



# Central Alabama Water

## Rates Workshop

May 29, 2026





# Agenda

1. **Introductions**
2. **System Demographics**
3. **2026 Update**
4. **Rate Setting Process**
5. **Cost-Of-Service Principles**
6. **Rate History**
7. **Current Situation**
8. **Revenue Recovery Options**
9. **Wrap Up**

# Introductions



# System Demographics



## Service Area & System Overview

Central Alabama Water - Largest Water Utility in Alabama



**5**

COUNTIES SERVED

Jefferson, Shelby, St. Clair, Blount & Walker



**200,000+**

CUSTOMER CONNECTIONS

Largest water utility in Alabama



**759+**

SQUARE MILES

Service area coverage across 5 counties



**4,150+**

MILES OF WATER MAIN

Distribution network



**4**

TREATMENT PLANTS

Carson, Putnam, Shades Mountain, Western



**189 MGD**

TOTAL TREATMENT CAPACITY

Across 4 plants (Shades Mtn, Western, Carson, Putnam)

INFRASTRUCTURE

# Water Supply & Treatment Capacity

Surface water drawn from Warrior River basin and Cahaba River basin

Treatment Plant	Water Source	Capacity
Shades Mountain	Cahaba River & Lake Purdy	80 MGD
Western	Sipsey & Mulberry Forks (Warrior R.)	60 MGD
Carson	Inland Lake / Sipsey Fork (Warrior R.)	25 MGD
Putnam	Inland Lake, Sipsey & Mulberry Forks	24 MGD
<b>Combined Average Daily Production</b>		<b>~110 MGD</b>

\* MGD = million gallons per day.



### PRIMARY SUPPLY SOURCES

Warrior River basin (Sipsey, Mulberry & Locust Forks) and Cahaba River basin, including Inland Lake and Lake Purdy reservoirs



### QUALITY ASSURANCE

ADEM- and EPA-certified EnviroLab conducts ~62,800 tests per year across the system



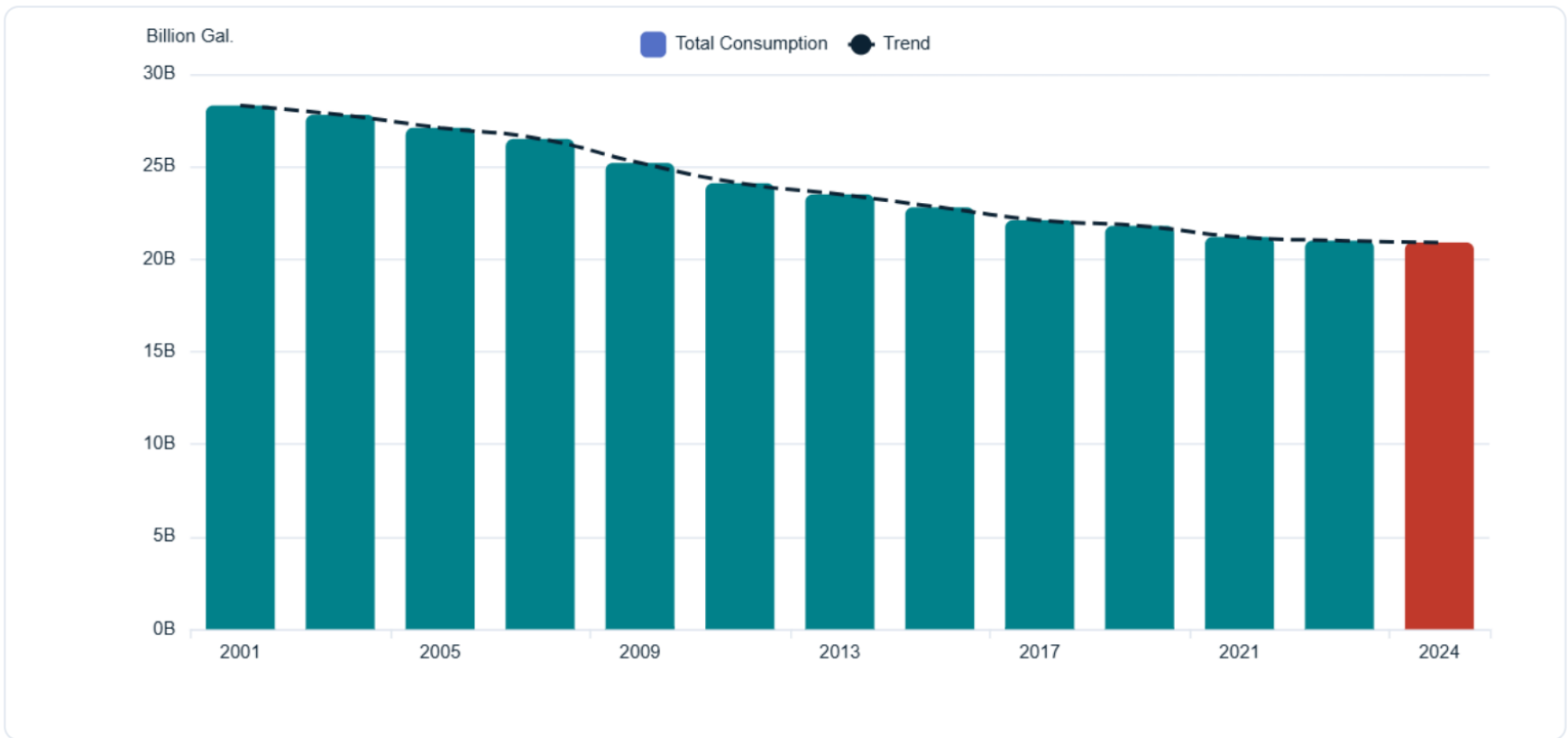
### NON-REVENUE WATER CHALLENGE

53% of treated water was unbilled in 2024 — compared to a ~20–30% national average — primarily driven by leaks and system losses

DEMAND TRENDS

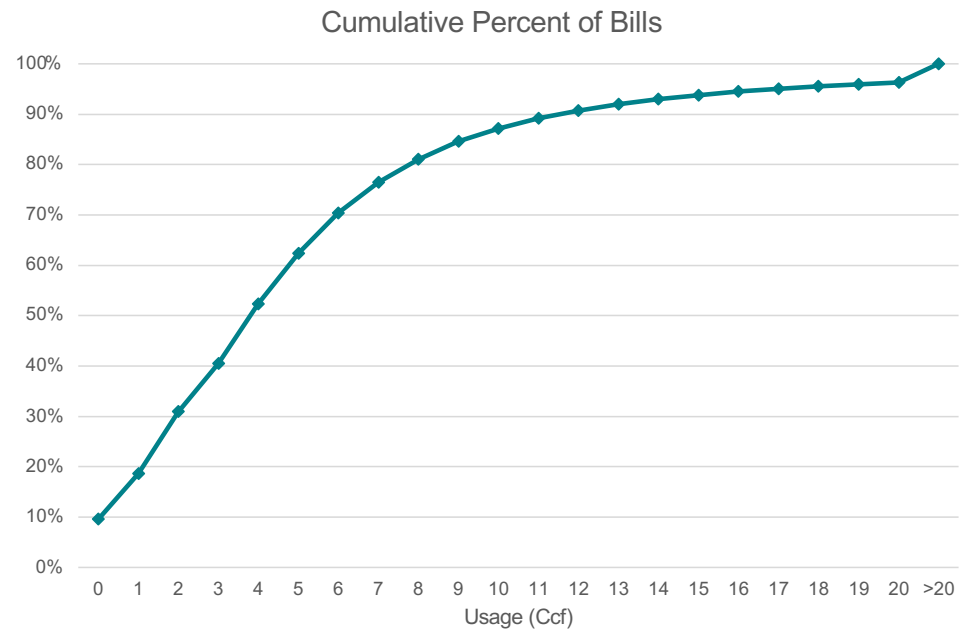
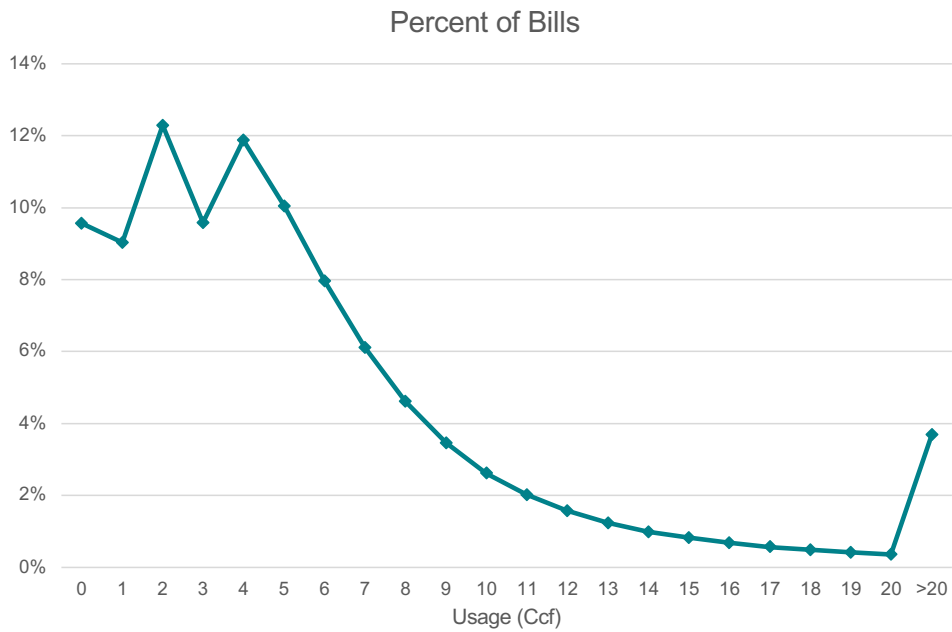
# Consumption & Demand Profile

2001–2024 historical data from CAW EMMA disclosure report



Sources: CAW EMMA disclosure report (March 2026) · WBRC / ABC 3340 reporting

# Residential Usage Distribution

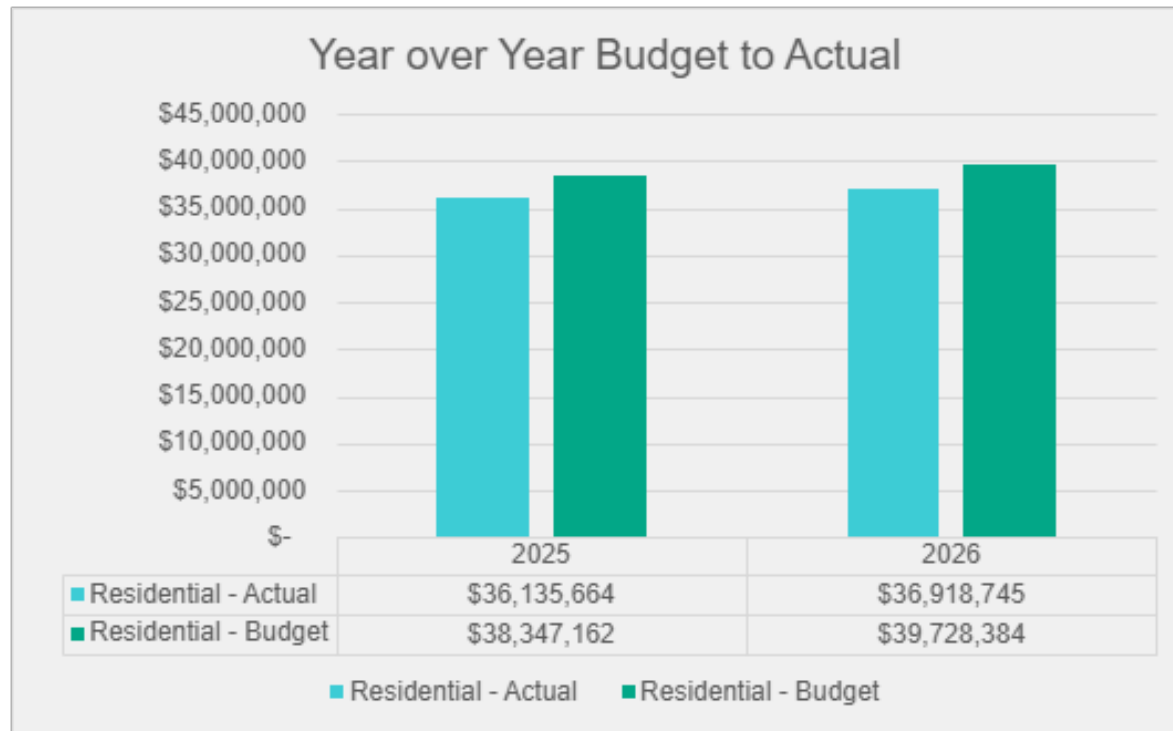


\* Average over the last three years

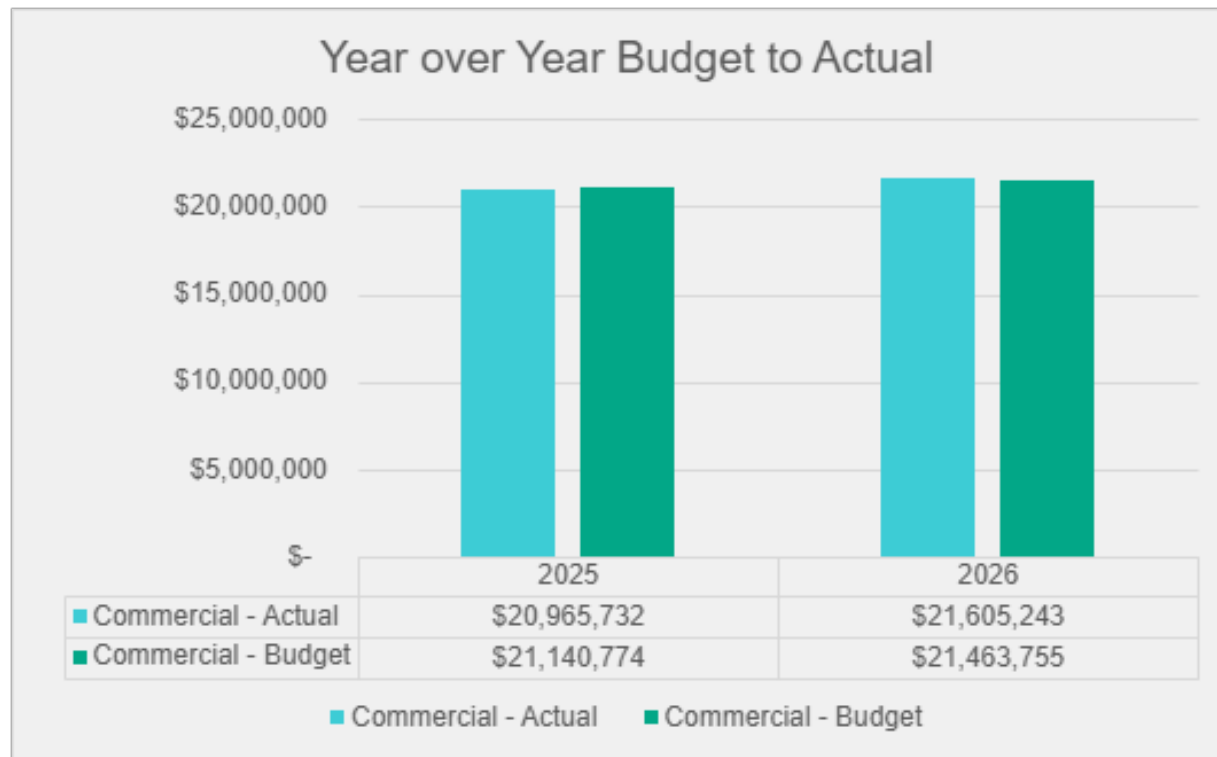
# 2026 Update



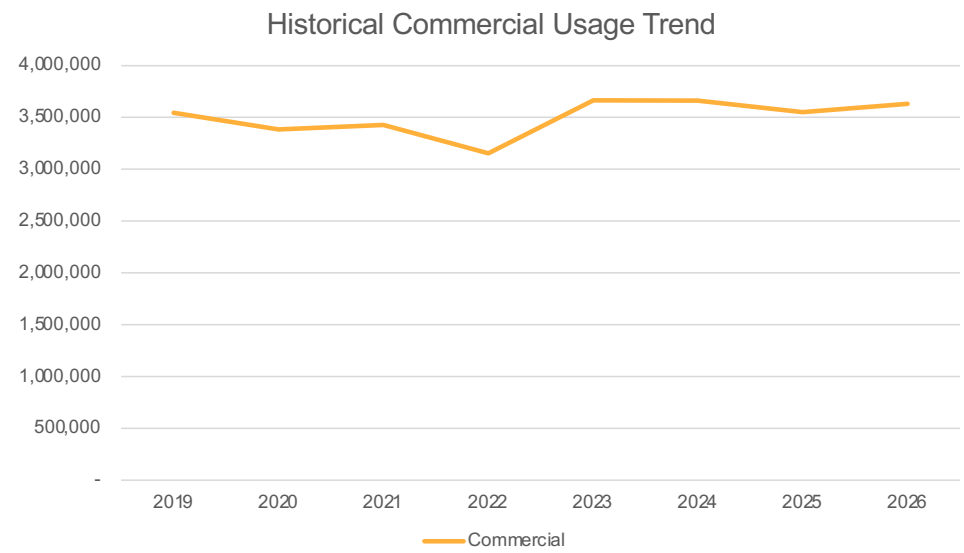
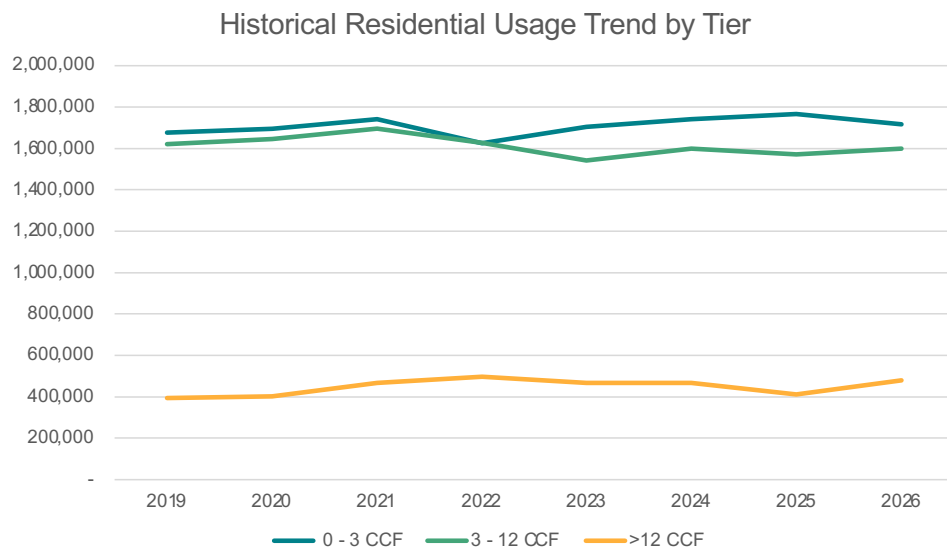
# Actual vs. Budget (Residential thru April)



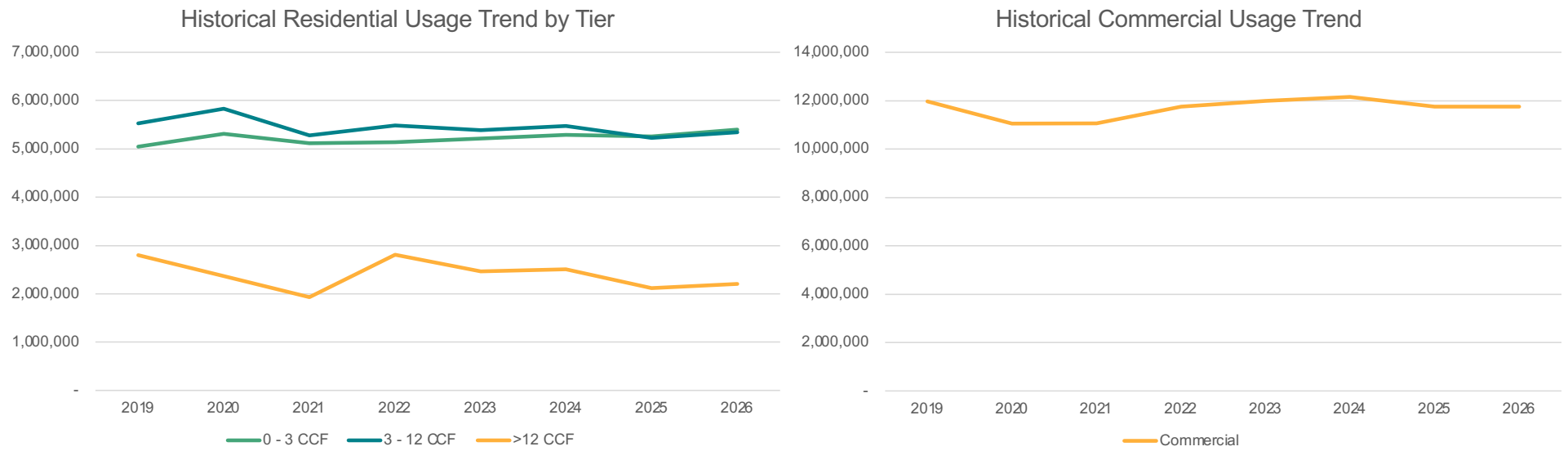
# Actual vs. Budget (Commercial thru April)



# Usage Trends (Jan-Apr)

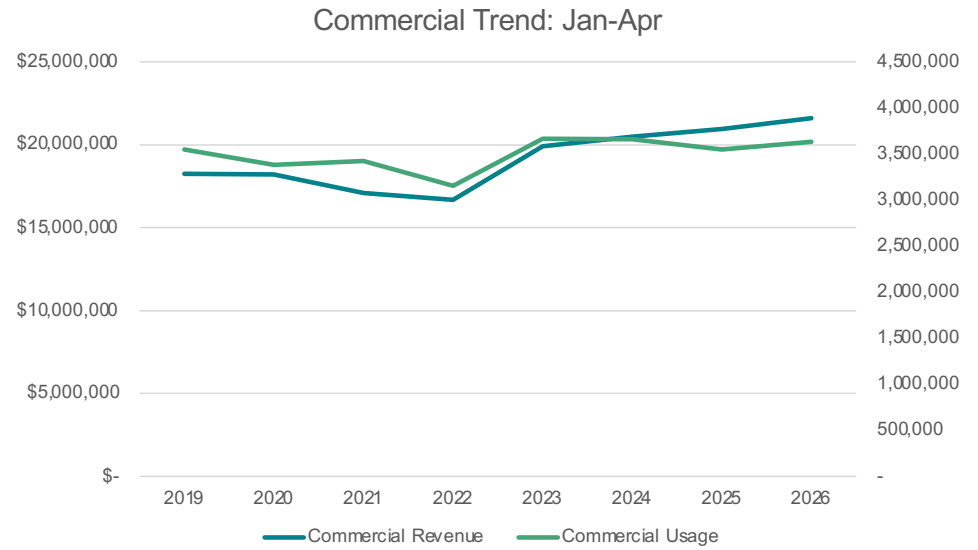
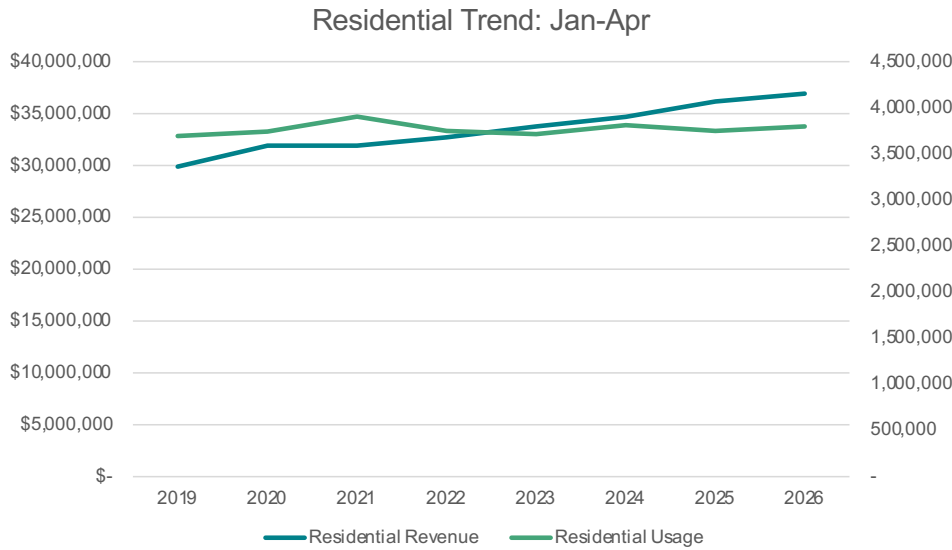


# Usage Trends (Full Year)



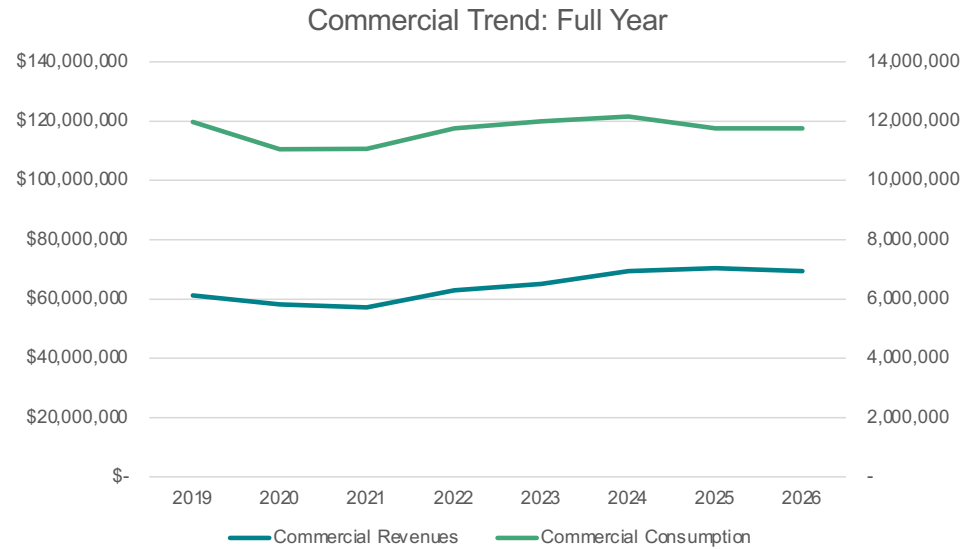
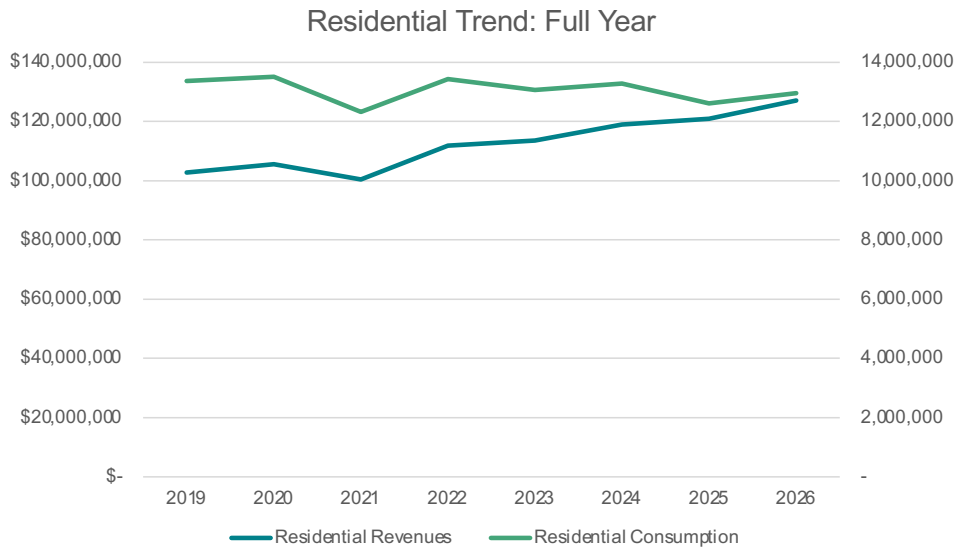
# Revenue & Consumption Trend – Thru April

Approved Rate Increase	2019	2020	2021	2022	2023	2024	2025	2026
	3.90%	3.90%	0.00%	3.90%	3.90%	4.80%	4.90%	0.00%



# Revenue & Consumption Trend – Full Year

Approved Rate Increase	2019	2020	2021	2022	2023	2024	2025	2026
	3.90%	3.90%	0.00%	3.90%	3.90%	4.80%	4.90%	0.00%



# Commentary on Revenues

- Declining per capita usage and slightly declining usage
- Tier 3 and Commercial usage are more prone to yearly usage variances
- Meter reading gaps and extended estimation periods have led to billing irregularities
  - › ~\$120 million budgeted for a full automated meter reading transition (targeted 2028)
    - Designed to eliminate manual reading and improve billing accuracy system-wide
- Revenue increases due to rate increases

# Rate Setting Process



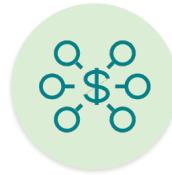
# Rate Study Components



## FINANCIAL PLANNING

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- **Financial forecasting**
- **Capital financing**
  - > Debt vs. equity
- **Financial policies**
  - > Reserves
  - > Coverage
  - > Leverage



## COST OF SERVICE

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- **Cost-of-service spectrum**
  - > Fixed vs. variable
  - > Cost to serve each customer class
- **Allocate costs into buckets for purpose of rate design**

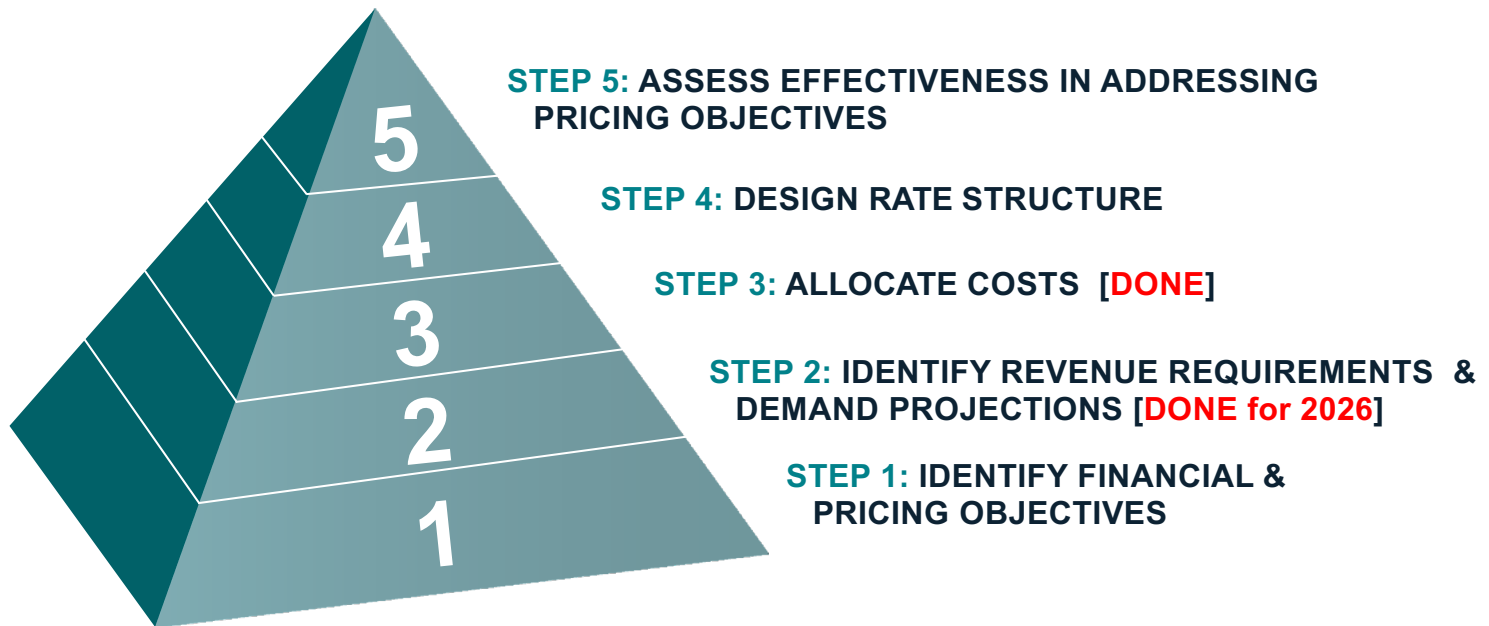


## RATE DESIGN

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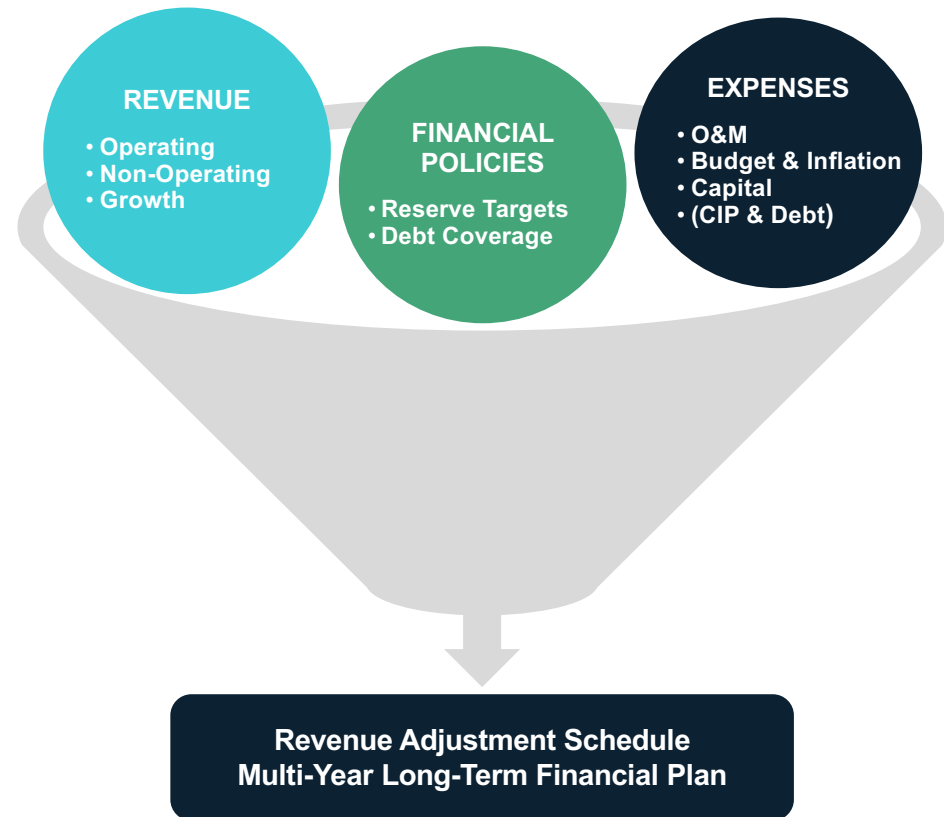
- **Pricing Objectives**
- **Fixed charges**
  - > Base charge (account, meter size, % of capital etc.)
- **Volumetric rates**
  - > Uniform, inclining blocks, declining blocks, seasonal, water budgets, etc.
- **Affordability & Communications**

# Rate Study Process

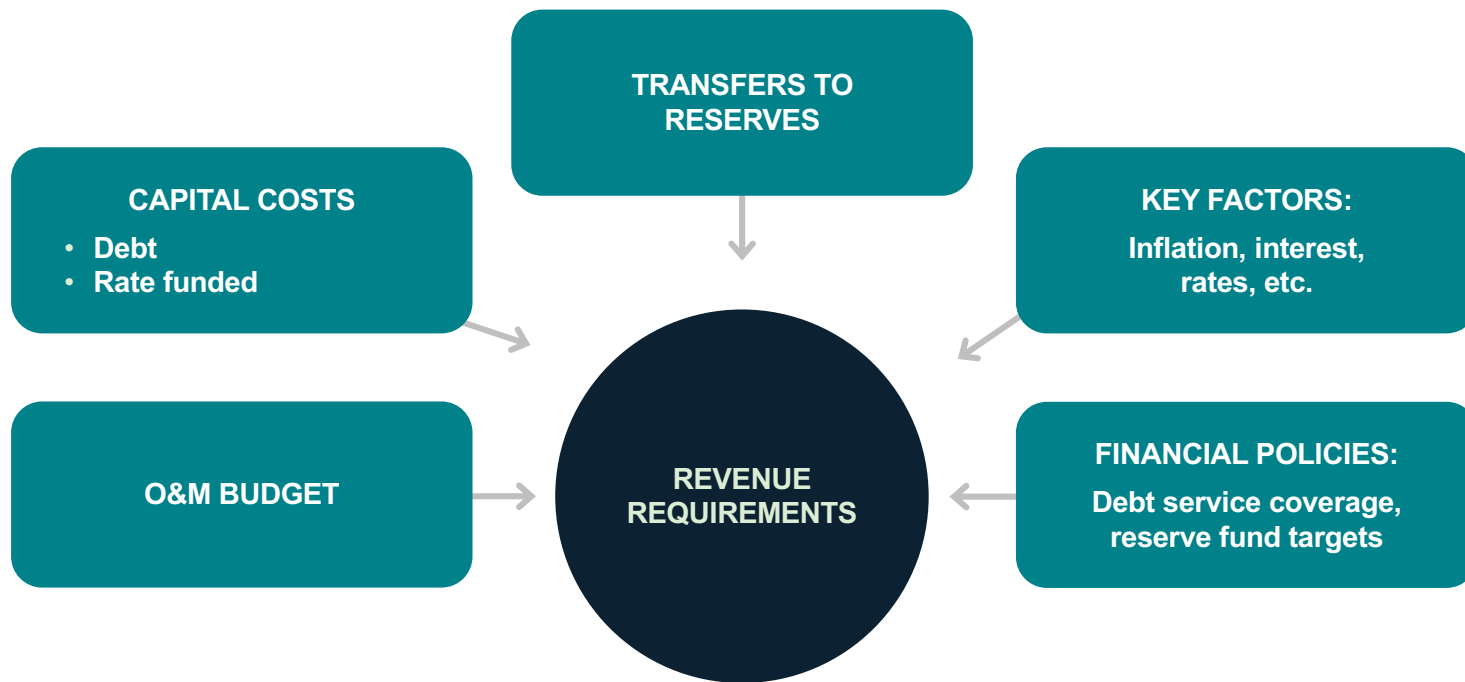


# Financial Plan

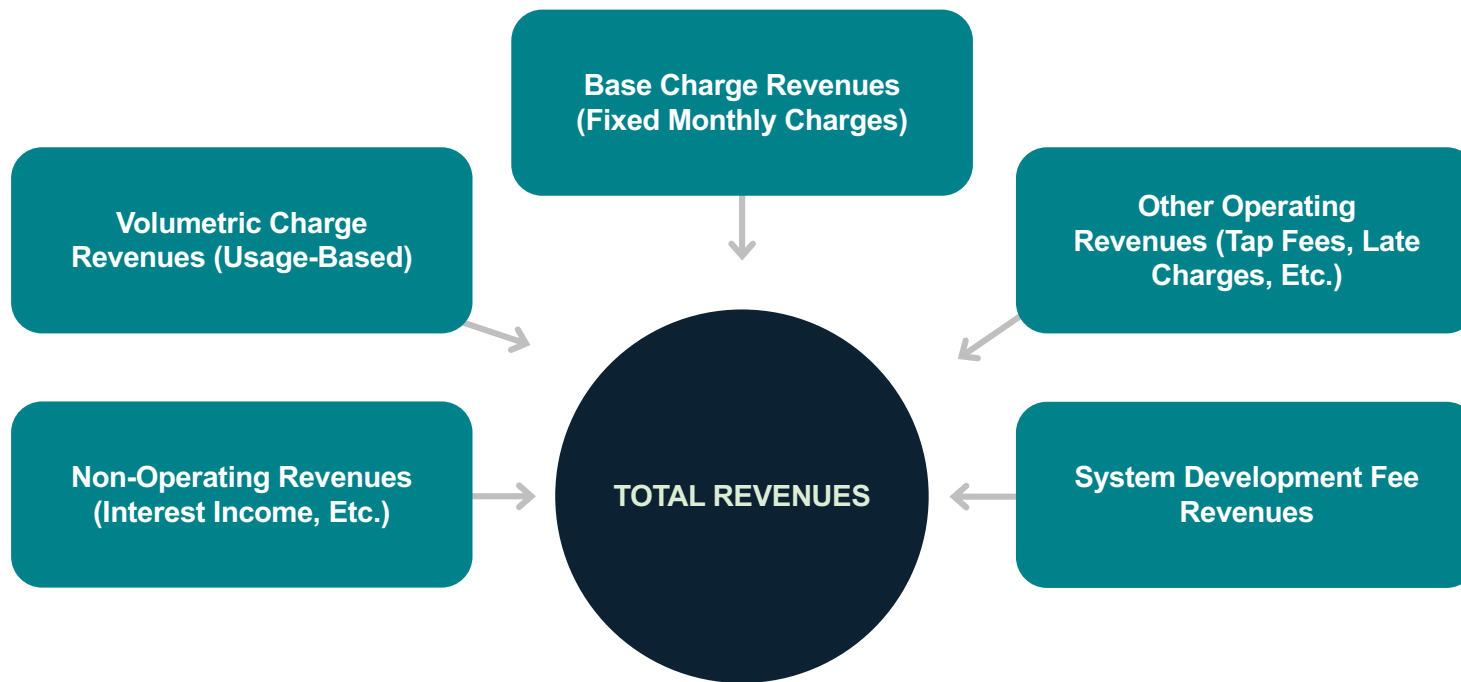
Balances current needs vs. the future needs of the system



# Identify Revenue Requirements



# Identify Revenue Stream



# Revenue Sufficiency

- Utilities examine Revenues and Revenue Requirements to project annual Surplus/(Deficit) – where revenues exceed or fall short of costs
- Annual Surplus/(Deficit) and Key Metrics such as Days Cash on Hand and Debt Service Coverage determine necessary rate increases for the Utility to be sufficient annually
  - › Revenues are typically increased through increases to the Base Charge and Volumetric Charges

# Cost-of-Service Principles



# Golden Rule for Rates

**Rates must not be Arbitrary and Capricious**

## Purpose of Cost-of-Service

Ensure equitable cost recovery among customer classes

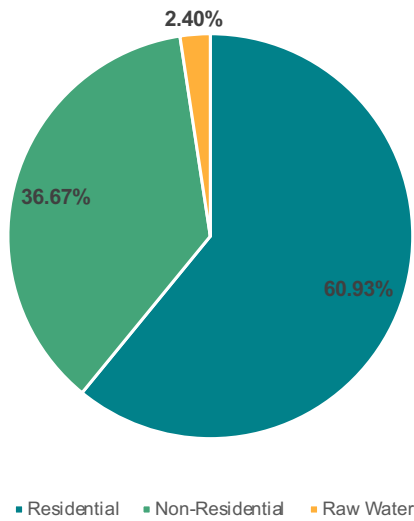
- Residential
- Non-Residential
- Wholesale
- Fire Protection
- Raw Water

## Basis of Cost-of-Service

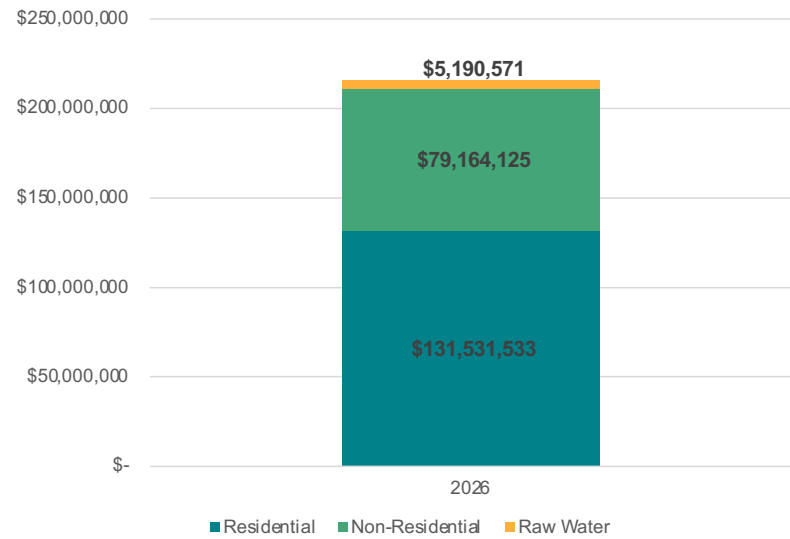
- Customers place varying levels of strain on the system due to peak day and peak hour usage
- Non-Residential customers are typically consistent in daily and hourly use
- Residential customers (typically irrigators) drive the peaking factor for the Residential customer class up
  - › In turn, this leads to many utilities charging higher rates for non-essential usage to residential customers

# 2024 Cost-of-Service Allocation

2024 COS Distribution



2026 Allocation



# Rate History



## RSE Model History

- The Board adopted a Rate Stabilization and Equalization Model (“RSE”) in 2005
- The RSE Process required the Board to annually update rates according to the RSE Model
  - › Based on the approved budget and capital improvement plan
- Annual updates to the RSE model driven by maintaining operating results that were consistent with the RSE targets and minimums
- Rates were adjusted if there was a revenue deficit or if in any year the coverage levels were projected to fall below the RSE minimum

# Current Rate Structure

- CAW Charges a Monthly Fixed Charge and Volumetric Rates
  - › All customers pay a fixed charge based on Meter Size
  - › Non-Residential Customers pay a uniform volumetric rate
  - › Residential Customers pay rates based on an Inclining Block Structure
    - Tier 1: 0-3 Ccf
    - Tier 2: 3-12 Ccf
    - Tier 3: Greater than 12 Ccf
  - › The Residential Tier 3 cutoff moved from 15 Ccf to 12 Ccf beginning in 2025

WATER 101

# What is a CCF?

CCF STANDS FOR

**Centum Cubic Feet**

100 cubic feet of water

=

**748**  
Gallons



**30 gal/day**

basic usage per person



**~25 days**

of water for one person



**~6 days**

for a family of four

1 CCF = 748 gallons | 1 gallon  $\approx$  0.00134 CCF

# Historic Volumetric Rate Structure Evolution

- Before 2007
  - › Residential – 3 tiers with cut-offs at 11 and 22 Ccf
  - › Non-Residential – 5 decreasing tier rates
- 2007-2011
  - › Residential – 2 tiers with cut-off at 15 Ccf
  - › Non-Residential – uniform rate
- 2012-2024
  - › Residential – 3 tiers with cut-off at 3 and 15 Ccf
  - › Non-Residential – uniform rate
- 2025-Present
  - › Residential – 3 tiers with cut-off at 3 and 12 Ccf
  - › Non-Residential – uniform rate

## 2006 vs. 2026 Rates

### 2006

- Tier 1 (0-11 Ccf) - \$1.92
- Tier 2 (11-22 Ccf) - \$2.37
- Tier 3 (22+ Ccf) - \$2.84
  
- Base Charge - \$9.20

### 2026

- Tier 1 (0-3 Ccf) - \$2.96
- Tier 2 (4-12 Ccf) - \$4.91
- Tier 3 (12+ Ccf) - \$8.58
  
- Base Charge - \$28.49

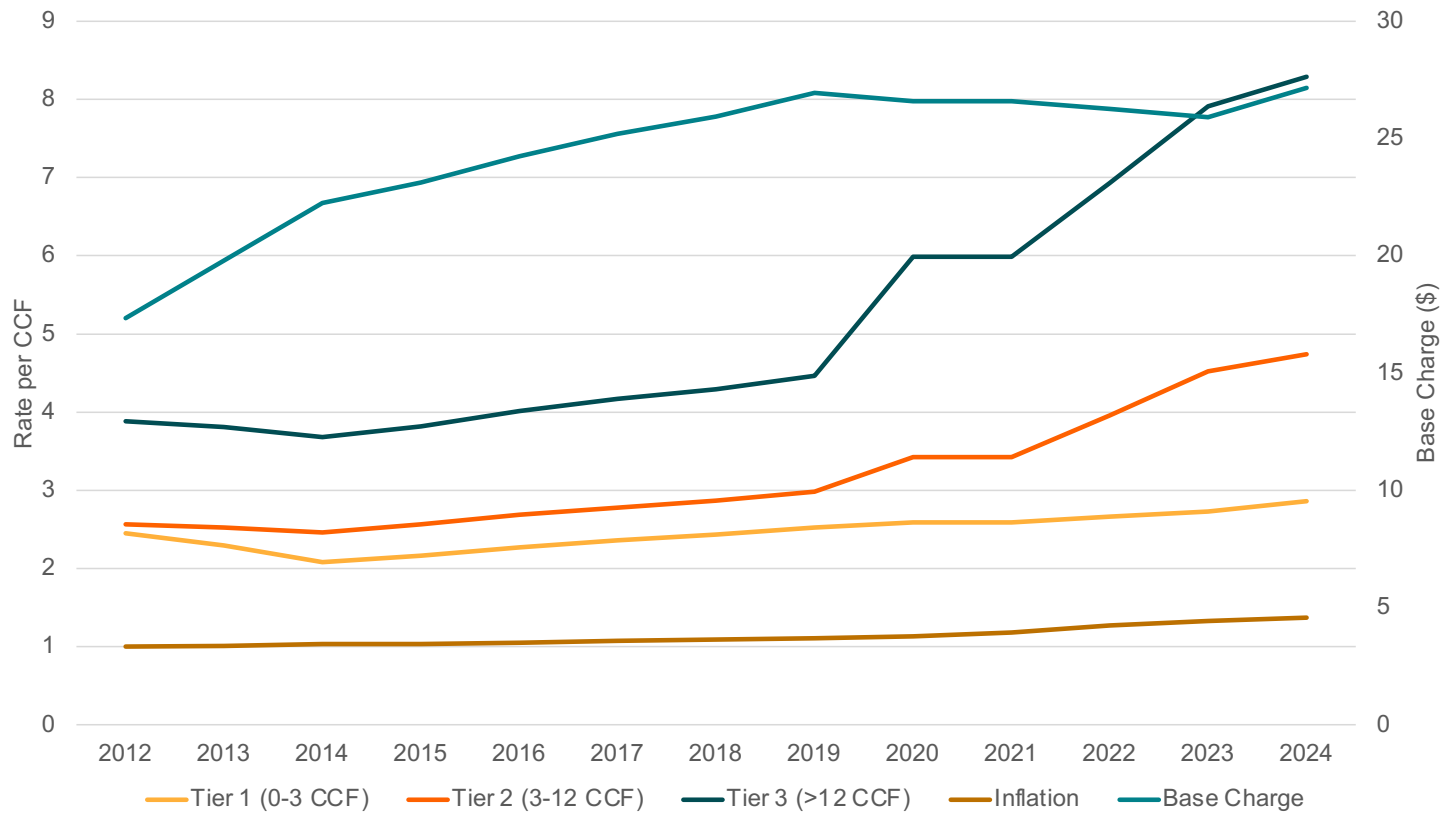
# 2006 vs. 2026 Rates

Usage (Ccf)	2006	2026
1	\$\$	\$\$\$
2	\$\$	\$\$\$
3	\$\$	\$\$\$
4	\$\$	\$\$\$\$
5	\$\$	\$\$\$\$
6	\$\$	\$\$\$\$
7	\$\$	\$\$\$\$
8	\$\$	\$\$\$\$
9	\$\$	\$\$\$\$
10	\$\$	\$\$\$\$
11	\$\$	\$\$\$\$
12	\$\$\$	\$\$\$\$
13	\$\$\$	\$\$\$\$\$\$
14	\$\$\$	\$\$\$\$\$\$
15	\$\$\$	\$\$\$\$\$\$
16	\$\$\$	\$\$\$\$\$\$
17	\$\$\$	\$\$\$\$\$\$
18	\$\$\$	\$\$\$\$\$\$
19	\$\$\$	\$\$\$\$\$\$
20	\$\$\$	\$\$\$\$\$\$
21	\$\$\$	\$\$\$\$\$\$
22	\$\$\$	\$\$\$\$\$\$
23	\$\$\$\$	\$\$\$\$\$\$
24	\$\$\$\$	\$\$\$\$\$\$
25	\$\$\$\$	\$\$\$\$\$\$

Base Charge \$ 9.05 \$ 28.49

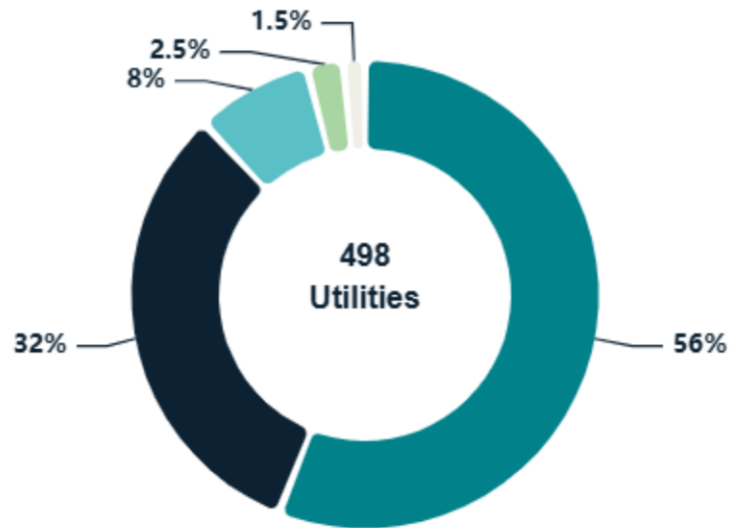
# Rate History

\$/CCF plus Base Charge (2012 – 2024)

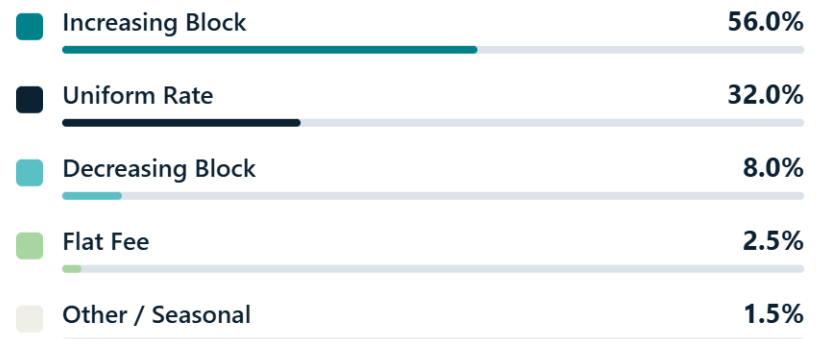


## Water Rate Structure Types

Distribution of volumetric rate structure types across U.S. water utilities



### RATE STRUCTURE



**498**

Utilities Surveyed

**51**

States + D.C.

Source: Ellio Analytics / AWWA–Raftelis 2025 Water & Wastewater Rate Survey

# Peer Water Rate Comparison

Alabama Peer Utilities — Residential Rates

2026

## VOLUMETRIC RATES

### Huntsville Utilities

Increasing Block | Eff. Nov 1, 2023

Block (CCF)	Rate/CCF
0 – 3	\$1.70
3 – 6	\$3.21
6 – 12	\$3.48
Over 12	\$4.96

### Mobile Area Water & Sewer System

Decreasing Block | Eff. Jan 1, 2025

Block (CCF)	Rate/CCF
0 – 2,000	\$3.97
Over 2,000	\$3.53

### Montgomery Water Works (MWWSSB)

Decreasing Block | Eff. Jan 1, 2026

① Combined water & sewer — water-only est. at 50%

Block (1,000 gal)	Water Est./1,000 gal
0 – 4,000	\$6.15
4,001 – 50,000	\$5.35
Over 50,000	\$5.27

## BASE CHARGE — 5/8" METER (MONTHLY)

Utility	Monthly Base	Notes
Huntsville Utilities	\$14.00	No volumetric allowance
Mobile AWSS	\$14.66	Includes 2.5 CCF allowance
Montgomery MWWSSB	\$24.58	Water est. (50% of \$49.16 combined)

Sources: Elio Analytics (AWWA/Raftelis Survey, 2025 Dataset); Montgomery Water Works & Sanitary Sewer Board (mwwssb.com, May 2026). Montgomery rates are combined water and sewer — water-only figures estimated at 50% of published rate.

# Current Situation



# Current Water Rate Structure

2026		Base Charge		2026	
5/8"	\$	28.49	<b>Residential</b>		
3/4"	\$	37.78	0 - 3 Ccf	\$	2.96
1"	\$	56.87	3 - 12 Ccf		4.91
1.5"	\$	102.91	>12 Ccf		8.58
2"	\$	161.11	<b>Commercial</b>		
3"	\$	340.73	All Usage (Ccf)	\$	4.69
4"	\$	513.87	<b>Raw Water</b>		
6"	\$	988.45	All Usage (Ccf)	\$	1.411
8"	\$	1,556.08			
10"	\$	2,212.03			

Increasing Block Volumetric Structure for Residential customers, Uniform Block Structure for Commercial Customers

# Usage (in Ccf): Budget to Actual 2026

2026 Usage (Jan-Apr)			
	Budget	Actual	Difference
Residential			
Tier 1	1,566,253	1,715,812	149,559
Tier 2	1,551,751	1,597,991	46,240
Tier 3	638,103	481,207	(156,896)
Non-Residential			
Commercial	3,560,965	3,629,515	68,551
Industrial	109,758	122,391	12,633
Municipal	284,820	282,064	(2,756)
Private Fire	20,000	27,472	7,472
Other Customer Classes			
Wholesale	300,051	278,777	(21,274)
Raw Water	1,300,000	1,058,278	(241,722)
<b>Total Usage</b>	<b>9,331,700</b>	<b>9,193,506</b>	<b>(138,194)</b>

\* Based on data provided by Utegration from SAP

# Volumetric Revenues: Budget to Actual 2026

2026 Volumetric Revenues (Jan-Apr)					
		Budget	Actual	Difference	
Residential					
	Tier 1	\$ 4,636,109	\$ 5,078,803	\$ 442,694	
	Tier 2	\$ 7,619,096	\$ 7,846,136	\$ 227,041	
	Tier 3	\$ 5,474,924	\$ 4,128,756	\$ (1,346,168)	
Non-Residential					
	Commercial	\$ 16,700,925	\$ 17,022,427	\$ 321,502	
	Industrial	\$ 514,763	\$ 574,013	\$ 59,249	
	Municipal	\$ 1,335,804	\$ 1,322,879	\$ (12,925)	
	Private Fire	\$ 93,800	\$ 128,842	\$ 35,042	
Other Customer Classes					
	Wholesale	\$ 1,170,200	\$ 1,087,230	\$ (82,970)	
	Raw Water	\$ 1,834,300	\$ 1,493,230	\$ (341,070)	
<b>Total Volumetric Revenues</b>		<b>\$ 39,379,921</b>	<b>\$ 38,682,317</b>	<b>\$ (697,604)</b>	

\* Calculated based on current rates and data provided by Utegration from SAP

# Revenue Recovery Options



## Three Primary Questions

- How much revenue do you want to recover through the base charge?
- What volumetric rate structure do you want for residential customers?
- How quickly do you want to get to this rate structure?

# Rate Structure Options – Fixed vs. Variable

## Primary Charge Types and Considerations

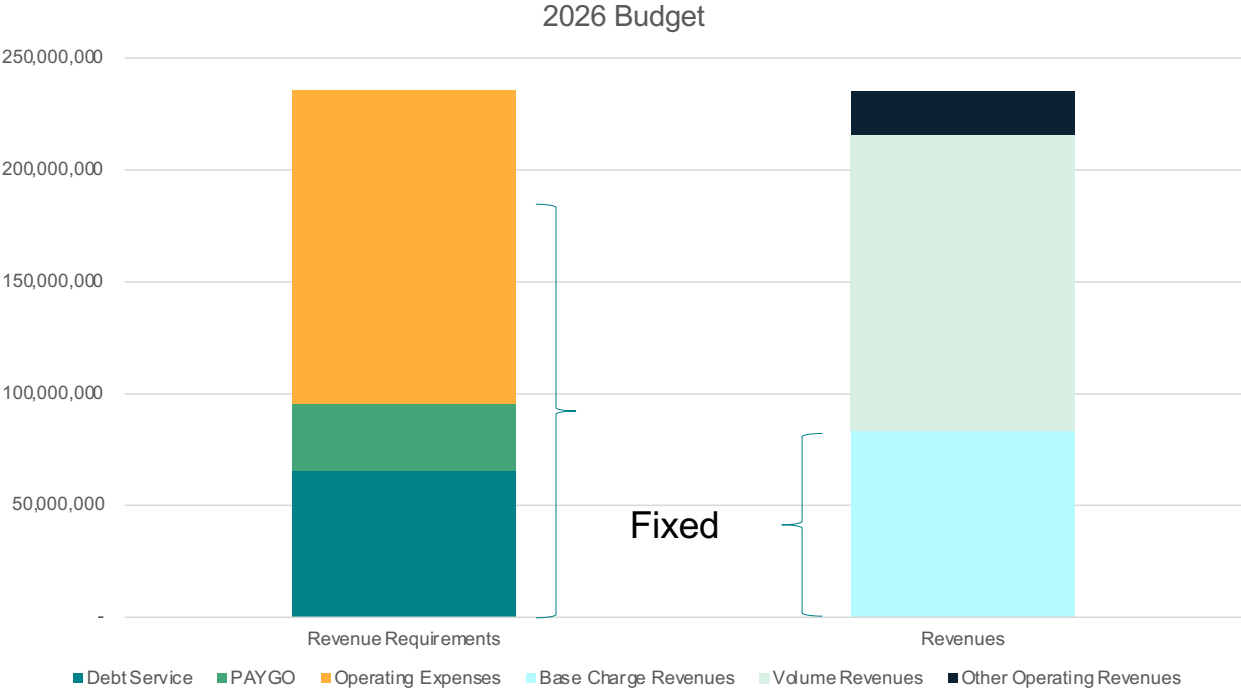
### Fixed Charges

- Invariant with customer water usage
- Cost of service fixed charges reflect customer related costs
- Fixed charges may include portion of capital costs

### Variable Charges

- Vary with amount of water used
- Recover utility costs that vary with customer usage patterns
- Recover some portion of utility's fixed costs
- Recover costs of peak usage (demand charge)

# Fixed vs. Variable Revenue and Expenses



## Sizing the Base Charge

- 80% of costs are fixed, but no one sets it that level
  - › Currently recovers 35% of revenue requirements
- Lower to reduce impact on low volume users
  - › Requires more revenue to be recovered through volumetric rates
  - › Reduces revenue stability
- Leave as is
- Increase to cover all debt service and PAYGO
  - › Increases impact on low volume users
  - › Enhances revenue stability
  - › Allow volumetric rates to be reduced



# Rate Structure Options

- Lower Differential Between Tiers
  - › Two options with lower differentials between tiers
    - Option 1 - 18% difference between Tiers 1 & 2, and a 77% difference between Tiers 1 & 3 (Equal to the differential in rates from 2019)
    - Option 2 - 23% difference between Tiers 1 & 2, and a 48% difference between Tiers 1 & 3 (Equal to the differential in rates from 2006)
- Uniform rate
  - › All residential customers are charged the same rate per Ccf regardless of use

# Rate Structure Alternative 1

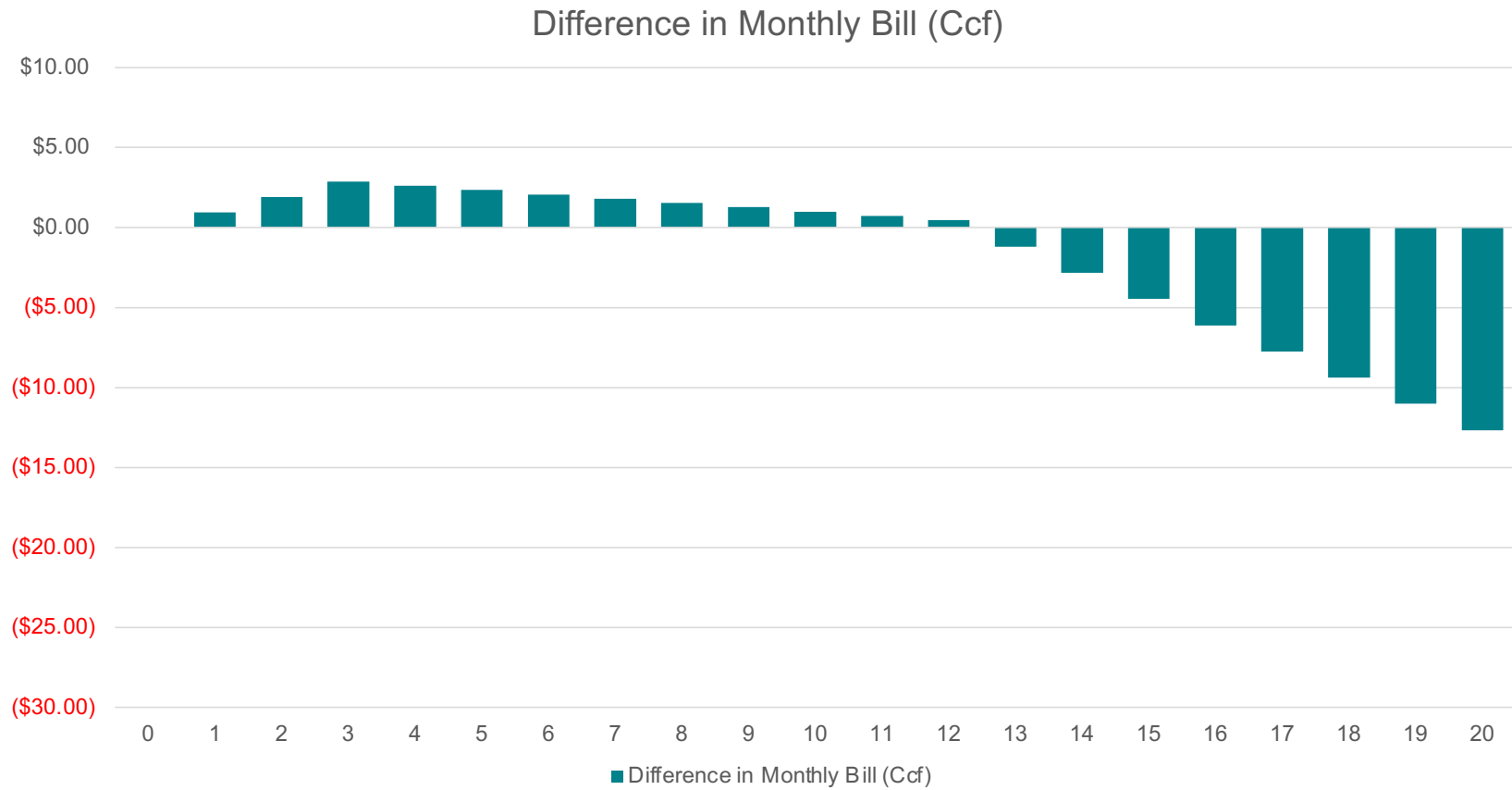
	<u>2026</u>			
	<u>Current Rates</u>		<u>Alternative Rates</u>	
Base Charge	\$	28.49	\$	28.49
T1 - 0-3 Ccf	\$	2.96	\$	3.92
T2 - 3-12 Ccf	\$	4.91	\$	4.64
T3 - >12 Ccf	\$	8.58	\$	6.94

	<u>2026 Budget</u>				
	<u>Current Revenues</u>		<u>Alternative Revenues</u>		<u>Difference</u>
Base Charge	\$	65,994,763	\$	65,994,763	\$ -
T1 - 0-3 Ccf		15,984,000		21,168,000	5,184,000
T2 - 3-12 Ccf		26,268,500		24,824,000	(1,444,500)
T3 - >12 Ccf		18,876,000		15,268,000	(3,608,000)
Total Residential Revenues	\$	127,123,263	\$	127,254,763	\$ 131,500
Typical Customer Bill (6 Ccf)	\$	52.10	\$	54.17	\$ 2.07

## Customer Impacts: Alternative 1

<u>Usage</u>			<u>2026</u>		<u>Difference</u>	<u>% Change</u>	
	<u>Current Rates</u>		<u>Alternative Rates</u>				
0 Ccf	\$	28.49	\$	28.49	\$	-	0.00%
2 Ccf	\$	34.41	\$	36.33	\$	1.92	5.58%
5 Ccf	\$	47.19	\$	49.53	\$	2.34	4.96%
10 Ccf	\$	71.74	\$	72.73	\$	0.99	1.38%
20 Ccf	\$	150.20	\$	137.53	\$	(12.67)	-8.44%

# Customer Impacts: Alternative 1



## Rate Structure Alternative 2

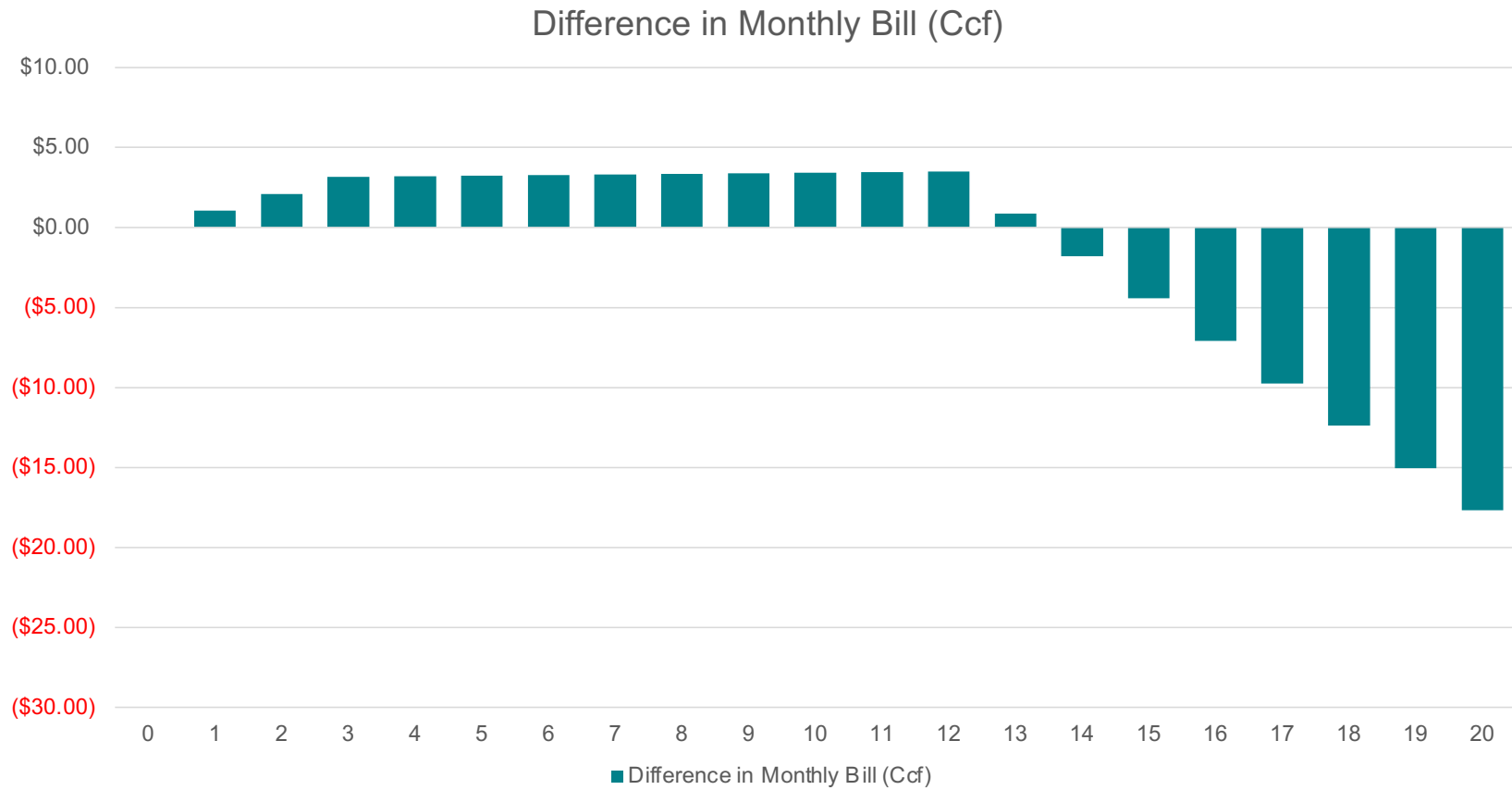
	<u>2026</u>			
	<u>Current Rates</u>		<u>Alternative Rates</u>	
Base Charge	\$	28.49	\$	28.49
T1 - 0-3 Ccf	\$	2.96	\$	4.01
T2 - 3-12 Ccf	\$	4.91	\$	4.95
T3 - >12 Ccf	\$	8.58	\$	5.93

	<u>2026 Budget</u>				
	<u>Current Revenues</u>		<u>Alternative Revenues</u>		<u>Difference</u>
Base Charge	\$	65,994,763	\$	65,994,763	\$ -
T1 - 0-3 Ccf	\$	15,984,000		21,654,000	5,670,000
T2 - 3-12 Ccf	\$	26,268,500		26,482,500	214,000
T3 - >12 Ccf	\$	18,876,000		13,046,000	(5,830,000)
Total Residential Revenues	\$	127,123,263	\$	127,177,263	\$ 54,000
Typical Customer Bill (6 Ccf)	\$	52.10	\$	55.37	\$ 3.27

## Customer Impacts: Alternative 2

<u>Usage</u>			<u>2026</u>		<u>Difference</u>	<u>% Change</u>	
	<u>Current Rates</u>		<u>Alternative Rates</u>				
0 Ccf	\$	28.49	\$	28.49	\$	-	0.00%
2 Ccf	\$	34.41	\$	36.51	\$	2.10	6.10%
5 Ccf	\$	47.19	\$	50.42	\$	3.23	6.84%
10 Ccf	\$	71.74	\$	75.17	\$	3.43	4.78%
20 Ccf	\$	150.20	\$	132.51	\$	(17.69)	-11.78%

# Customer Impacts: Alternative 2



## Rate Structure Alternative: Uniform Rate

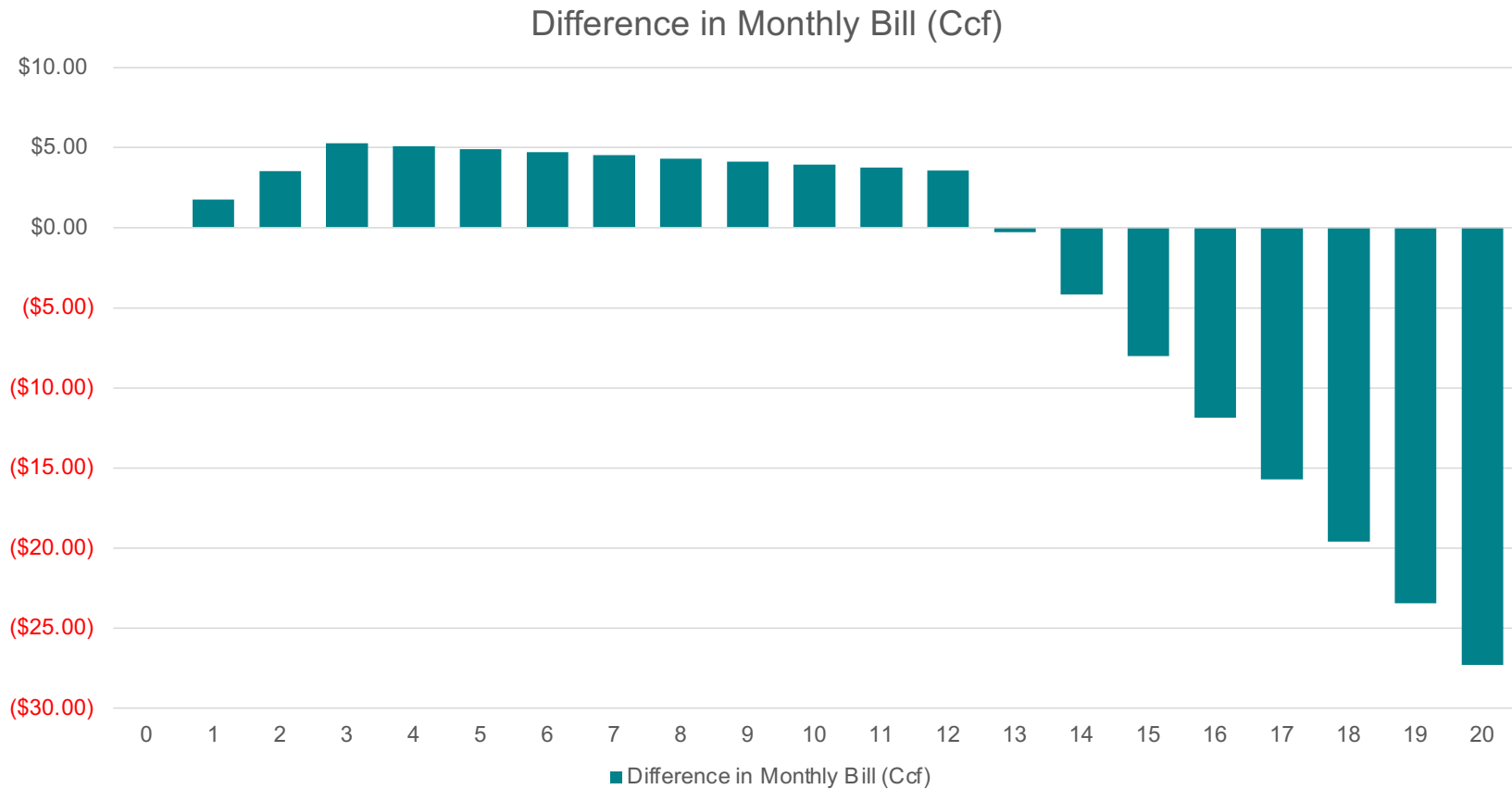
	<u>2026</u>	
	<u>Current Rates</u>	<u>Alternative Rates</u>
Base Charge	\$ 28.49	\$ 28.49
T1 - 0-3 Ccf	\$ 2.96	
T2 - 3-12 Ccf	\$ 4.91	
T3 - >12 Ccf	\$ 8.58	
Uniform Rate		\$ 4.72

	<u>2026 Budget</u>		
	<u>Current Revenues</u>	<u>Alternative Revenues</u>	<u>Difference</u>
Base Charge	\$ 65,994,763	\$ 65,994,763	\$ -
T1 - 0-3 Ccf	15,984,000		
T2 - 3-12 Ccf	26,268,500		
T3 - >12 Ccf	18,876,000		
Total Volumetric Revenues	61,128,500	61,124,000	\$ (4,500)
Total Residential Revenues	\$ 127,123,263	\$ 127,118,763	\$ (4,500)
Typical Customer Bill (6 Ccf)	\$ 52.10	\$ 56.81	\$ 4.71

## Customer Impacts: Uniform Rate

<u>Usage</u>			<u>2026</u>		<u>Difference</u>	<u>% Change</u>	
	<u>Current Rates</u>		<u>Alternative Rates</u>				
0 Ccf	\$	28.49	\$	28.49	\$	-	0.00%
2 Ccf	\$	34.41	\$	37.93	\$	3.52	10.23%
5 Ccf	\$	47.19	\$	52.09	\$	4.90	10.38%
10 Ccf	\$	71.74	\$	75.69	\$	3.95	5.51%
20 Ccf	\$	150.20	\$	122.89	\$	(27.31)	-18.18%

# Customer Impacts: Uniform Rate



## Pros & Cons to Uniform Volumetric Rate

- + Provides greater revenue stability
- + Eliminates billing cycle issues
- + Reduces incentive to limit usage in system with no capacity constraints
- + Easier to understand
- Over 80% of residential customers will have a bill up to five dollars higher
- Doesn't strongly promote conservation/ efficient water use

# Wrap Up



## Next Steps

- Request additional data, as necessary
- Provide feedback on options
- Approve rate structure



# Thank you!

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