer examples of multi-year budgeting/rate-setting:

Utility	Number of Years
Philadelphia	2
Baltimore	3
Cleveland	5
DC Water - Proposed 2017-18	2
San Francisco	4
Atlanta	4

Multi-year budgeting and rate-setting is an accepted industry practice and makes sense for DC Water.

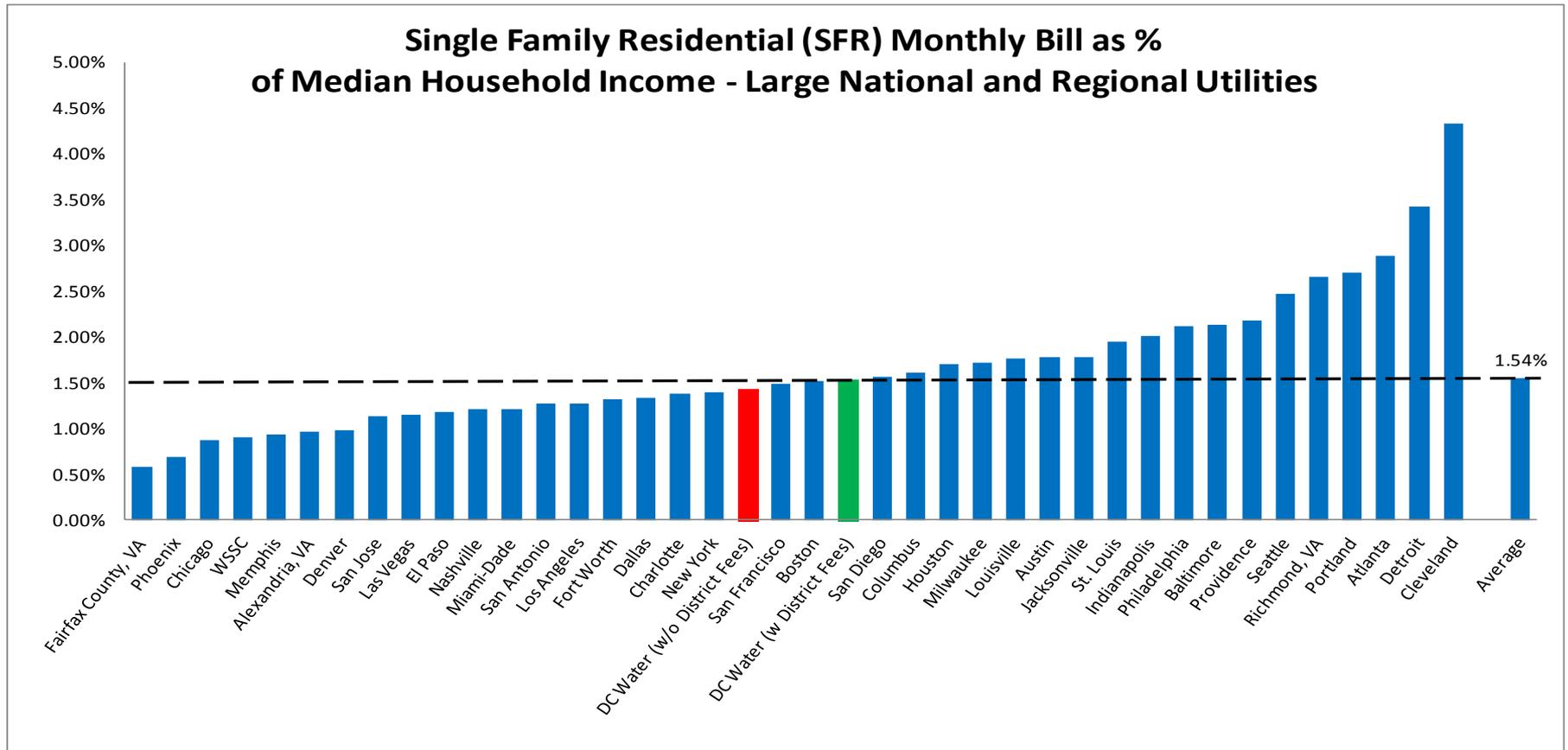
Industry Comparisons – Regional Utilities



Note: Some cities utilities use property tax revenue or other revenues to pay for part of the cost of water, wastewater, or stormwater services, as indicated by * in the graph above.

DC Water charges are somewhat higher than the average of the regional utilities that we survey; however, unlike some utilities, DC Water receives no property tax revenue to reduce its user charges.

Affordability of User Charges

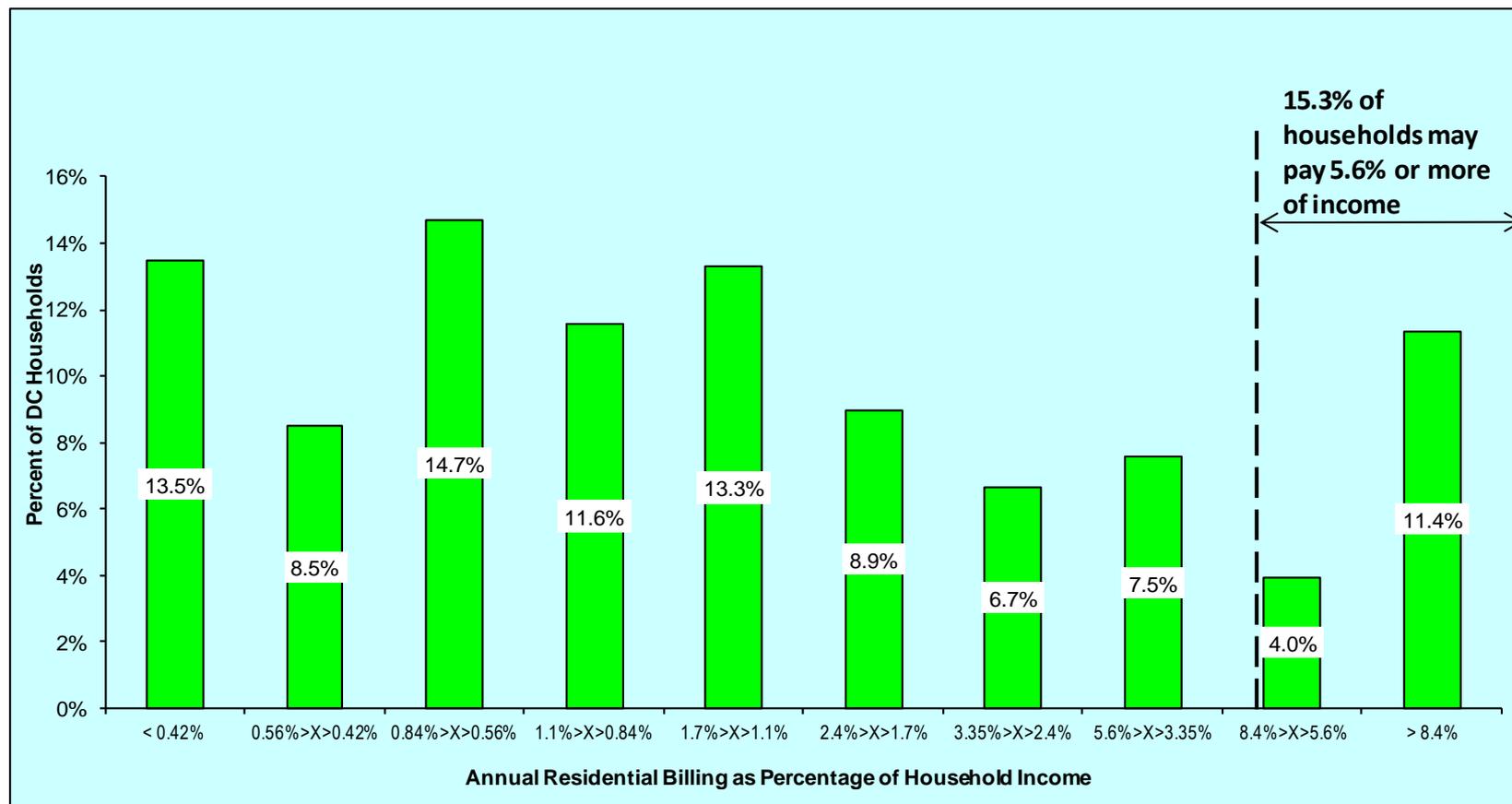


Water, sewer, stormwater, and District charges as a % of median income are affordable at 1.5% of MHI, and competitive with peers

Affordability of DC Water User Charges

- At 1.5% of median household income (MHI), DC Water's charges are competitive with other major cities in terms of affordability. Charges greater than 2% to 4% of MHI are typically viewed as a strain on household budgets.
- Over 70% of DC Water households spend less than 2.4% of their household income on water and sewer charges as shown in the chart on the next slide. Of the 15.3% that show charges greater than 5.6%, it is anticipated that many of those households are renters that do not pay a water/sewer bill directly.
- For those households that directly pay a water/sewer bill, DC Water's lifeline rate for the first 4 ccf (\$3.08 per ccf instead of \$3.87 per ccf in the second tier) and the CAP and SPLASH programs help bill-paying customers whose water/sewer bills are a high percentage of their household income.

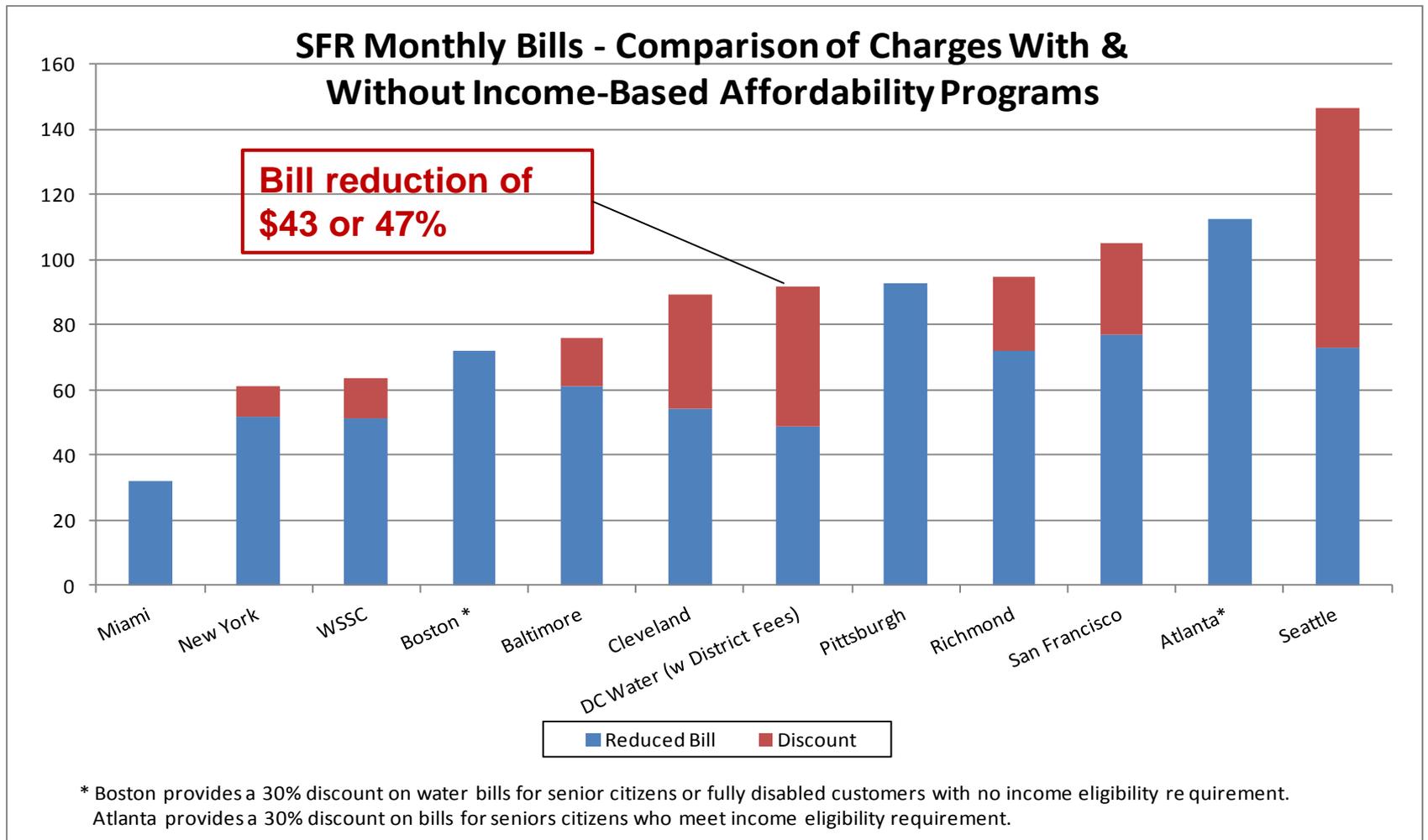
Affordability of DC Water User Charges*



* Including DC Water Impervious Area Charge, excluding District Stormwater fee

Source: 2014 American Community Survey, assuming residential consumption of 6.20 Ccf monthly and excluding District stormwater charges. Income data from 2014 represents the latest available data.

Affordability of User Charges



The affordability assistance provided by DC Water is robust compared to other utilities, providing a meaningful impact on a customer bill.

Conclusions

- DC Water's proposed two-year rate-setting process and rates have been reasonably developed, reflect the anticipated revenue requirements of the System, adhere to Board policy and are comparable to other utilities.
- If water usage declines at a faster rate than assumed rate, interest rates are higher than expected or unforeseen major expenses are encountered, such as the collective bargaining agreements which expired in 2015, the actual financial results could differ from current projections. The potential underspending in 2016, availability of the RSF and allowances for cash-financed construction provide flexibility and risk mitigation in such circumstances.
- Affordability is a growing concern in the water and wastewater industry as the cost of providing service continues to increase. DC Water's CAP and SPLASH programs and its use of a lifeline rate are: 1) in line with industry practices and 2) progressive in providing assistance to low income billpayers.

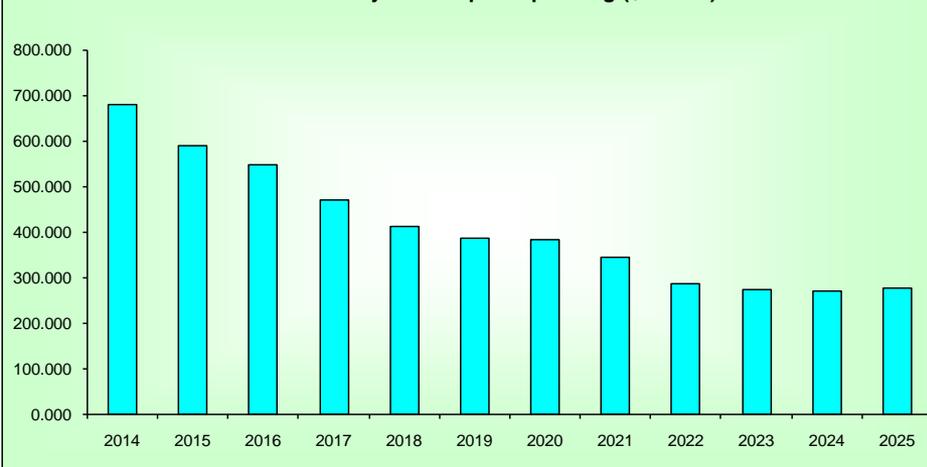


Appendix

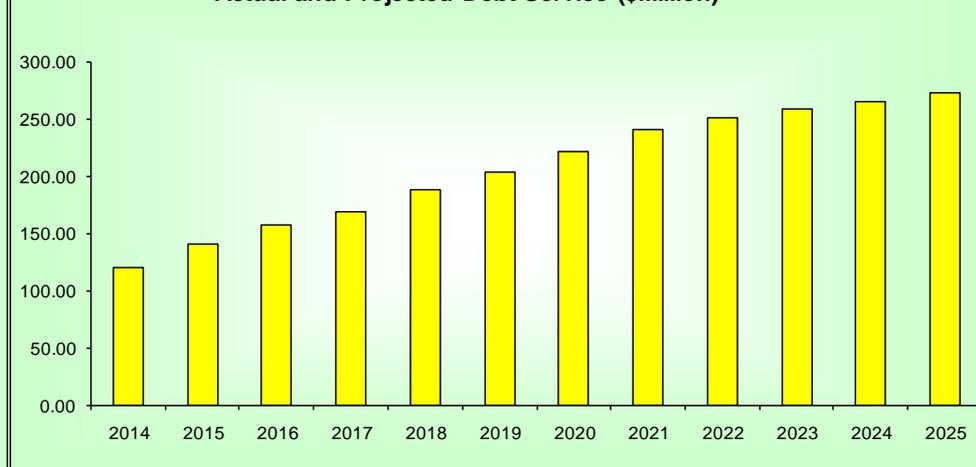
Why is a Rate Increase Necessary – Capital Investment/Debt Service

- DC Water is investing in its water and sewer infrastructure to ensure that high quality services are provided on a reliable basis.
- 37.3% of planned capital improvements are legally mandated.
- Debt service payments increase by \$11.7 million from 2016 to 2017 and \$19.0 million from 2017 to 2018; such payments are an increasing % of total disbursements: 33.0% in 2017 and 34.7% in 2018.

Actual and Projected Capital Spending (\$Million)



Actual and Projected Debt Service (\$Million)



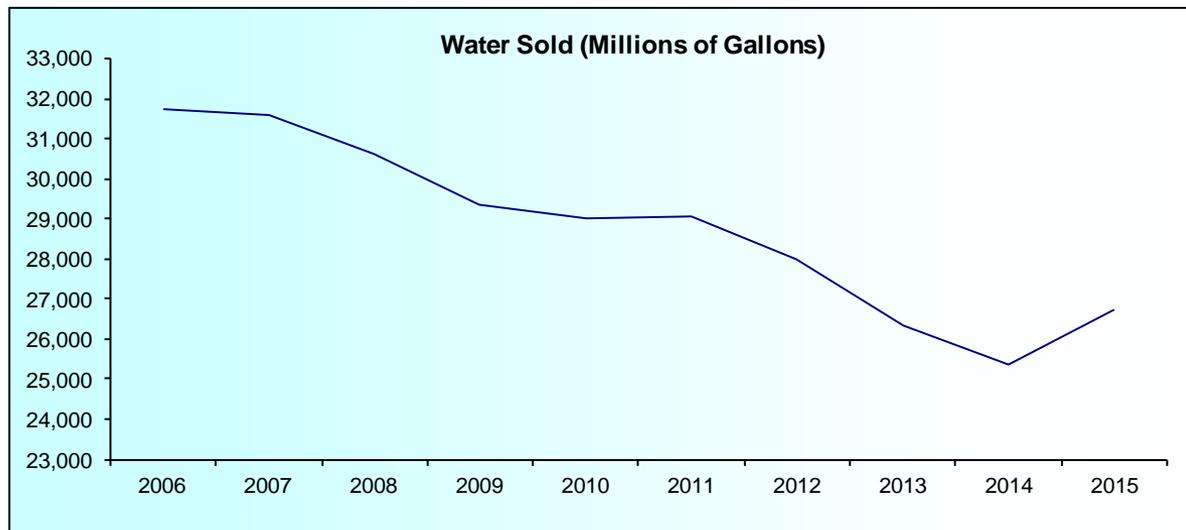
Why is a Rate Increase Necessary – Expenses

- Total O&M expenses, excluding PILOT/ROW, are expected to decrease by \$4.0 million for 2017 and then increase by \$9.0 million for 2018.
- DC Water budgeted \$23.5 million in 2016 for cash-financed construction/bond defeasance, increasing to \$24.0 million in 2017 and \$25.3 million in 2018. The purpose is to potentially reduce debt, enhance coverage and provide cash flow flexibility.

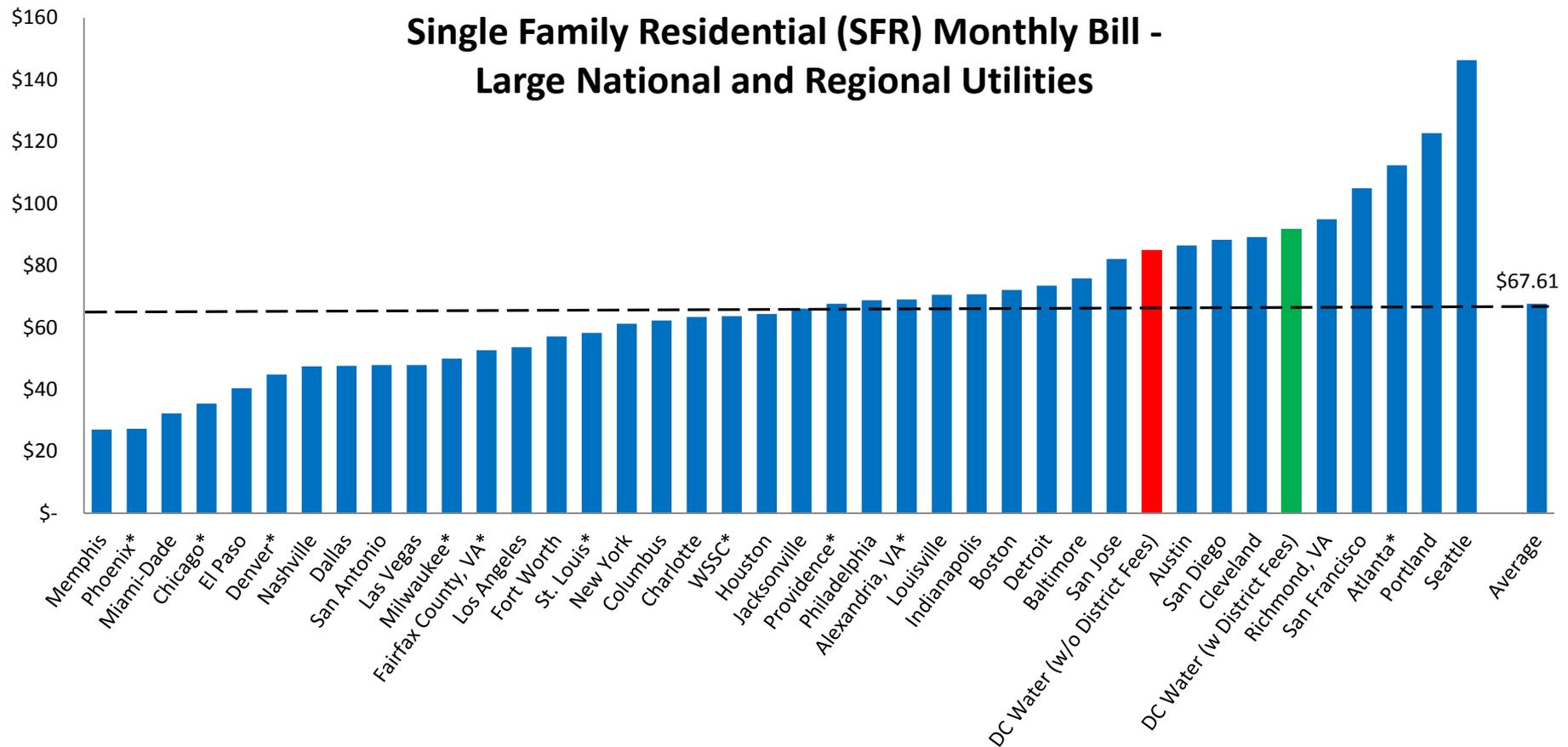
O&M Expenditure (\$ M)	FY 2016 Revised Budget	FY 2017 Approved Budget	FY 2018 Approved Budget	Change FY 2017	Change FY 2018
Personnel Services	121.0	122.8	126.5	1.5%	3.0%
Contractual Services	79.2	82.8	85.2	4.4%	3.0%
Water Purchases	30.7	29.3	30.2	-4.8%	3.0%
Chemicals & Supplies	36.0	34.7	35.8	-3.5%	3.0%
Utilities & Rent	35.0	28.7	29.5	-18.1%	3.0%
Small Equipment	1.5	1.2	1.3	-16.0%	3.0%
Total	303.5	299.5	308.5	-1.3%	3.0%
PILOT/ROW Fees	20.7	21.1	21.4	1.5%	1.5%
Debt Service	157.6	169.3	188.4	7.4%	11.2%
Defeasance D.S./Cash Financed Capital Construction	23.5	24.0	25.3	2.3%	5.4%
Total Operating Disbursements	505.3	513.9	543.5	1.7%	5.8%

Why is a Rate Increase Necessary – Conservation/Declining Demand

- About 53% of total cash receipts in 2017 and in 2018 are expected from consumption-related retail charges.
- Long-term retail water demand is slowly declining.
- Year-to-date water sales are 3.8% lower than in 2015; most of the decrease is due to an adjustment in Federal Government.
- It is assumed that water usage will decline at the rate of 1% per year in 2017 and thereafter. New York, Boston & Philadelphia assume similar annual declines.



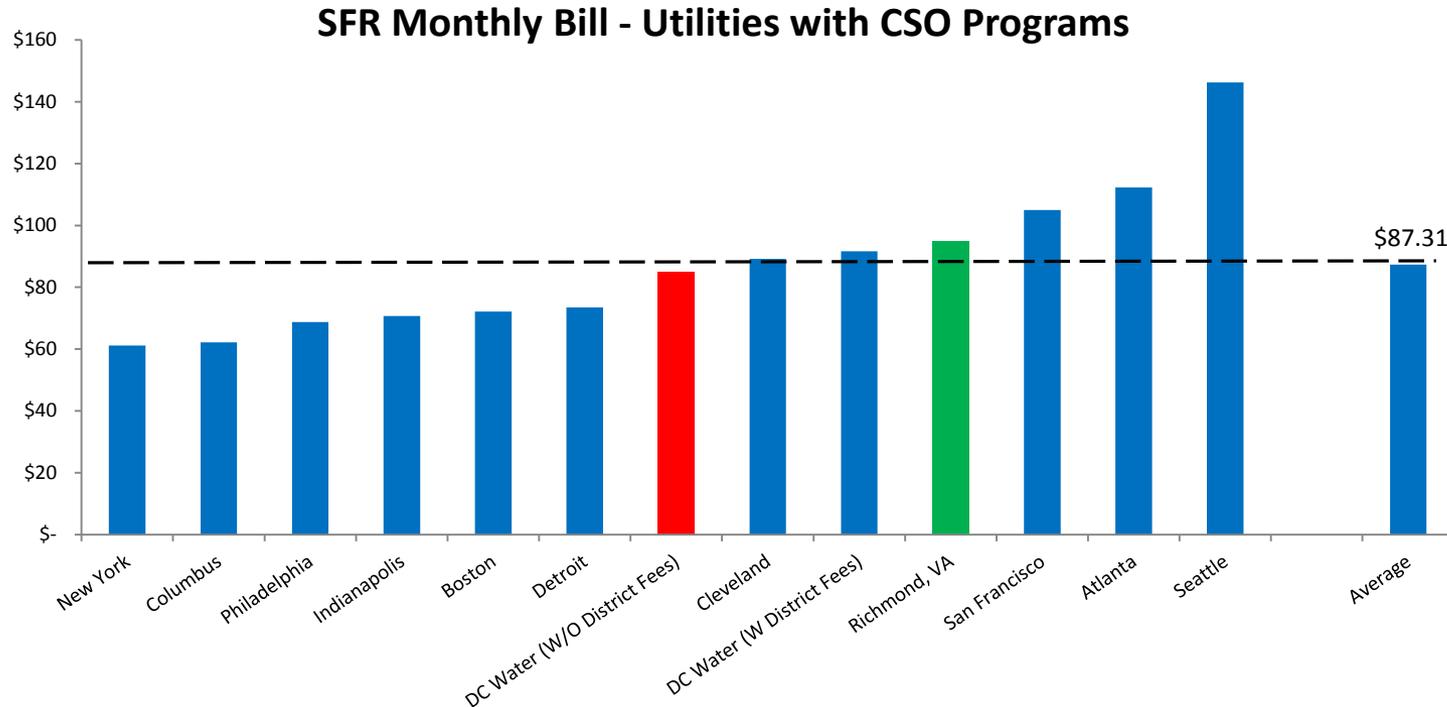
Industry Comparisons: Rates/Charges



Note: Reflects rates and fees in place as of March 2016. Some cities use property tax revenue or other revenues to pay for part of the cost of water, wastewater, or stormwater services, as indicated by * in the graph above. In such situations, the user charge will not reflect the full cost of water, wastewater or stormwater services.

DC Water charges, without the benefits of CAP, are higher than the average of the universe of national and regional utilities that we survey each year on behalf of DC Water.

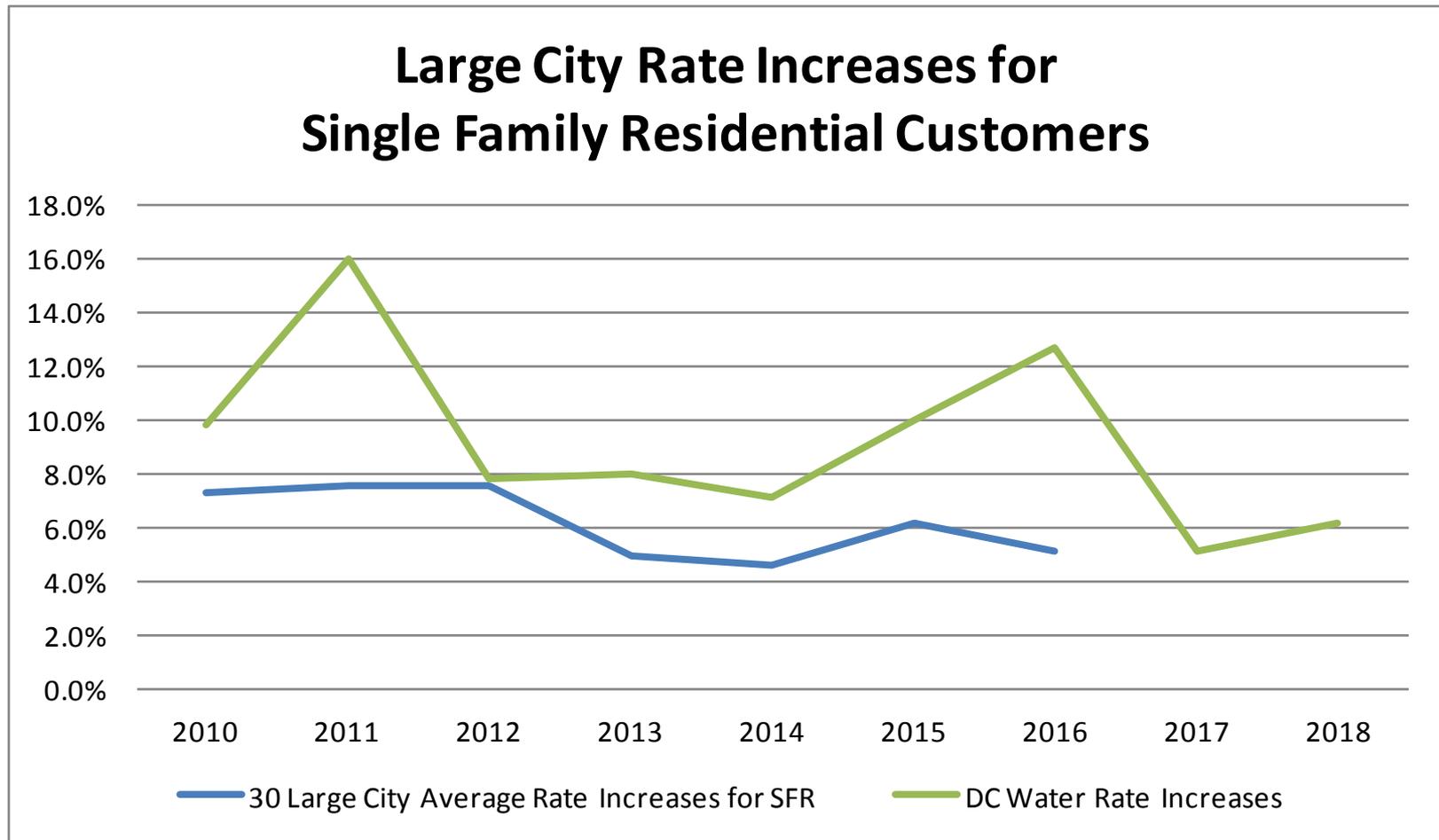
Industry Comparisons – CSO Utilities



Note: Reflects rates and fees in place as of March 2016.

DC Water charges are comparable to the average of the utilities that we survey that have CSO programs.

Industry Comparisons – Rate Increases



Rate increase percentages for DC Water were generally higher than peers in recent years. As the LTCP spending slows down, it is expected that future DC Water rate increase percentages will be similar to peers.

Industry Comparison – Electricity, Gas and Telecom

