

RATE STUDY PROCESS

CITY OF GLENDALE WATER & SEWER SERVICES



GLENDALE UTILITIES
QUALITY • RELIABILITY • VALUE

Rate Study is a 3-Step Process



How much is needed?

1. Financial Plan



Is each customer class paying their share?

2. Cost of Service Analysis



How should customers pay?

3. Review Rate Design

1. The Financial Plan



What is a Financial Plan

- A long-term forecast of cash inflows (Revenues) and outflows (Expenditures) to provide water and sewer services
 - Expenditures are grouped into Operating and Maintenance expenses, Debt Service payment, and Capital Outlay
- A tool to track financial measurements to insure the system meets legal requirements

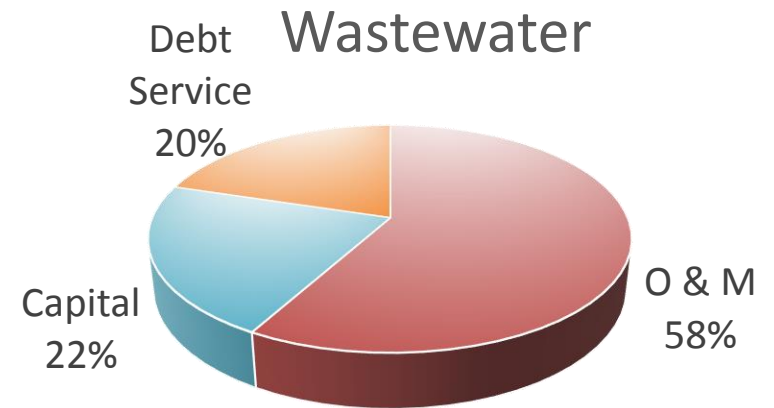
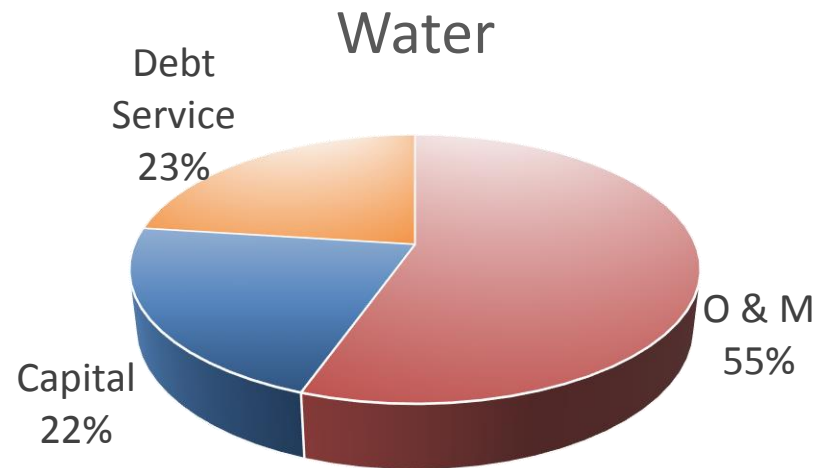
Benefits of a Financial Plan

- **Comprehensive:** Contains a forecast of all potential revenues and expenses over an appropriate time horizon
- **Transparency:** Provides valuable financial information to internal and external stakeholders
- **Easy to Use and Update:** Can be updated annually to address changes in various trends and plans
- **Scenario Planning Capability:** Ability to project financial results for a variety of scenarios and cost variables

Components of a Financial Plan

As an enterprise funded operation, the financial plan must ensure financial viability to provide revenue for:

- ✓ Operating and Maintenance Expenses
- ✓ Capital Outlay
- ✓ Debt Service
- ✓ Fund Balance



FY2016-17 Budget

Operating & Maintenance Expense

- Operating & Maintenance Expense is categorized into three groups
 - Salaries and benefit costs
 - O&M: Chemicals, electricity, raw water, supplies, maintenance
 - Internal charges: Insurance, city administration, technology, fleet maintenance.
- For the purpose of determining cost of service
 - O&M Expenses are grouped into divisions.
 - Based on the division's function, expenses are allocated to either the water or wastewater or both systems.

CIP Financing Strategy

- The financial plan determines the optimal mix of CIP funding:
 - Cash from water user charges (“Pay-Go” financing)
 - External debt financing (revenue bonds)
 - Development Impact Fees (customer account growth)
- The financing strategy selected to pay for CIP expenditures is a key driver of water utility revenue increases

Debt Service Payment

- Debt Service is the payment for principal and interest on bonds sold to finance capital improvements.
- Currently, five bond issues with an aggregate outstanding balance of \$212,500,000
- Refinanced \$121,245,000 in January 2015 for an interest saving of \$6,600,000
- Debt Service for future bonds are programmed as needed

Results of the Financial Plan

- Forecast water/sewer revenue requirements
- Optimize capital outlay financing
- Provide for cash reserves / fund balance
- Provide for legal debt service coverage

Financial Targets for Financial Plan

- Maintain a working capital at or greater than 50% of O&M expense to provide operational stability
- Maintain 250 days of cash on-hand
- Maintain a Debt Service Coverage (DSC) ratio greater than 1.85 on senior debt to achieve a high credit rating to minimize financing
- Maintain a Debt Service Coverage (DSC) ratio greater than 1.50 on all-debt to achieve a high credit rating to minimize financing

2. The Cost of Service Study

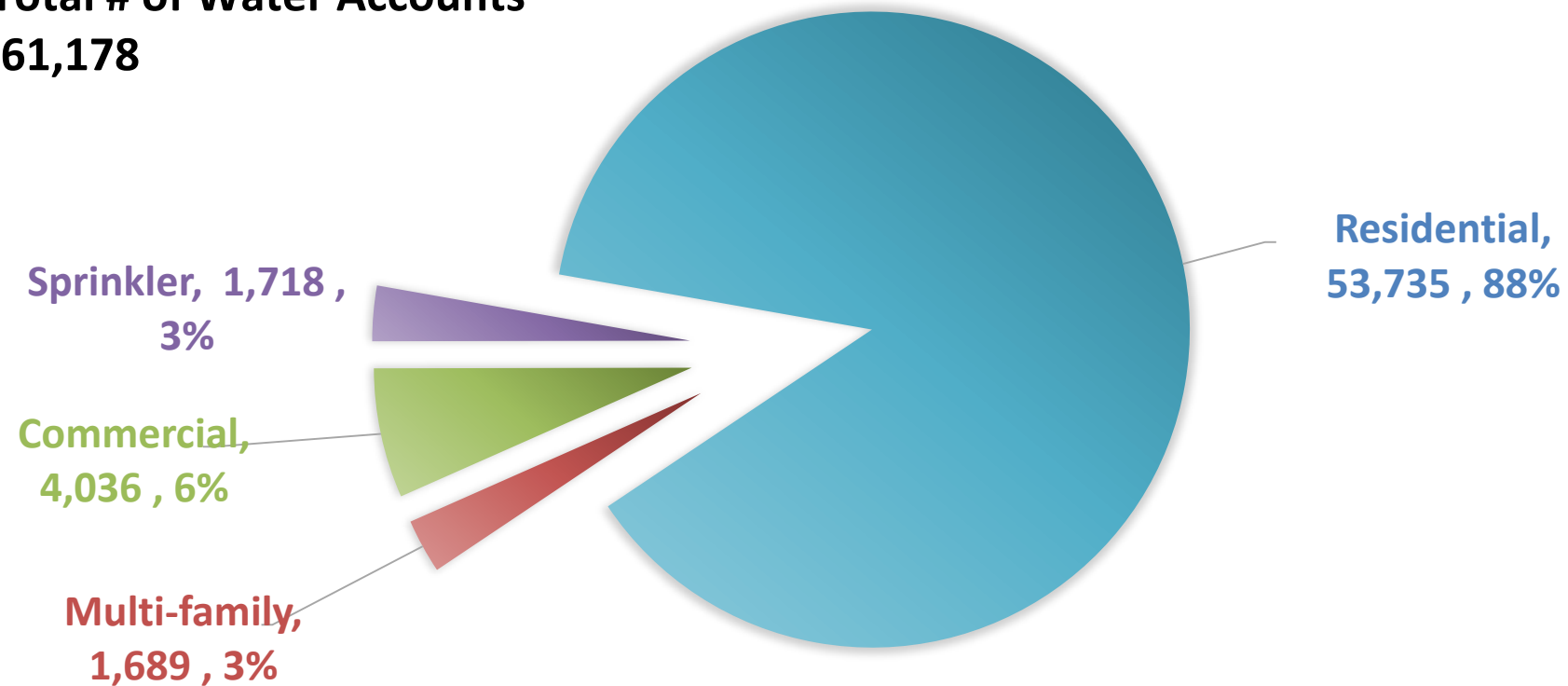


Purpose of Cost Allocation Process

- Determine the amount of revenue that must be recovered from each customer class based on the costs to provide that service
 - Group customer by like characteristics
 - » Total annual usage
 - » Peak demands
 - » Number and size of meters
- Glendale has four customer classes
 - Single Family
 - Multi-family
 - Commercial
 - Sprinkler

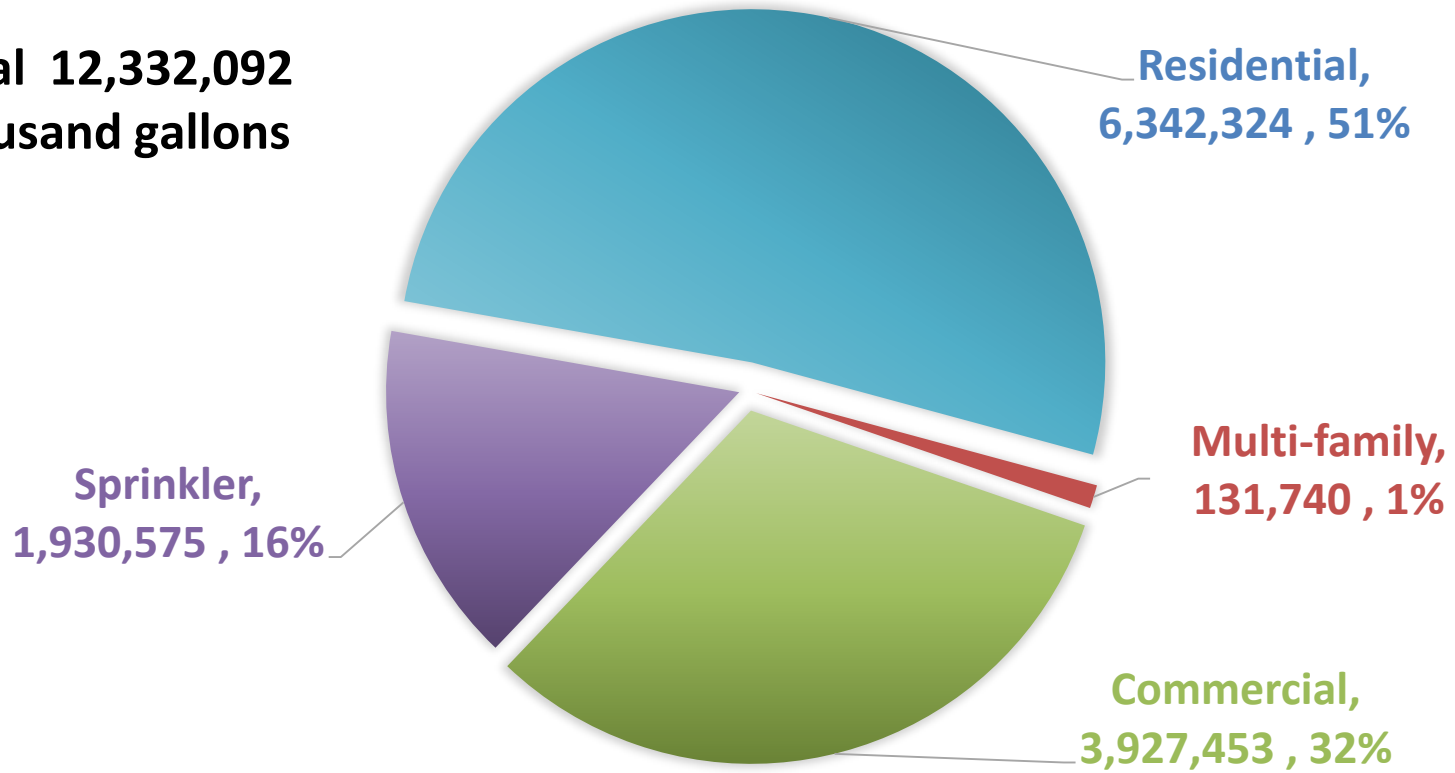
of Accounts by Customer Class

**Total # of Water Accounts
61,178**

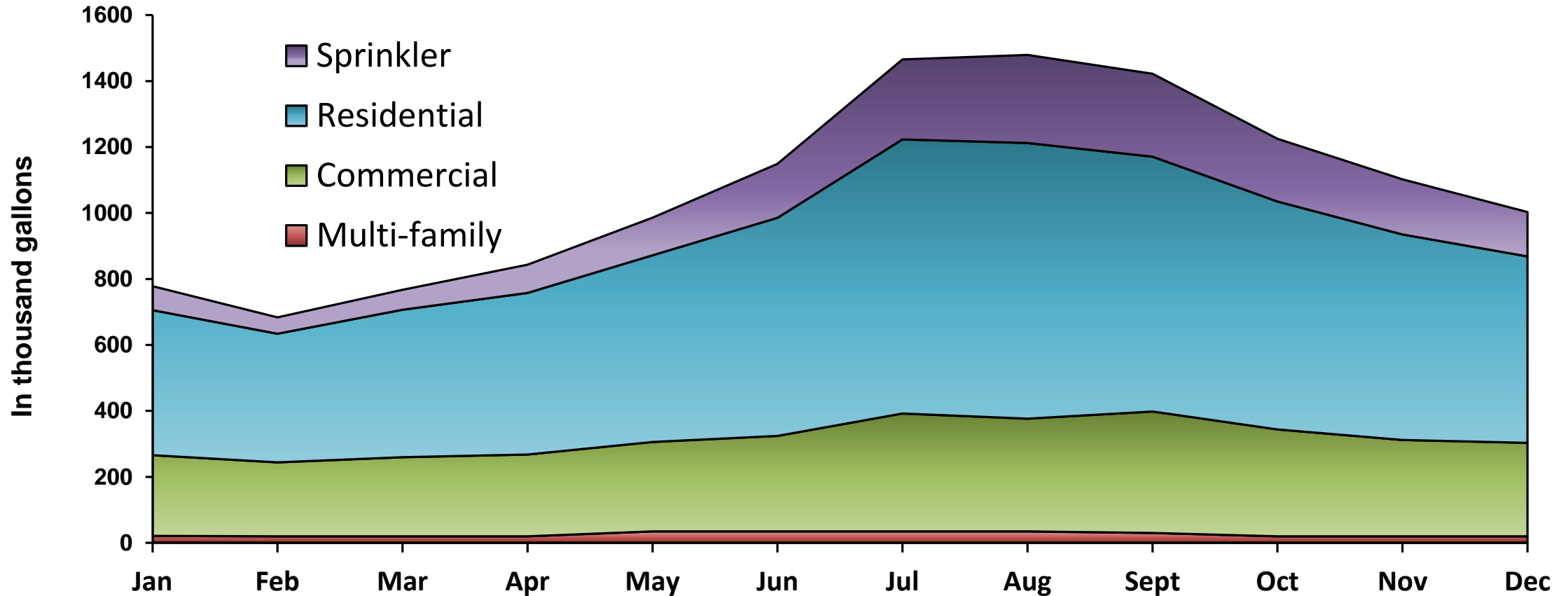


Water Usage by Customer Class

**Total 12,332,092
thousand gallons**



Usage by Customer Class by Month



Glendale customer usage for the period of calendar year 2016

Allocate cost by function

- Water services costs are allocated based on the principles published by the American Water Works Association (AWWA)
- Sewer services costs are allocated based on the principles published by the Water Environment Federation (WEF)

Water Revenue & Cost of Service

Customer Class	Revenue Under Current Rates	Indicated COS	(Over) Under Recover
Single Family	\$24,984,000	\$23,825,000	\$(1,159,000)
Multi-family	546,000	506,000	(40,000)
Commercial	12,714,000	12,575,000	(139,000)
Sprinkler	<u>6,726,000</u>	<u>8,064,000</u>	<u>1,338,000</u>
Total	\$44,970,000	\$44,970,000	\$0

Based on FY2016-17 cost of service analysis

Wastewater Cost of Service

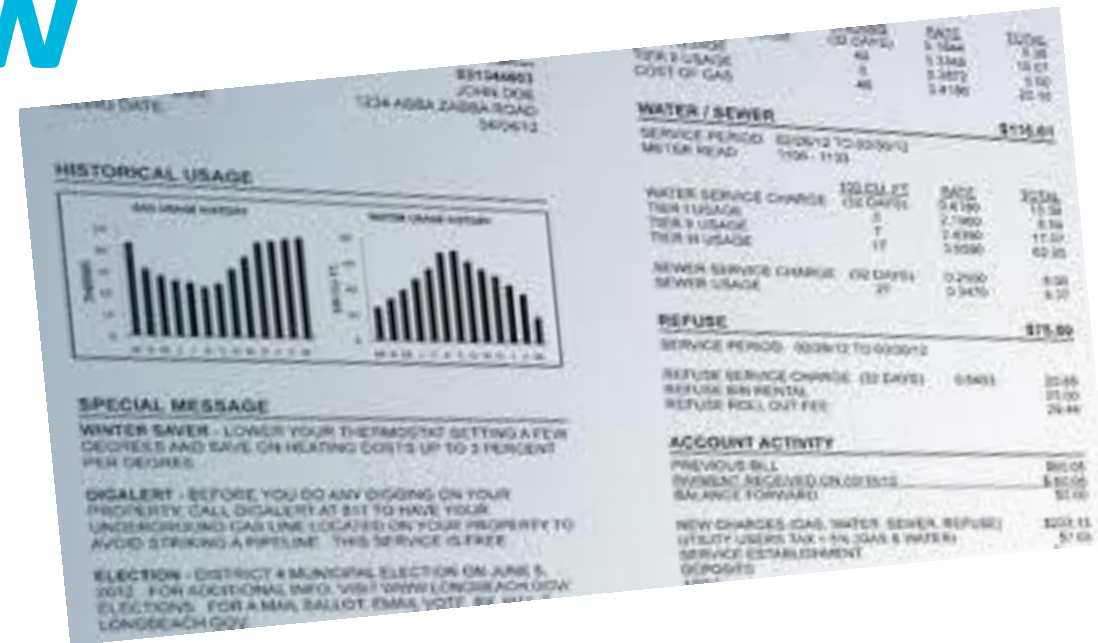
- Group customers by like characteristics
 - Contributed Volume
 - Treatment required
 - » Biochemical Oxygen Demand (BOD)
 - » Suspended Solids (TSS)
- Glendale has two customer classes
 - Residential
 - Commercial (class has ten sub groups)

Sewer Revenue & Cost of Service

Customer Class	Revenue Under Current Rates	Indicated COS	(Over) Under Recover
Residential	\$26,530,000	\$26,251,000	\$(279,000)
Commercial	<u>5,222,000</u>	<u>5,501,000</u>	<u>279,000</u>
Total	\$31,752,000	\$31,752,000	\$0

Based on FY2016-17 cost of service analysis

3. Review Rate Design



Water Services Rate Components

- User Charges:
 - Monthly rates and charges based on meter/service line size and amount of water consumption
 - Recover operational costs such as salaries, benefits, chemicals, electricity, debt service, and cash-funded capital outlay

Water Rate Structure

- Rate Schedule for each customer class based on usage characteristics
 - Residential
 - Multi-family
 - Commercial
 - Sprinkler

Water Rate Structure

- Monthly Base Charge
 - Rate to recover cost for monthly billing & collections and meter maintenance
 - Charge varies by meter size
 - 5/8" = \$9.70, 3/4" = \$12.30, 1" = \$17.40
 - 1-1/2" = \$35.30, 2" = \$62.90
 - all the way up to 12" = \$1,326.00

Rates effective July 1, 2010

Water Rate Structure

- Volume Rate - \$ per 1,000 gallons

Residential / Multi Family

Tier	Rate	Usage
1	\$2.14	0-6
2	\$2.68	7-15
3	\$3.76	16-30
4	\$5.27	> 30

Commercial (Seasonal Rates)

Season	Rate
Winter	\$2.28
Summer	\$2.85

Sprinkler

Season	Rate
Winter	\$2.58
Summer	\$3.23

Rates effective July 1, 2010

Sewer Rate Structure

Customer Classes

- 12 different Inside City Customer Classes
- 2 different Outside City Customer Classes
- Inside vs. Outside
 - Outside rates 1.3x Inside Rates

* Average Winter Consumption (AWC) = average winter water usage during the months of January, February and March

Charges-Usage

Monthly Base Charge

- \$9.20 charge same for all meter sizes

Volume Rates

- Uniform rate per 1,000 gallons based on:
 - 90% AWC* for Residential
 - 95% AWC* for Commercial
- Rates differ by customer class & loading strengths
 - Single Family = \$3.56 per 1,000 gallons

This concludes the presentation.