

GARDEN GROVE WATER RATE STUDY

December 14, 2017 6:00 pm to 8:00 pm

Water System Description and Water Rates

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Presentation Outline

1. **Why Are We Here Today?**
2. Your Water System
3. What Your Water Rates Pay For
4. Necessary Repairs and Capital Projects
5. Customer Participation
6. Your Water Bill
7. Next Steps



Why Are We Here Today?

- Mission and Vision Statement
- Water Rate Study
 - How the City pays for expenses
 - How much water system repairs and improvements will cost
 - How to equitably charge customers for the services they receive
- Educate customers about the Water System
- Customer Water Bill



Our Mission and Vision

- “The **mission of the City of Garden Grove** is to provide responsible leadership and quality services as we promote safety, cultural harmony, and life enrichment.”
- The **vision of Garden Grove** is to be a safe, attractive, and economically vibrant city with an informed and involved public. We are a diverse community that promotes our unique attributes and preserves our residential character.
 - To preserve our local quality of life, keep our residents tax dollars local, and provide the services we need to make our city a desirable place to live, visit, and do business, no matter what happens with the state or federal governments.
- “The **goal of the Water Services Section** is to provide sufficient and safe water at the lowest possible cost to the City’s residents.”
 - Above all else, our goal is to protect local drinking water supplies, especially for residences and local parks



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Garden Grove Water System

- 17 total water production facilities
- 13 wells
- 5 pump stations
 - As old or older than reservoirs
- 8 reservoirs holding 53 million gallons of water
 - Combined, same volume as a football field, 125 feet deep
 - Most are well over 40 years old
 - Newest is over 20 years old
- 433 miles of pipe
 - ~ distance from Garden Grove to San Francisco
 - 40% is over 60 years old



Garden Grove Water System

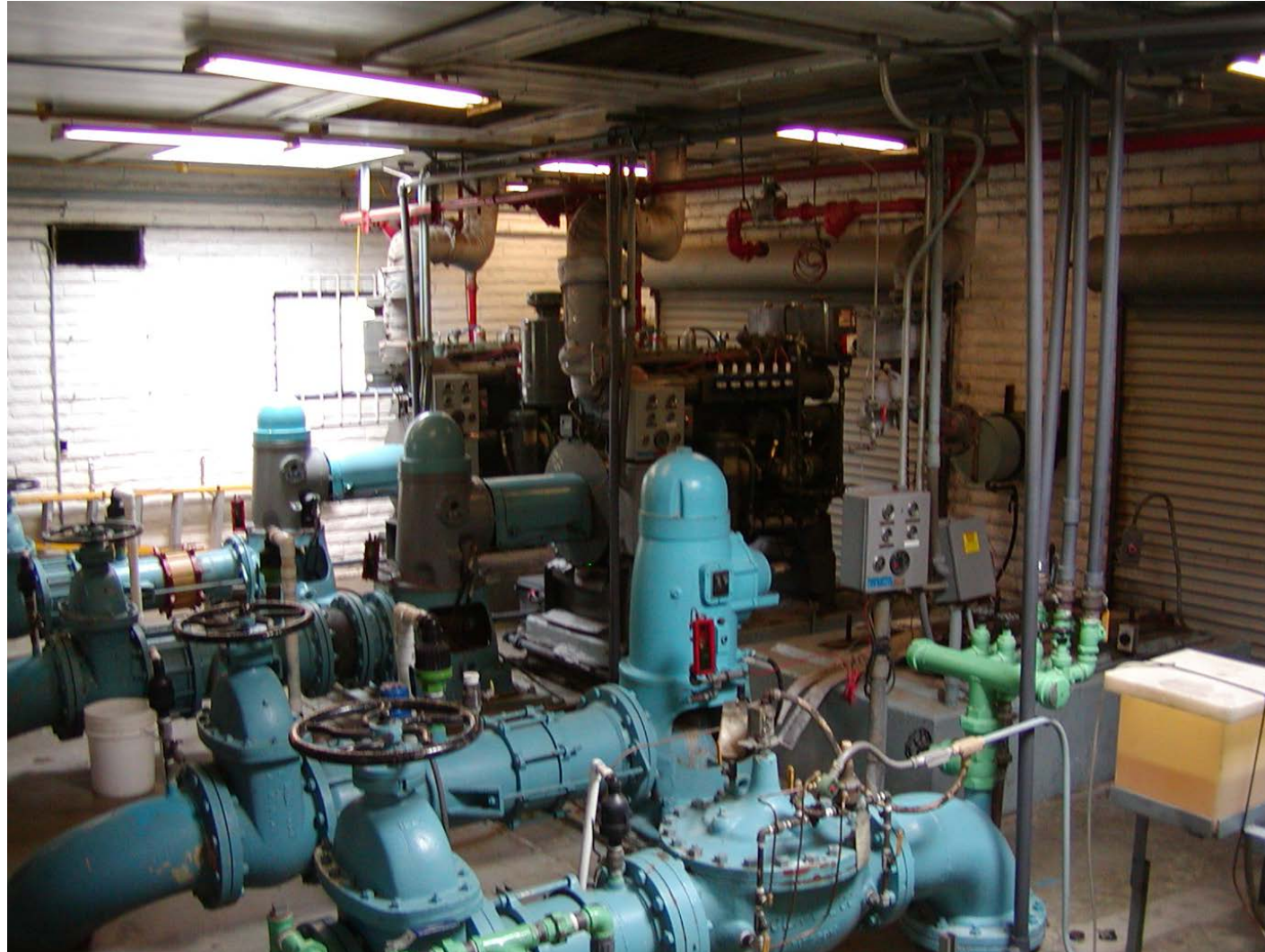
- 34,000 service connections
- Value of City-owned water infrastructure:
 - \$138.8 million (gross plant value: cost of each facility when it was built)
 - Between \$400 and \$800 million (estimated cost to replace system in today's dollars)



Westhaven Reservoir and Pump Station

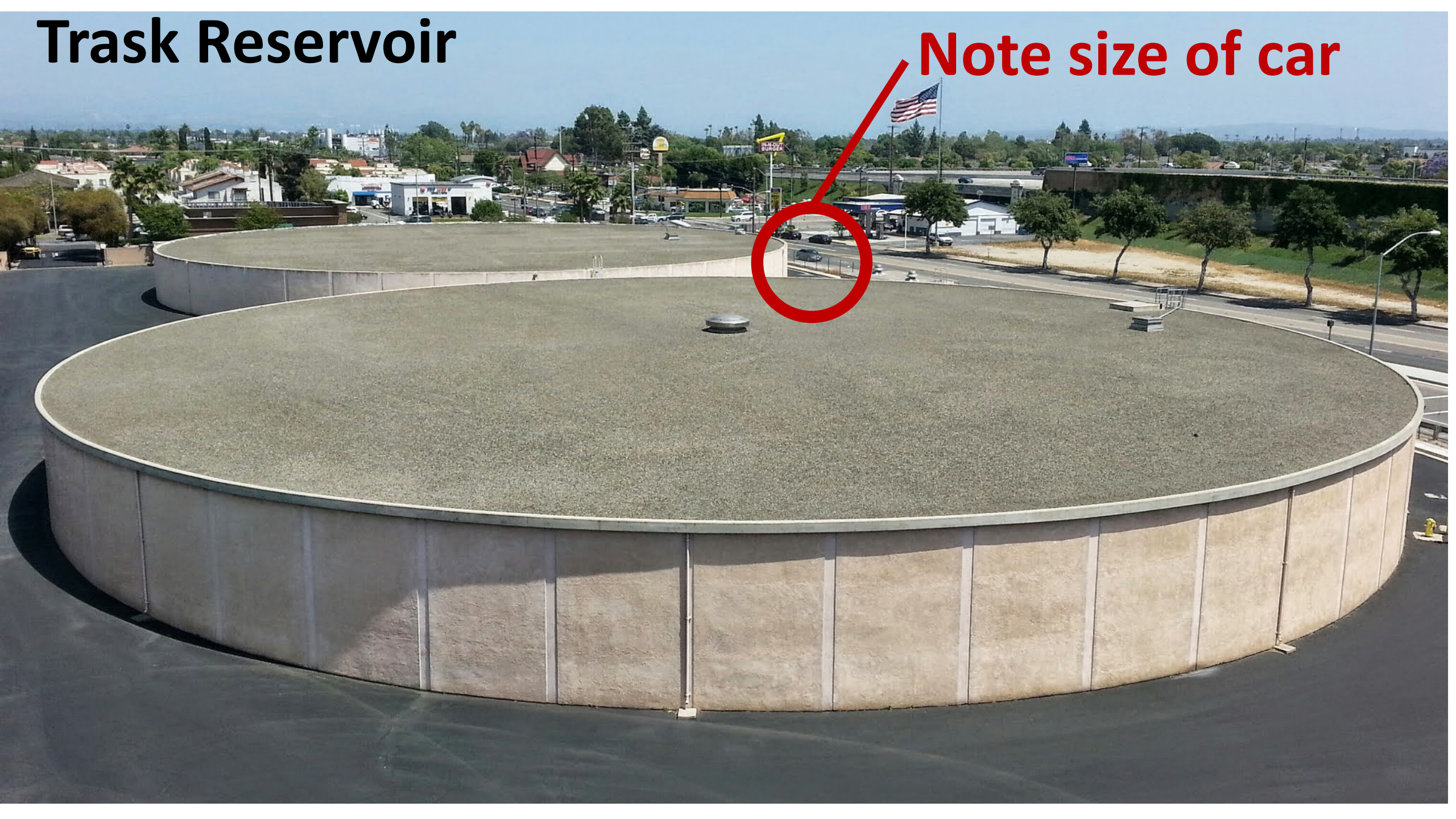


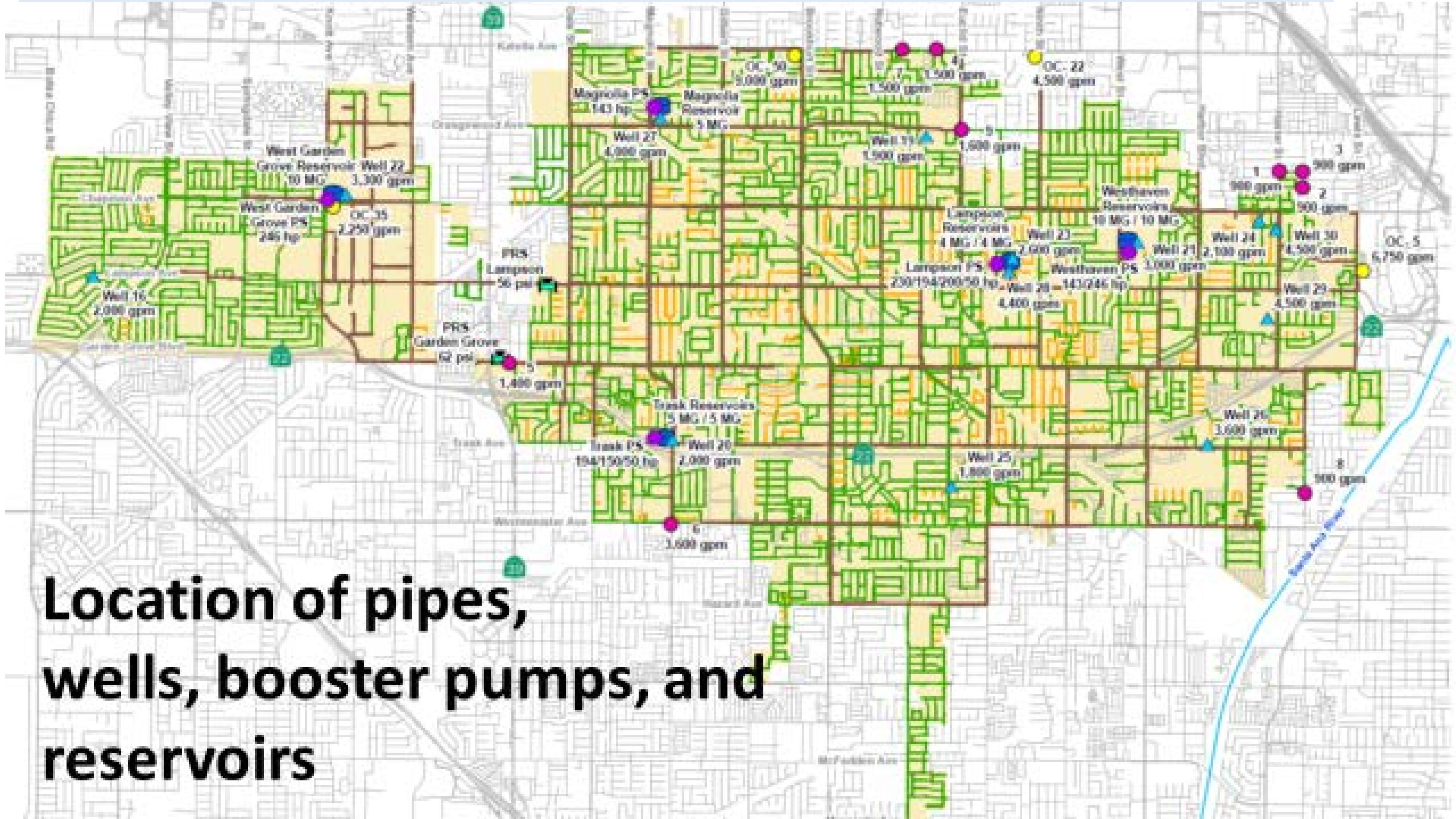
Westhaven Reservoir and Pump Station



Trask Reservoir

Note size of car





**Location of pipes,
wells, booster pumps, and
reservoirs**

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Current Water Bill

- Water bills are sent out every two months. Each bill contains:
 - Minimum Charge: \$12.74 for most customers, plus
 - Capital Improvements Charge: \$1.47 for most customers, plus
 - Commodity Delivery Charge:
 - Depends on water use
 - Four tiers
 - 1st Tier: \$3.07 per hundred cubic feet
 - A portion of the Commodity Delivery Charge is a pass through of water supply costs which is adjusted annually.
 - Remainder of water rates have not been adjusted since 2007, phased in over 5 years
- Low water user discount: low water users only pay the Minimum Charge (less than 3 hundred cubic feet per month)

Average residential customer uses 15 hcf/month resulting in \$54 in water charges per month



How much water is 15 hcf?



Answer:

75 5-gal bottles every day



FY 16/17 Financial Status: Revenue and Expense Comparison, \$M

Revenues from Rates	\$32.08	<ul style="list-style-type: none"> • About half of O&M expenses is for water supply. City has no control over these costs.
Other Revenues	<u>\$0.47</u>	
Total Revenues	\$32.55	
O&M Expenses	\$28.00	<ul style="list-style-type: none"> • On a cash basis, expenditures projected to exceed revenues by \$1.98M
Debt Service	\$2.39	
Replacement Projects	\$3.16	<ul style="list-style-type: none"> • Utility will spend reserves to pay for capital and portion of replacement projects
Capital Projects	<u>\$0.98</u>	
Total Expenses	\$34.53	
Surplus (Deficit)	(\$1.98)	



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Water System Upgrades and Replacements

- Anticipated water system needs:
 - Reservoir rehabilitation projects
 - Replace small diameter water mains with larger ones: improved fire flows and public safety
 - Well rehabilitation projects
 - SCADA/Fiber communications project
 - Natural gas engines on pumps
 - Ongoing replacement of facilities as they age:
 - Water meters
 - Fire hydrants
 - Valves
 - Pipe



Capital Improvement/Facilities Plan: Immediate Priority Projects

- Recurring Replacements
 - Service lines
 - Fire hydrants
 - Flow meters
 - Important to realize revenue
 - Determine lost and unaccounted for water
 - Valves
 - System appurtenances



Capital Improvement/Facilities Plan : Immediate Priority Cost Summary (2017-2022)

Category	Project Name	Cost (dollars)
Recurring Replacements	Service Lines, Fire Hydrants, Meters, Valves, and Appurtenances	\$17,537,415
Wells	Well Condition Assessment & Rehabilitation	\$933,257
Reservoirs	Reservoir Rehabilitations	\$16,272,538
Boosters	Potable Back-up Generators	\$1,047,510
Studies	Master Plan Update	\$450,000
Studies	Asset Management Study	\$227,347
Studies	Cyber Security	\$175,000
Total		\$36,643,067

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Why Is A Rate Increase Needed?

- Provide sufficient and safe water at the lowest possible cost
- Maintain our water infrastructure
- Less expensive to maintain than to do emergency repairs
- Capital Improvements



How Customers Can Participate in the Process

- Proposition 218
- Comment forms available tonight
- Website

<https://www.ci.garden-grove.ca.us/pw/water-rate-study>

- Water Rate Study Hotline: (714) 741-5520



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Rate Structure: Review Current Rate Structure

- **Minimum Charge:** depends on meter size; \$12.74 every two months for most customers
- **Capital Recovery Charge:** depends on meter size; \$1.47 every two months for most customers
- **Commodity Charge:** depends on water use.



FY 16/17 Financial Status: Reserves, \$M

Projected End of Fiscal Year 16/17	\$18.3 M
Some reserves are dedicated for:	
Two months of cash flow	\$ 1.3 M
\$500,000 for Emergency Contingency	\$ 0.5
5% of Net Plant	<u>\$ 7.2</u>
Total, Dedicated Reserves	\$ 9.0 M
Reserves Available for Capital, Replacement	\$ 9.3 M



With no rate increase, available reserves will be used up in 1-2 years, depending on amount of replacement and capital spending; Capital Improvement/Facilities Plan will not get implemented.



Proposed Fixed Charges:

- Increased Minimum Charge and Capital Improvement Charges to improve fiscal stability of utility
- Phased in over 5-years
- Provides funds to build necessary reservoir improvements and ongoing system repairs
- Increased Costs for all water customers
 - Mitigated by proposed Low Income Senior Discount



Proposed Minimum Charges

Bi-Monthly

Meter Size	Current Charge	Proposed Minimum Charges				
		FY 17/18	FY 18/19	FY 19/20	FY 20/21	FY 21/22
5/8 x 3/4"	\$12.74	\$18.02	\$28.15	\$29.63	\$31.95	\$33.85
1"	\$33.99	\$38.11	\$46.03	\$47.18	\$49.00	\$50.48
1 1/2"	\$65.82	\$68.92	\$74.86	\$75.72	\$77.09	\$78.20
2"	\$99.79	\$102.71	\$108.30	\$109.12	\$110.40	\$111.45
3"	\$165.62	\$174.25	\$190.83	\$193.24	\$197.04	\$200.15
4"	\$229.32	\$246.97	\$280.86	\$285.80	\$293.57	\$299.92
6"	\$524.45	\$537.61	\$562.87	\$566.55	\$572.34	\$577.08



Proposed Capital Improvement Charge

Bi-Monthly

Meter Size	Current Charge	Proposed Bi-Monthly Capital Improvement Charge				
		FY 17/18	FY 18/19	FY 19/20	FY 20/21	FY 21/22
5/8 x 3/4"	\$1.47	\$3.00	\$4.00	\$5.00	\$6.00	\$7.00
1"	\$2.07	\$7.50	\$10.00	\$12.50	\$15.00	\$17.50
1 1/2"	\$2.64	\$15.00	\$20.00	\$25.00	\$30.00	\$35.00
2"	\$4.27	\$24.00	\$32.00	\$40.00	\$48.00	\$56.00
3"	\$16.29	\$48.00	\$64.00	\$80.00	\$96.00	\$112.00
4"	\$20.60	\$75.00	\$100.00	\$125.00	\$150.00	\$175.00
6"	\$30.90	\$150.00	\$200.00	\$250.00	\$300.00	\$350.00



Commodity Charges:

How the costs (\$/hcf) were calculated

Tier 1	Cost of Locally Produced Groundwater; 75% of Water Use
Tier2	Cost of Imported Water; 25% of Water Use

Imported water costs more to produce than locally produced groundwater.

There is a limit to the amount of Locally Produced Groundwater that can be used.



Proposed Commodity Charges

	Two-Tier Commodity Delivery Charge, \$/hcf				
	FY 17/18	FY 18/19	FY 19/20	FY 20/21	FY 21/22
Tier 1 Commodity Charge, Excluding Pass Through	\$2.94	\$2.94	\$2.92	\$2.89	\$2.86
Tier 1 Wholesale Water Purchase Pass Thru Cost Adjustment [?]		\$0.07	\$0.15	\$0.20	\$0.29
Tier 2 Commodity Charge, Excluding Pass Through	\$3.65	\$4.06	\$4.15	\$4.28	\$4.40
Tier 2 Wholesale Water Purchase Pass Thru Cost Adjustment [?]		\$0.08	\$0.17	\$0.25	\$0.28

- Wholesale Water Purchase Pass Thru Cost Adjustment is an estimated value



Proposed hcf Included, Bi-Monthly

Meter Size	Maximum hcf, Tier 1
5/8 x 3/4"	33
1"	83
1 1/2"	165
2"	264
3"	528
4"	825
6"	1650

- Proposed hcf maximum in Tier 1 per bi-monthly billing period
- hcf above the Tier 1 maximum will be billed at Tier 2 level



Current Private Fire Service Rates

Connection Size (in)	No. of Connections	Existing Bi-Monthly Rate		
		Current Rates Fire Service	Current Capitol Improvemt Fee	Current Rates Total
5/8 x 3/4"	0	\$11.00	\$1.47	\$12.47
1"	0	\$11.00	\$2.07	\$13.07
1 1/2"	3	\$11.00	\$2.64	\$13.64
2"	69	\$11.00	\$4.27	\$15.27
3"	3	\$14.00	\$16.29	\$30.29
4"	106	\$19.00	\$20.60	\$39.60
6"	268	\$29.00	\$30.90	\$59.90
8"	183	\$38.00	\$42.68	\$80.68
10"	9	\$48.00	\$54.54	\$102.54



Proposed Private Fire Service Rates

Connection Size (in)	No. of Connections	Proposed Bi-Monthly Rate				
		FY 17/18	FY 18/19	FY 19/20	FY 20/21	FY 21/22
5/8 x 3/4"	0	\$0.84	\$0.93	\$0.96	\$0.99	\$1.02
1"	0	\$0.84	\$0.93	\$0.96	\$0.99	\$1.02
1 1/2"	3	\$2.43	\$2.70	\$2.79	\$2.89	\$2.99
2"	69	\$5.17	\$5.75	\$5.95	\$6.16	\$6.38
3"	3	\$15.02	\$16.72	\$17.31	\$17.92	\$18.55
4"	106	\$32.01	\$35.63	\$36.88	\$38.17	\$39.51
6"	268	\$93.00	\$103.51	\$107.13	\$110.88	\$114.76
8"	183	\$198.18	\$220.57	\$228.29	\$236.28	\$244.55
10"	9	\$356.40	\$396.67	\$410.55	\$424.92	\$439.79

- Fire Service customers will no longer pay the Capital Improvement Charge
- Private Fire Service rates to increase at the same rate as overall water rate increases, through FY 21/22



Current Low-Water User Discount

- Eligibility Criteria:
 - Single-Family household that uses 6 hcf or less per billing period
- Low-Water User
 - Exempt from paying Capital Improvement Charge
 - Exempt from paying Commodity Charge



New Low-Water User Discount

- Eligibility Criteria:
 - Single-Family household that uses 6 hcf or less per billing period
- Low-Water User
 - Exempt from paying Commodity Charge
- City Council must approve prior to implementation
- To be implemented June 2018



Low-Income Senior Discount

- Eligibility Criteria:
 - Resident that lives at the billing address
 - Bill must be in the Resident's name
 - 65 years or older
 - Enrolled in SCE's CARE Program
- City Council must approve prior to implementation



Low-Income Senior Discount Proposed Implementation

- Use Water Utility Non-Rate Revenues
 - Estimated at \$350,000 per year from late fees
- Initially offer \$5/month, (\$10/billing period) discount
- Evaluate during first year:
 - How many customers sign up
 - Whether discount can be increased in subsequent years
- Proposed Discount to begin June 2018



Water Bill Comparisons: Average Single-Family Residence

Single Family, 30 hcf Bi-Monthly Water Use

<i>Current</i>	Two-Tier Increasing Block Rate					Cumulative
	3/1/2018	1/1/2019	1/1/2020	1/1/2021	1/1/2022	% Increase
\$106.31	\$109.22	\$120.35	\$122.23	\$124.65	\$126.65	\$20.34
<i>% Change</i>	2.7%	10.2%	1.6%	2.0%	1.6%	19.1%

- Amounts do not include future Wholesale Water Purchase Pass Thru Cost Adjustment



Water Bill Comparisons: Single-Family Residence 7 hcf Bi-Monthly

Single Family, 7 hcf Bi-Monthly Water Use

	Two-Tier Increasing Block Rate					Cumulative
<i>Current</i>	3/1/2018	1/1/2019	1/1/2020	1/1/2021	1/1/2022	Increase
\$35.70	\$41.60	\$52.73	\$55.07	\$58.18	\$60.87	\$25.17
<i>% Change</i>	16.5%	26.8%	4.4%	5.6%	4.6%	70.5%

- Amounts do not include future Wholesale Water Purchase Pass Thru Cost Adjustment



Water Bill Comparisons: 50-Unit Apartment Building, 3” Meter

Multi-Family 50-Units, 12 hcf/month per unit

<i>Current</i>	Two-Tier Increasing Block Rate					Cumulative % Increase
	3/1/2018	1/1/2019	1/1/2020	1/1/2021	1/1/2022	
\$4,107.53	\$4,227.37	\$4,535.47	\$4,603.80	\$4,695.12	\$4,779.03	\$671.50
<i>% Change</i>	2.9%	7.3%	1.5%	2.0%	1.8%	16.3%

- Amounts do not include future Wholesale Water Purchase Pass Thru Cost Adjustment



Water Bill Comparisons: Example Commercial, 2” Meter

Example Commercial, 500 hcf Bi-Monthly Water Use

<i>Current</i>	Two-Tier Increasing Block Rate					Cumulative
	3/1/2018	1/1/2019	1/1/2020	1/1/2021	1/1/2022	Increase
\$1,698.68	\$1,764.27	\$1,874.62	\$1,899.40	\$1,931.44	\$1,960.89	\$262.21
<i>% Change</i>	3.9%	6.3%	1.3%	1.7%	1.5%	15.4%

- Amounts do not include future Wholesale Water Purchase Pass Thru Cost Adjustment



Next Steps

- Public engagement
 - Preserve the City's record of public transparency and accountability
 - Preserve the financial viability of our water system.
 - Protect our local water supplies
- Billing system software modifications
- Proposition 218 notification to all customers, anticipated January 2018
- Public Hearing, anticipated February 2018
- Anticipated rate adjustments, if adopted by Council, effective April 1, 2018



Feedback, Questions, Comments?

Thank you for your time.