RIO ALTO WATER DISTRICT

WATER AND WASTEWATER RATE STUDY FINAL REPORT

November 21, 2023

BARTLE WELLS ASSOCIATES
INDEPENDENT PUBLIC FINANCE ADVISORS

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November 22, 2023

Martha Slack, General Manager
Rio Alto Water District
22099 River View Drive
Cottonwood, CA 96022

Re: Water and Wastewater Rate Study

Bartle Wells Associates is pleased to submit to the Rio Alto Water District (District) the attached Final Water and Wastewater Rate Study. The study presents BWA's analysis of the operating and non-operating expenses of the District's water and wastewater funds and provides five-year cash flow projections and rates. The primary purpose of this study was to analyze the District's water & wastewater enterprise funds and make recommendations that would achieve their financial sustainability.

BWA finds that the rates and charges proposed in our report reflect the cost-of-service for each customer, follow generally accepted rate design criteria, and adhere to the substantive requirements of Proposition 218. BWA believes the proposed rates are fair and reasonable to the District's customers.

We have enjoyed working with the District on this rate study and appreciate the assistance of District staff members throughout the project. Please contact us with any future questions about this study and the rate recommendations.

Sincerely,

Douglas Dove, PE, CIPMA
Principal/ President

Erik Helgeson, MBA
Vice President

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1 EXECUTIVE SUMMARY

1.1 Introduction

The District retained Bartle Wells Associates to develop a long-term financial plan and 5-year rate recommendations for the water and wastewater enterprises.

The revenues from the District's water and wastewater enterprises are primarily derived from charges for services. The District must establish rates and charges adequate to fund the cost of providing services, which includes costs for operations and maintenance, as well as capital improvements needed to keep the District's utility infrastructure in a safe and reliable operating condition.

The District has provided proactive financial stewardship by raising rates to keep revenues in line with the costs of providing water service. Those rate increases have enabled the District to maintain its financial health. The prior water rate increases strengthened the financial condition of the water enterprise. However, current rates are not adequate to fund the needed improvements and meet regulatory water quality and supply requirements.

1.2 Rate Study Objectives

Key goals and objectives of this study include developing rates that:

- Recover the costs of providing service, including operating, capital, and debt funding needs;
- Are proportionate, fair, and equitable to all customers;
- Are easy to understand and implement;
- Comply with the substantive requirements of the California Constitution, Article 13D, Section 6 (which was adopted by the voters as Proposition 218 in 1996) and the general mandate of Article 10, Section 2 that prohibits the wasteful use of water;
- Support the long-term operational and financial stability of the District.

BWA worked closely with District staff to incorporate information and input, evaluate alternatives, and develop recommendations. This report summarizes key findings and recommendations for water and wastewater rates over the next five years.

1.3 Current and Proposed Water Rates

BWA recommends the District consider transitioning to a uniform water rate structure. The following table shows the current and proposed water rates.

Table 1 – Current and Proposed Water Rates

Current and Proposed Water Rates	Existing FY 22-23	Proposed Jan 1, 2024	Proposed Jul 1, 2024	Proposed Jul 1, 2025	Proposed Jul 1, 2026	Proposed Jul 1, 2027
Volumetric Rates ($/CCF)						
Base Use (0-15 CCF)	$0.00					
Volumetric (>15 CCF)	$1.30					
Uniform Rate (All CCF)		$1.21	$1.35	$1.50	$1.65	$1.82
Bi-Monthly Fixed Charge						
Meter Size						
3/4"	$42.87	$37.03	$41.10	$45.62	$50.18	$55.20
1"	$58.45	$50.46	$56.01	$62.17	$68.39	$75.23
2"	$144.15	$123.81	$137.43	$152.55	$167.81	$184.59

1.4 Current and Proposed Wastewater Rates

The following table shows the current and proposed wastewater rates.

Table 2 – Current and Proposed Wastewater Rates

Existing and Proposed Sewer Rates	Existing FY 22-23	Proposed Jan 1, 2024	Proposed Jul 1, 2024	Proposed Jul 1, 2025	Proposed Jul 1, 2026	Proposed Jul 1, 2027
Bi-Monthly Fixed Charges						
Single Family Resid.	$89.18	$102.68	$115.52	$127.07	$139.78	$153.76
1/2 single Fam Resid.	$44.59	$51.34	$57.76	$63.54	$69.89	$76.88
TriPlex sewer	$267.56	$308.08	$346.59	$381.25	$419.38	$461.32
Duplex Sewer	$178.37	$205.38	$231.05	$254.16	$279.58	$307.54
Sewer Extention	$105.26	$102.68	$115.52	$127.07	$139.78	$153.76
Low Pressure	$105.26	$130.14	$146.41	$161.05	$177.16	$194.88
Low Pressure Duplex	$210.52	$260.28	$292.82	$322.10	$354.31	$389.74
Commercial	$202.46	$233.06	$262.19	$288.41	$317.25	$348.98
Volumetric Charges						
Commercial	$0.55	$0.65	$0.73	$0.80	$0.88	$0.97

2 BACKGROUND, OBJECTIVES, AND LEGAL REQUIREMENTS

The Rio Alto Water District (District) is located east of I-5 about 20 miles south of the City of Redding in a community known as Lake California. The District provides water and wastewater services to over 1,400 customers in an area that encompasses more than 9 square miles.

The revenues from the District's water and wastewater utilities are primarily derived from charges for services. The District must establish rates and charges adequate to fund the cost of providing water and wastewater services, including costs for operations and capital improvements needed to keep District's utility infrastructure in safe and reliable operating condition.

The previous sewer rate study was performed in 2011 and the previous water rate study was last performed in 2016. Based on a survey of regional water and wastewater agencies, the District's rates are close to the regional average.

The District's water and wastewater utilities are financially self-supporting enterprises. Revenues are derived primarily from rates. As such, the District's water and wastewater rates must be set at adequate levels to fund the costs of providing service and:

- Fund ongoing operating and maintenance expenses
- Address regulatory requirements
- Fund the capital improvement projects, related debt service and associated increased operating costs
- Provide funding for system maintenance and upgrades

The prior water and wastewater rate increases strengthened the financial condition of the enterprises. However, current rates are not adequate to fund the needed improvements and operating costs and meet debt coverage requirements.

2.1 Rate Study Objectives

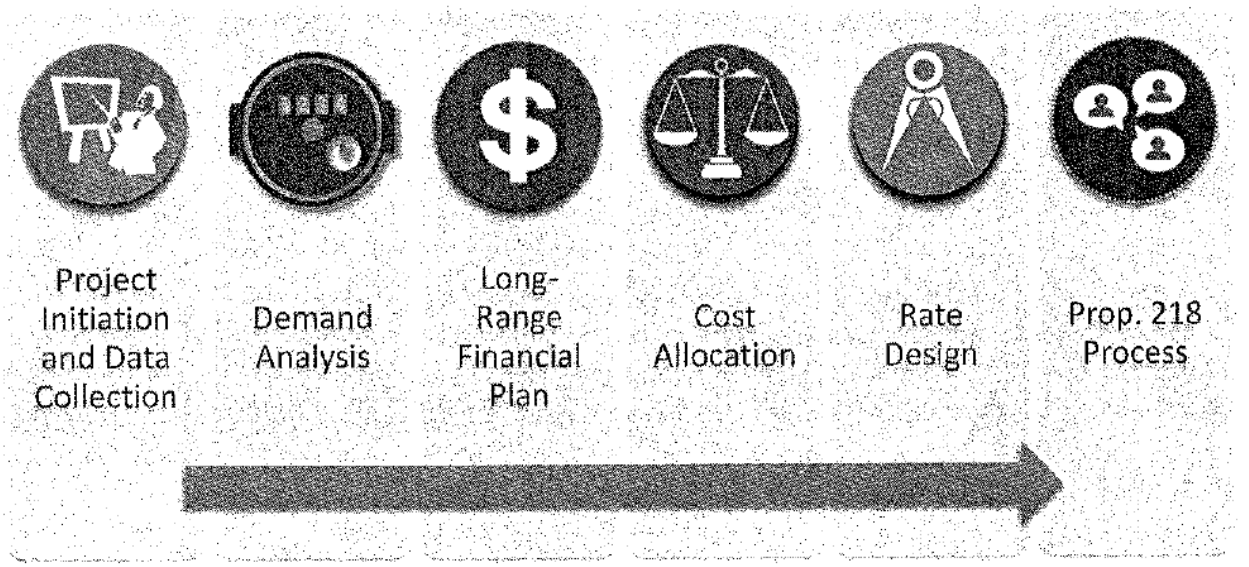
In 2023, the District retained BWA to develop a cost-of-service based rate study. The District has historically adopted rate increases in order to keep revenues in line with the escalating costs of providing service. Key goals and objectives of this study include developing rates that:

- Recover the costs of providing service, including operating, capital, and debt funding needs;
- Are proportionate, fair and equitable to all customers;
- Are easy to understand and implement;
- Comply with the substantive requirements of the California Constitution, Article 13D, Section 6 (which was adopted by the voters as Proposition 218 in 1996) and the general mandate of Article 10, Section 2 that prohibits the wasteful use of water;
- Support the long-term operational and financial stability of the District.

2.2 Rate Study Process

The general process used for this cost-of-service rate study is summarized in the following diagram.

Figure 1 – Cost-of-Service Rate Study Process



Key elements of the study include:

1) **Project Initiation and Data Collection** – Review financial policies; collect financial and other relevant data; and review rate structures;
2) **Demand Analysis** – Analyze past customer demands and customer characteristics to forecast future demands;
3) **Long Range Financial Plans** – Develop financial projections to evaluate annual revenue requirements from rates and the overall level of rate increases needed to fund the costs of providing service and support long-term financial stability;
4) **Cost Allocation** – Group the District's costs in terms of the function they serve as a basis to proportionally allocate the revenue requirement from rates;
5) **Cost-of-Service Rate Design** – Develop rates that proportionately recover costs; and
6) **Prop 218 Process** – Ensure compliance with the substantive and procedural requirements of Proposition 218.

2.3 Constitutional Requirements for Rates

The water rates proposed in this report are designed to comply with two key articles of the California Constitution: Article 13D and Article 10, as explained below.

2.3.1 Article 13D, Section 6

Proposition 218 was adopted by California voters in 1996 and added Articles 13C and 13D to the California Constitution. Article 13D, Section 6 governs property-related charges, which the California Supreme Court has ruled, includes rates imposed for water delivered through pipes connected to property. Article 13D, Section 6 establishes both a) procedural requirements for imposing or increasing property-related charges, and b)

substantive requirements for those charges. Article 13D requires voter approval for new or increased property-related charges but exempts rates for water, wastewater, and garbage service from this voting requirement if rates are adopted by the appropriate procedure and meet the substantive requirements. This report recommends water rates designed to comply with the substantive requirements of Proposition 218.

The substantive requirements of Article 13D, section 6 requires property-related charges, such as the District's water and wastewater rates, to meet the following conditions:

1) Revenues derived from the fee or charge shall not exceed the costs required to provide the property-related service.
2) Revenues derived from the fee or charge shall not be used for any purpose other than that for which the fee or charge was imposed.
3) The amount of a fee or charge imposed upon any parcel or person as an incident of property ownership shall not exceed the proportional cost of the service attributable to the parcel.
4) No fee or charge may be imposed for a service unless that service is used by, or immediately available to the property in question.
5) No fee or charge may be imposed for general governmental services, such as police or fire services, where the service is available to the public at large in substantially the same manner as it is to property owners.

2.3.2 Article 10, Section 2

Article 10, Section 2 of the California Constitution states that:
It is hereby declared that because of the conditions prevailing in this State the general welfare requires that the water resources of the State be put to beneficial use to the fullest extent of which they are capable, and that the waste or unreasonable use or unreasonable method of use of water be prevented, and that the conservation of such waters is to be exercised with a view to the reasonable and beneficial use thereof in the interest of the people and for the public welfare.

2.4 Statute of Limitations

Pursuant to California Government Code 53759, there is a 120-day statute of limitations for challenging any new, increased, or extended fees. This statute of limitations applies to the water rates proposed in this rate study and is included in the Proposition 218 Notice.

3 PROJECTED WATER DEMAND AND CUSTOMER CHARACTERISTICS

3.1 Projected Water Demand

BWA uses a conservative approach when forecasting water use and growth projections in order to ensure the District is not dependent on population growth and water demand recovering from the recent drought. Projected FY 23/24 water demand is conservatively based on the lowest actual metered demand for the last five fully recorded years.

Table 3 – Historic and Projected Metered Demand

Customer Data	FY 17-18	FY 18-19	FY 19-20	FY 20-21	FY 21-22	FY 22-23	FY 23-24
	Actual	*Actual*	*Actual*	*Actual*	*Actual*	*Projected*	*Projected*
Total Water Production (CCF)	254,283	248,214	268,254	271,507	246,452	227,070	226,614
Billed, Metered Consumption (CCF)	231,695	225,599	250,999	247,510	232,326	210,642	210,642
Water Loss (%)	8.9%	9.1%	6.4%	8.8%	5.7%	8%	8%
Total Accounts (#)	1,322	1,340	1,365	1,389	1,412	1,412	1,412
Growth (%)		1.36%	1.87%	1.76%	1.66%	0.00%	0.00%
Annual Metered Use (CCF) per Accoun	175	168	184	178	165	165	165

3.2 Water Services and Equivalent Capacity

The size of a customer's meter reflects the demand they require of the water system's capacity. A significant percentage of the costs of any water system is related to its requirement to deliver water to any customer instantaneously at any time, up to the maximum safe flow capacity of a customer's meter. Simply put, as the size of a customer's water meter increases, the instantaneous demand it can place on the District's water system increases. A meter equivalent unit (MEU) is the ratio of any meter's safe maximum flow to that of a 3/4" meter's. The safe maximum flow is based on the American Water Works Association's meter service equivalent standards. The proposed fixed rates by meter size are determined based on the number of MEU's. The following Table shows the current number of water accounts by meter size and the corresponding meter equivalent units.

Table 4 – Water Customers and Equivalent Demand Units

Meter Size	Services	Meter Equivalent Ratio**	Meter Equivalent Units (MEUs)
3/4"	1,226	1.0	1,226.0
1"	180	1.7	300.6
2"	6	5.3	32.0
Total	**1,412.0**		**1,558.6**

* Customer data as of June 2023 provided by staff

** Capacity factors based on AWWA operating capacity standards by meter size

4 WATER FINANCIAL PLAN

4.1 Water Financial Overview

BWA conducted an independent evaluation of water enterprise finances and concluded the previous rate increases have put the water enterprise in a sound financial position. Continual, gradual increases are projected to maintain its strong financial position.

The District relies almost solely on revenues from water rates to fund the costs of providing service. As such, water rates must be set at levels adequate to fund the costs of operating and maintaining the water system, and fund necessary capital improvements to keep the water system in good operating condition.

4.2 Key Drivers of Rate Increases

The District is facing several manageable financial challenges that will drive the need for rate increases in upcoming years. Key drivers of future rate increases are summarized below.

Capital Improvement Funding Needs

The District's water system requires a steady stream of repair and improvement projects. Accounting for construction cost inflation, the District anticipates funding approximately $1.7 million of capital improvement projects over the next 5 years.

Ongoing Operating Cost Inflation

The District faces annual cost inflation due to annual increases in a range of expenses including staffing, utilities, insurance, supplies, etc. On top of rate increases needed for capital improvements, annual rate increases are needed to keep revenues aligned with cost inflation and prevent rates from falling behind the cost of providing service. Water cost inflation has historically been higher than the Consumer Price Index (CPI) for consumer goods and services. Historically inflation has typically remained consistently around 3%, but recently inflation has reached forty-year highs with the CPI and ENR CCI exceeding 7% in 2022. It is not expected that inflation will remain at such high levels in the future, so for the purposes of this rate study, average annual inflation is projected to be 4.5%.

Water Reserve Funds

Maintaining a prudent minimal level of fund reserves provides a financial cushion for dealing with unanticipated expenses, revenue shortfalls, and emergency capital repairs. BWA developed a financial plan designed to maintain prudent reserve levels that are in-line with water utility industry standards.

Debt Service Coverage

Most municipal debt requires that the issuer generate net operating revenues of 1.25 times the total annual debt service payment or greater. This is referred to as "debt service coverage". To support a strong credit rating and good financial health, the current BWA recommends the District maintain a minimum debt coverage ratio of 1.3 times the annual payment or greater.

4.3 Financial Plan Assumptions

The financial projections incorporate the latest information available and a number of reasonable and slightly conservative assumptions for planning purposes. Key assumptions include:

Revenue Assumptions

- Water rate revenues are based on estimated revenues for the current fiscal year.
- Rates proposed to be adopted in December 2023 will be effective on January 1, 2024, with rate adjustments planned to become effective on July 1 of each of the subsequent four fiscal years beginning July 1, 2024.
- To be conservative and ensure revenues will be sufficient, BWA assumed growth to be two new single family connections added per year.
- Interest earnings are projected based on the annual beginning fund balance multiplied by the projected interest rate. The interest rate projections are conservatively based on recent and anticipated interest rates.

Expense Assumptions

- Operating and maintenance costs are primarily based on the 2023/24 budget.
- Operating costs are projected to escalate at 4.5% per year to account for cost inflation.
- Debt service projections are based on outstanding debt schedules and projected issuances of new debt.
- Capital improvement costs are based on the most recent engineering cost estimates. Capital costs include a 4.5% annual construction cost inflation factor for the next five years.

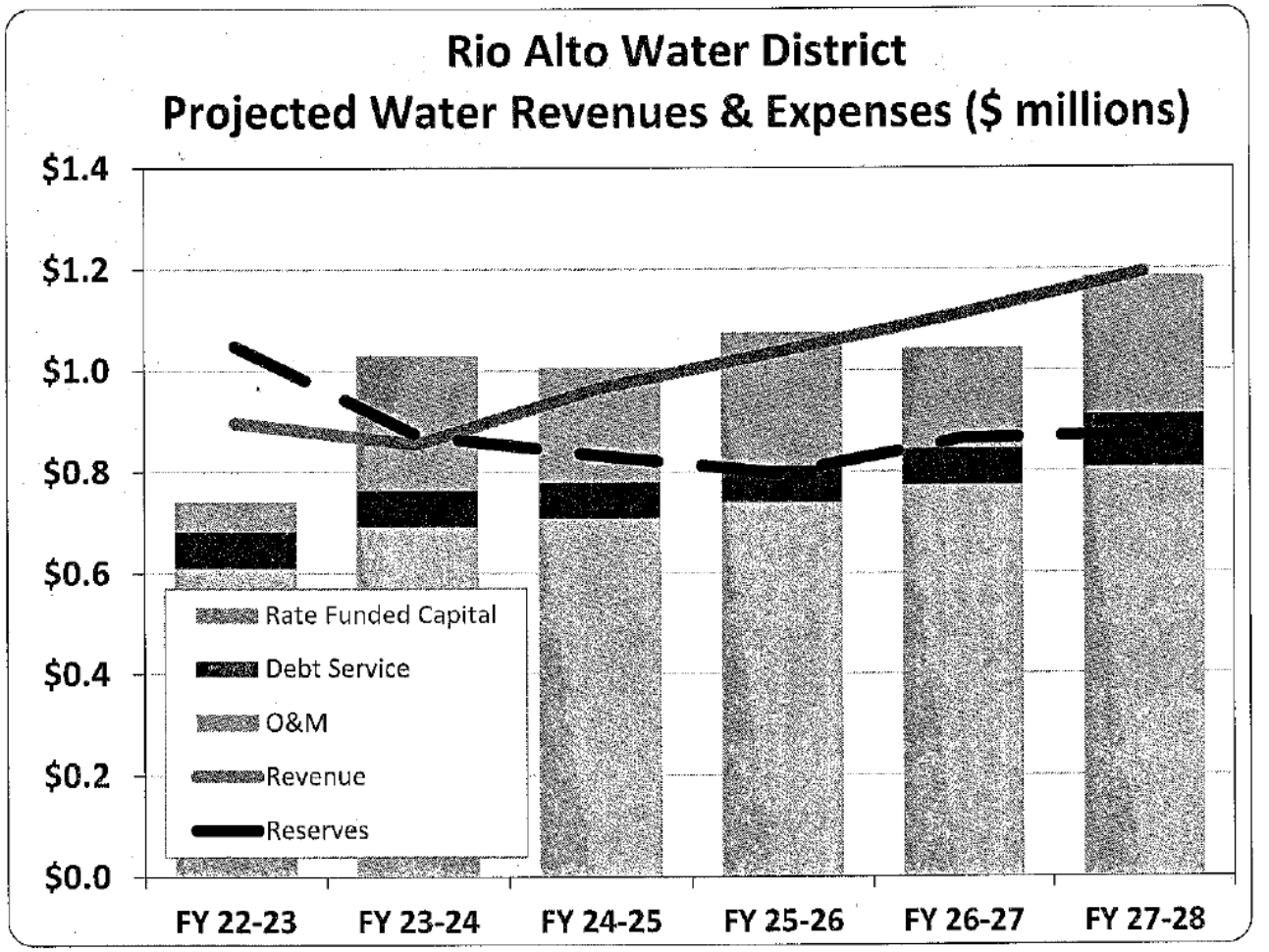
4.4 Cash Flow Projections

Long-term cash-flow projections were developed based on assumptions and key drivers of future rate increases described above. The projections were used to determine the water utility's annual revenue requirements and project required water rate revenue increases. The long-term cash-flow projections incorporate the latest information available from the District's budget, annual reports, capital spending projections, and metered water demand data, as well as a number of reasonable assumptions developed with input from the District. The overall rate revenue increases shown for each of the following scenarios are designed to fund the District's cost of providing service and maintain roughly balanced budgets, healthy debt service coverage, and prudent reserves. The projections indicate the need for increases for water rate revenues for each of the next five fiscal years. Actual impacts to customers' water bills will vary based on meter size and water use, due to the outcome of the updated cost-of-service analysis.

In future years, the District can re-evaluate its finances and revenue requirements and adjust rates as needed based on updated projections. However, while the District always has the flexibility to implement rate adjustments that are lower than adopted pursuant to Proposition 218, future rates cannot exceed adopted increases without going through the Proposition 218 process again. Rates adopted pursuant to Proposition 218 are essentially future rate caps.

The following figure visually depicts the cash-flow projections with the proposed rate increases for the next five years. Projected expenses are summarized into key categories. The figure also shows the projected fund reserves at the end of each fiscal year.

Figure 2 – Projected Cashflow Graph



Detailed, long-term, cash-flow projections for this scenario are shown in the following table.

Table 5 – Detailed Cash Flow Projections

Water Fund	FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28
Rate Revenue Increase		**11.0%**	**11.0%**	**11.0%**	**10.0%**	**10.0%**
Beginning Reserves	**$891,721**	**$1,048,042**	**$872,974**	**$832,601**	**$796,570**	**$865,417**
Revenues						
Rate Revenue	$528,471	$528,487	$587,442	$652,973	$725,815	$799,515
Rate Increase Revenue	0	58,134	64,619	71,827	72,582	79,951
Timing Adjustment*		-29,067				
Other Revenue	368,441	297,463	313,101	313,251	313,460	314,736
Total Revenue	**$896,912**	**$855,017**	**$965,161**	**$1,038,051**	**$1,111,857**	**$1,194,202**
Expenses						
Operating Expenses	$609,837	$692,408	$708,151	$739,254	$773,319	$807,283
Existing Debt Service	71,954	71,954	71,954	71,954	71,954	71,954
New Debt Service	0	0	0	0	0	34,000
Rate Funded Capital	$58,800	$265,722	$225,429	$262,874	$197,737	$272,295
Total Expenses	**$740,591**	**$1,030,084**	**$1,005,534**	**$1,074,082**	**$1,043,010**	**$1,185,532**
Net Revenues	**$156,321**	**-$175,067**	**-$40,373**	**-$36,031**	**$68,847**	**$8,670**
Ending Reserves	**$1,048,042**	**$872,974**	**$832,601**	**$796,570**	**$865,417**	**$874,087**
Debt Coverage	3.99	2.26	3.57	4.15	4.70	3.65

*Reflects January rate implementation

5 COST-OF-SERVICE RATE DERIVATION

Article XIII D, Section 6 of the California Constitution (which was adopted by the voters in 1996 as a part of Proposition 218) requires that the District adopt only rates that meet a number of substantive requirements.

Specifically:

(1) Revenues derived from the water rates cannot exceed the funds required to provide water service.
(2) Revenues derived from the water rates cannot be used for any purpose other than providing water service.
(3) The amount of the water rates imposed upon any parcel or person as an incident of property ownership cannot exceed the proportional cost of the service attributable to the parcel.
(4) Water rates may not be imposed unless the water service is used by, or immediately available to, the owner of the property in question.

Each water customer in the District is charged both a bi-monthly fixed rate and a volumetric rate based on the quantity of water delivered by the District to the customer. This reflects that (i) some system costs are based entirely on the actual quantity of water consumed, (ii) other system costs are fixed from the point of view of the District, but are a result of design decisions that were made to accommodate all users, including high-demand users, and (iii) some costs, particularly the cost of administering the water system, would be largely the same regardless of the volume of water consumed.

Water utilities have employed a wide range of approaches or perspectives for allocating and recovering their costs for providing service, often through a combination of fixed and variable charges. The percentage of revenues derived from the fixed and variable charges should be proportional to each system's expenditures and must not exceed the cost of providing service.

Many of the District's costs are fixed costs that do not vary by the level of service provided, such as operational and staff costs, as well as costs for building and maintaining infrastructure. Some of these costs are related to the number of customers, but most of the fixed costs are related to the total capacity of the water system. Fixed costs related to system capacity can reasonably be apportioned by meter size or variable, usage-based rate recovery in recognition that both units of measure reasonably reflect customer usage driving the District to incur capacity-related costs. For example, a share of the fixed cost of salaries related to water production can reasonably be recovered from usage-based charges as these costs are incurred to provide water supply to meet customer demand or from a fixed charge based on a customer's meter size which reflects the magnitude of water a customer can pull from the water system. Likewise, debt service payments may be fixed annual costs, but it is reasonable to recover some of these costs from usage-based rates as the costs are incurred to fund infrastructure that will improve the water delivery system.

While there is no single correct approach, BWA believes that costs should be allocated within a reasonable range that reflects both a) underlying cost causation, to the extent such causation can reasonably be determined or estimated, and b) the policy preferences of the agency in cases where a range of reasonable approaches can be justified.

5.1 Rate Structure Scenarios

BWA developed and presented the following three rate structure scenarios to the Board:

- Scenario 1, 15 CCF Base – Continue to include base use of 15 CCF with the meter charge
- Scenario 2, 10 CCF Base – Include base use of 10 CCF with the meter charge
- Scenario 3 Uniform Rate – Include no base use with the meter charge

BWA recommended the District consider transitioning to a uniform rate structure and the Board agreed and chose to move forward with Scenario 3.

5.2 Functional Allocation

There must be a cost-based nexus between the revenue requirement from the cash flow and the proposed rates. The nexus is created by allocating the expenses and offsetting non-rate revenues to functional components and then dividing each functional component's revenue requirements by the allocations units most reasonably related to each function. A functional component reflects a grouping of the utility's expenses whose magnitude is driven by the quantity of a specific unit-of-measure. For example, costs allocated to the customer functional component are driven by the number of customers served by the water enterprise.

The functional components used in this study are as follows:

- **Customer** - Fixed costs are recovered per customer. Fixed costs or costs related to serving each customer were allocated to this category.
- **Capacity** - Fixed costs are recovered per Meter Equivalent Unit (MEU). Fixed costs or costs related to system capacity were allocated to this category.
- **All Volume** - Costs reasonably recovered volumetrically were allocated to this category. Volumetric costs are recovered per unit of volume (100 cubic feet (CCF)) based on all projected demand.

Related expenses and non-rate revenues were grouped into the following allocation categories before being allocated to each functional category:

- **Transmission and Distribution** - expenses include the operating costs related to the District's potable water distribution systems. These costs are recovered from the All Volume functional component because they are sized to meet peak water demands.
- **Administration** - Expenses and non-rate revenues were allocated to reflect that some administrative costs are driven by the number of customers (Customer) and some are driven by the size of the system (Capacity).
- **Source of Supply** - expenses include the operating costs related to the wells. These costs are recovered partially from the Capacity and All Volume functional components because the wells must meet peak capacity but also provide redundancy.
- **Debt Service and Capital** - expenses and non-rate revenues are allocated 60% to Capacity and 40% to All Volume because these costs are fixed or one-time expenses but are related to the overall capacity of the system which is driven by the projected volume of water sold.

The following tables show a breakdown of the water utility's expenses and offsetting revenues and how they are allocated by function. The proportional allocation is then applied to the rate revenue requirement so that the

rates are proportional to the cost of service provided. To recover the allocated revenue requirements proportionally to the service provided, a unit cost must be derived. Critical to this step is using the unit which relates to the function. The allocation amounts are based on an average of the expenses over the next five years.

Table 6 – Functional Allocation

Projected 5-Year Average

Functional Allocation	Amount	Offsetting Revenue	Allocation Amount	Customer	Capacity	All Volume	Total
Administration	$531,066	$83,997	$447,069	55%	25%	20%	100%
Source of Supply	$107,749	$0	$107,749		30%	70%	100%
Transmission & Distributio	$141,933	$0	$141,933			100%	100%
Debt Service	$71,954	$0	$71,954		50%	50%	100%
Capital	$244,812	$11,318	$233,493		60%	40%	100%
Functional Allocation $	$1,097,514	$95,315	$1,002,199	$245,888	$320,165	$436,146	$1,002,199
Functional Allocation %				24.53%	31.95%	43.52%	100%
FY 23/24 Revenue Requirement				**$143,898**	**$187,425**	**$255,297**	**$586,621**

5.3 Water Rate Derivation

Bi-Monthly Fixed Service Charges

This charge applies to all active services. It recovers the Capacity functional component revenue requirement on a per MEU basis. The MEU varies by meter size. MEU ratios are based on the AWWA meter equivalent ratio for each meter size.

Bi-Monthly Water Use Charges

These charges apply to every unit of water sold. It recovers the All Volume functional component revenue requirement on a unit (CCF) basis. Non-residential have a uniform volumetric rate while residential customers have a two-tier rate structure.

The following table shows the water rate allocation units and total revenue requirement by functional component and the derivation of rates. Volumetric rates for each class and tier are calculated based on the actual volumes of average and peak use water billed in the previous year.

Table 7 – Water Rate Derivation

Volumetric Charge Calculation

Allocation Units	All Volume
Unit of Measure	*CCF*
Total Water Use CCF	210,642
Revenue Requirement	$255,297
Unit Cost ($/Unit)	$1.21

Bi-Monthly Fixed Charge Calculation

Allocation Units	Customer	Capacity
Unit of Measure	*Customers*	*MEUs*
Allocation Units	8,472	9,351
Revenue Requirement	$143,898	$187,425
Unit Cost ($/Unit)	$16.99	$20.04

Meter	Capacity Factor**	Bi-Monthly Capacity Component	Bi-Monthly Capacity Component	Bi-Monthly Fixed Charge
3/4"	1.00	$16.99	$20.04	$37.03
1"	1.67	$16.99	$33.47	$50.46
2"	5.33	$16.99	$106.83	$123.81

5.4 Proposed Water Rates

The following table shows a 5-year schedule of proposed water rates.

Table 8 – Proposed Water Rates

Current and Proposed Water Rates	Existing FY 22-23	Proposed Jan 1, 2024	Proposed Jul 1, 2024	Proposed Jul 1, 2025	Proposed Jul 1, 2026	Proposed Jul 1, 2027
Volumetric Rates ($/CCF)						
Base Use (0-15 CCF)	$0.00					
Volumetric (>15 CCF)	$1.30					
Uniform Rate (All CCF)		$1.21	$1.35	$1.50	$1.65	$1.82
Bi-Monthly Fixed Charge						
Meter Size						
3/4"	$42.87	$37.03	$41.10	$45.62	$50.18	$55.20
1"	$58.45	$50.46	$56.01	$62.17	$68.39	$75.23
2"	$144.15	$123.81	$137.43	$152.55	$167.81	$184.59

5.5 Residential Bill Comparison (¾" Meter)

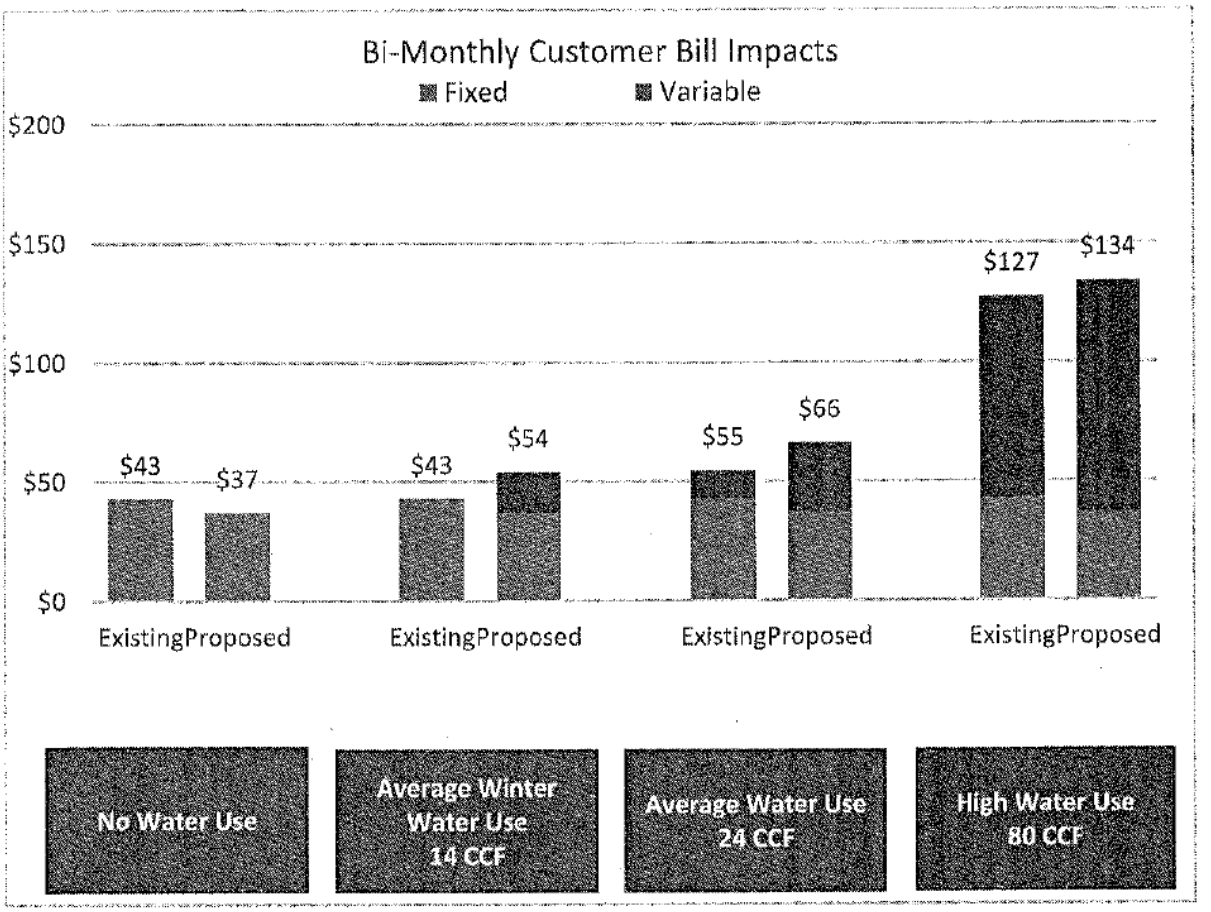
The following chart compares the water bills for a typical single-family home to those of other regional agencies. Rates can vary widely from agency to agency due to a wide range of factors. The survey shown is for comparative purposes only.

Table 9 – Bill Impacts

Water Rate Scenarios	*Existing 2023*	*Proposed*
Bi-Monthly Fixed Charge (3/4" meter)	$42.87	$37.03
Volumetric Rate	$1.30	$1.21
CCF Included in Base	*15*	*0*

Bi-Monthly Use (CCF)	**Total Bi-Monthly Bill**	
0	$42.87	$37.03
14	$42.87	$54.00
24	$54.57	$66.12
80	$127.37	$133.99
	Change in Bi-Monthly Bill ($)	
0	$0.00	-$5.84
14	$0.00	$11.13
24	$0.00	$11.55
80	$0.00	$6.62
	Change in Bi-Monthly Bill (%)	
0	0.00%	-13.62%
14	0.00%	25.96%
24	0.00%	21.16%
80	0.00%	5.20%

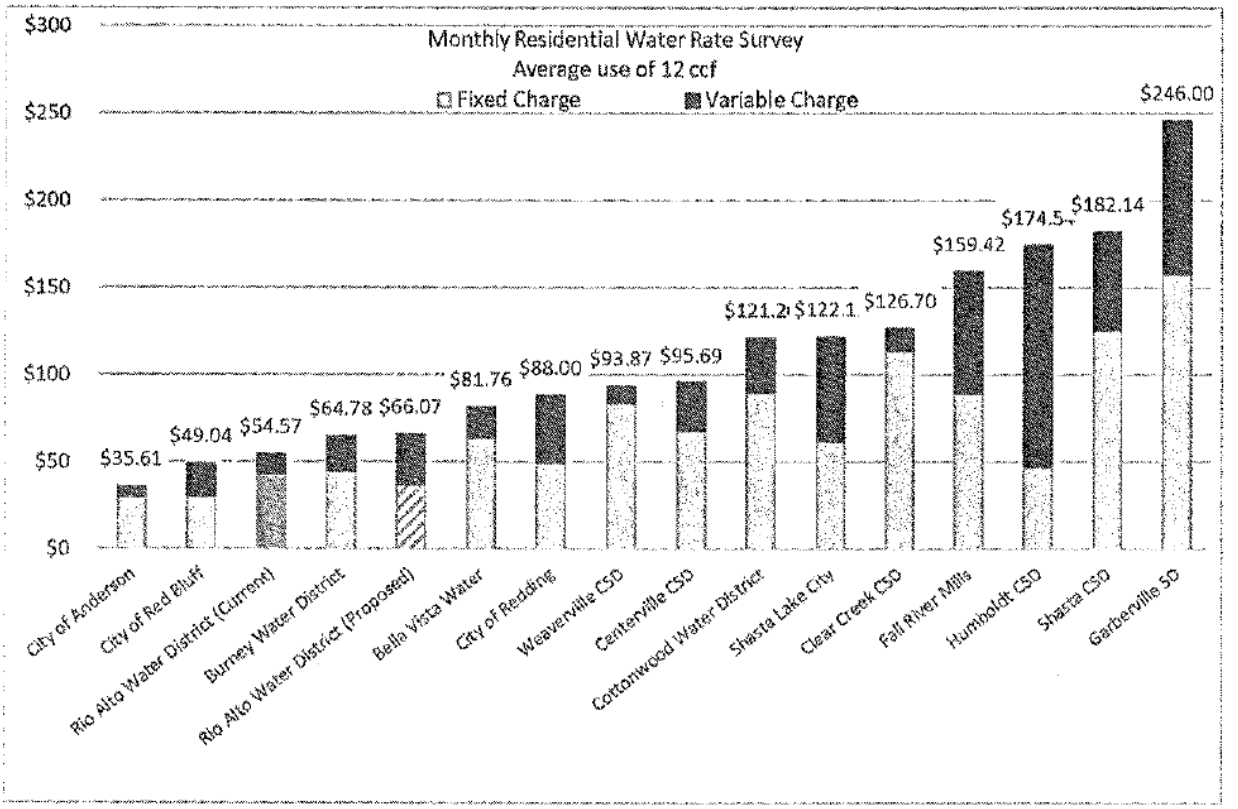
Figure 3 – Bi-Monthly Bill Impacts



5.6 Regional Residential Bill Comparison

The following chart compares the water bills for a typical single-family home to those of other regional agencies. Rates can vary widely from agency to agency due to a wide range of factors. The survey shown is for comparative purposes only.

Figure 4 – Bi-Monthly Residential Bill Comparison (Average Use: 12 CCF, 3/4" Meter)



6 WASTEWATER FINANCIAL PLAN

6.1 Wastewater Financial Overview

BWA conducted an independent evaluation of wastewater enterprise finances and concluded the previous rate increases have put the wastewater enterprise in a sound financial position.

The District relies almost solely on revenues from wastewater rates to fund the costs of providing service. As such, wastewater rates must be set at levels adequate to fund the costs of operating and maintaining the wastewater system, fund necessary capital improvements to keep the wastewater system in good operating condition.

6.2 Key Drivers of Rate Increases

The District is facing several manageable financial challenges that will drive the need for rate increases in upcoming years. Key drivers of future rate increases are summarized below.

Capital Improvement Funding Needs

The District takes a proactive approach to maintaining its wastewater system, which requires ongoing repair and improvement projects. Accounting for construction cost inflation, the District anticipates funding approximately $1.2 million of capital improvement projects over the next 5 years.

Ongoing Operating Cost Inflation

The District faces annual cost inflation due to annual increases in a range of expenses including staffing, utilities, insurance, supplies, etc. On top of rate increases needed for capital improvements, annual rate increases are needed to keep revenues aligned with cost inflation and prevent rates from falling behind the cost of providing service. Wastewater cost inflation has historically been higher than the Consumer Price Index (CPI) for consumer goods and services. Historically inflation has typically remained consistently around 3%, but recently inflation has reached forty-year highs with the CPI and ENR CCI exceeding 7% in 2022. It is not expected that inflation will remain at such high levels in the future and for the purposes of this rate study average annual inflation is projected to be 4.5%; in-line with the District's budget inflationary projections.

Wastewater Reserve Funds

Maintaining a prudent minimal level of fund reserves provides a financial cushion for dealing with unanticipated expenses, revenue shortfalls, and non-catastrophic emergency capital repairs. BWA developed a financial plan designed to maintain prudent reserve levels that are in-line with industry standards.

Debt Service Coverage

Most municipal debt requires that the issuer generate net operating revenues of 1.25 times the total annual debt service payment or greater. This is referred to as "debt service coverage". To support a strong credit rating and good financial health, the current BWA recommends the District maintain a minimum debt coverage ratio of 1.3 times the annual payment or greater.

6.3 Financial Plan Assumptions

The financial projections incorporate the latest information available and a number of reasonable and slightly conservative assumptions for planning purposes. Key assumptions include:

Revenue Assumptions

- Wastewater rate revenues are based on estimated revenues for the current fiscal year.
- Rates proposed to be adopted in December 2023 will be effective on January 1, 2024, with rate adjustments planned to become effective on July 1 of each of the subsequent four fiscal years beginning July 1, 2024.
- To be conservative and ensure revenues will be sufficient, BWA assumed growth to be two new single family connections added per year.
- Interest earnings are projected based on the annual beginning fund balance multiplied by the projected interest rate. The interest rate projections are conservatively based on recent and anticipated interest rates.

Expense Assumptions

- Operating and maintenance costs are primarily based on the 2023/24 budget.
- Operating costs are projected to escalate at 4.5% per year to account for cost inflation.
- Debt service projections are based on outstanding debt schedules and projected issuances of new debt.
- The District is projected to need to finance $1,000,000 of capital spending. BWA assumed the District will get SRF financing but included a conservative interest rate of 5%.
- Capital improvement costs are based on the most recent engineering cost estimates. Capital costs include a 4.5% annual construction cost inflation factor for the next five years.
- Upon the completion of the Onsite Hypo Generation at WWTP project the District should not need to continue purchasing chlorine. This is reflected in the expenses projections.

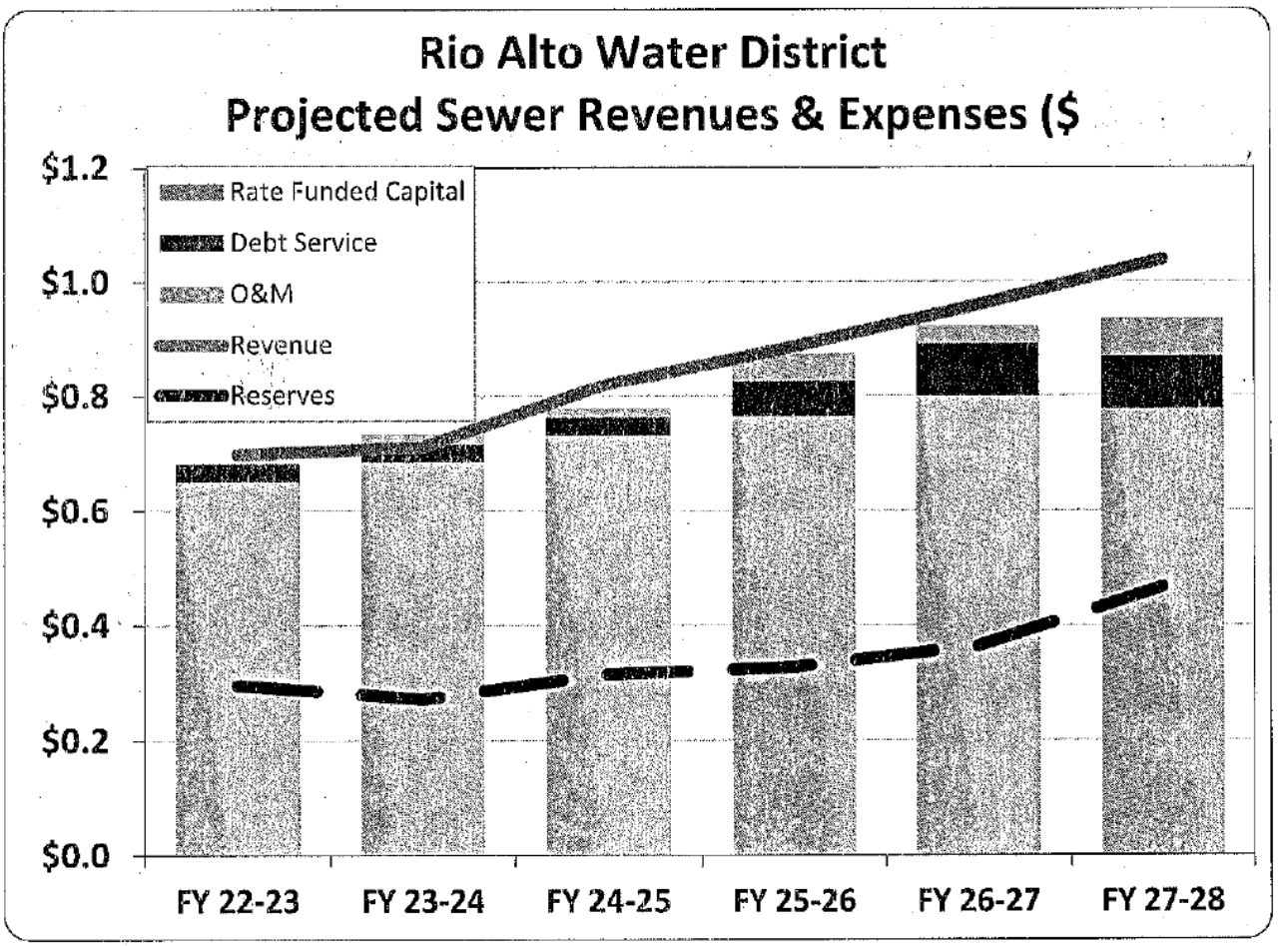
6.4 Cash Flow Projections

Long-term cash-flow projections were developed based on assumptions and key drivers of future rate increases described above. The projections were used to determine the wastewater utility's annual revenue requirements and project required wastewater rate revenue increases. The long-term cash-flow projections incorporate the latest information available from the District's budget, annual reports, capital spending projections, and metered water demand data, as well as a number of reasonable assumptions developed with input from the District. The overall rate revenue increases shown for each of the following scenarios are designed to fund the District's cost of providing service, maintain roughly balanced budgets, maintain healthy debt service coverage, and maintain prudent reserves. The projections indicate the need for increases for wastewater rate revenues for each of the next five fiscal years. Actual impacts to customers' wastewater bills will vary based on strength category and water use, due to the outcome of the updated cost-of-service analysis.

In future years, the District can re-evaluate its finances and revenue requirements and adjust rates as needed based on updated projections. However, while the District always has the flexibility to implement rate adjustments that are lower than adopted pursuant to Proposition 218, future rates cannot exceed adopted increases without going through the Proposition 218 process again. Rates adopted pursuant to Proposition 218 are essentially future rate caps.

The following figure visually depicts the cash-flow projections with the proposed rate increases for the next five years. Projected expenses are summarized into key categories. The figure also shows the projected fund reserves at the end of each fiscal year.

Figure 5 – Projected Cashflow Graph



Detailed, long-term, cash-flow projections for this scenario are shown in the following table.

Table 10 – Detailed Cash Flow Projections

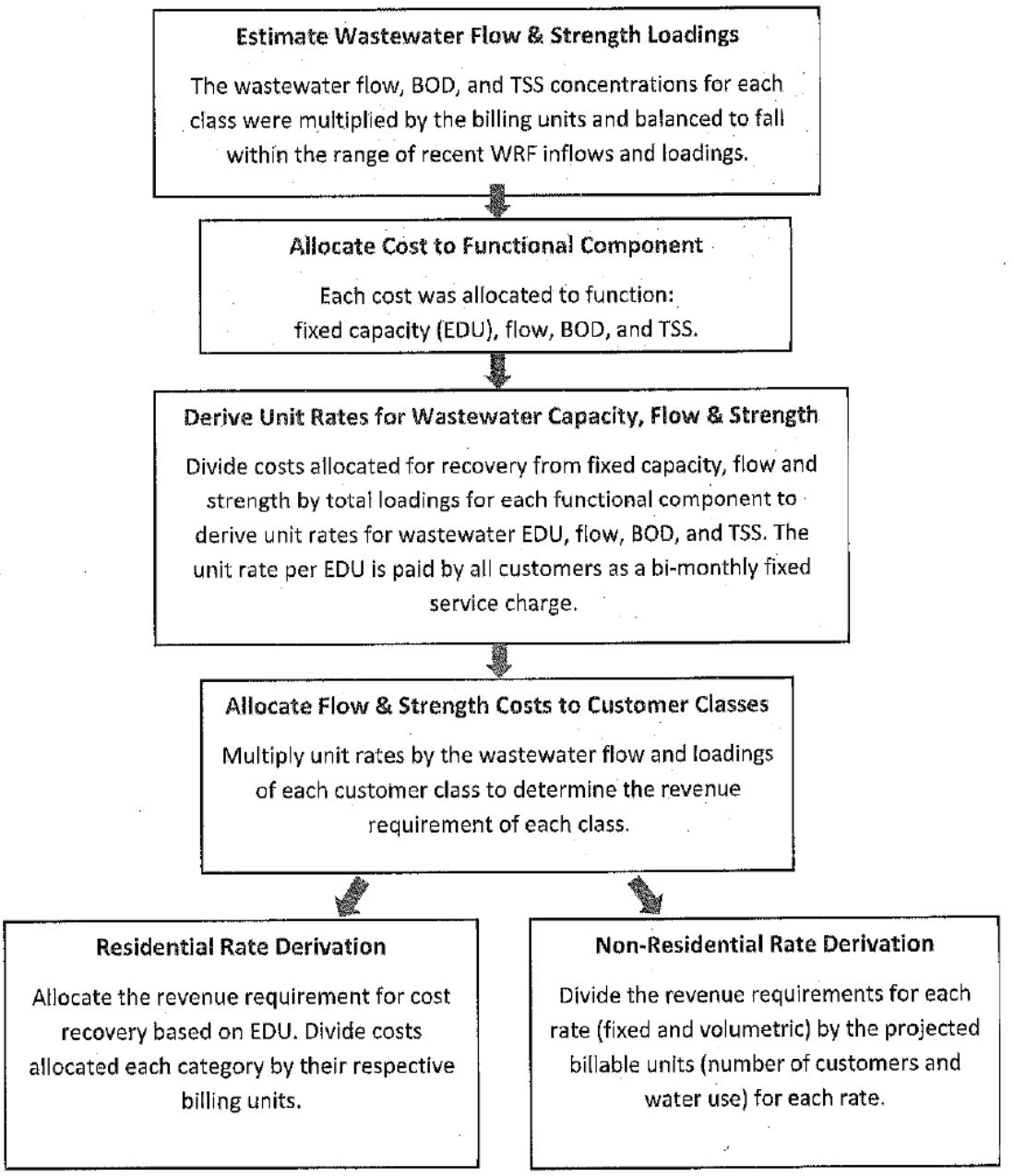
Sewer Fund	FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28
Rate Revenue Increase		**15.0%**	**12.5%**	**10.0%**	**10.0%**	**10.0%**
Beginning Reserves	$280,267	$295,964	$272,016	$314,918	$327,019	$363,450
Revenues						
Rate Revenue	$504,391	$503,832	$579,406	$651,832	$717,015	$788,717
Rate Increase Revenue	0	75,575	72,426	65,183	71,702	78,872
Timing Adjustment*		-37,787				
Other Revenue	193,968	169,276	168,858	169,841	170,532	171,483
Total Revenue	**$698,359**	**$710,895**	**$820,690**	**$886,856**	**$959,249**	**$1,039,072**
Expenses						
Operating Expenses	$651,041	$684,265	$730,737	$764,647	$798,451	$777,321
Existing Debt Service	31,621	31,377	31,377	31,377	31,377	31,377
New Debt Service	0	0	0	31,000	62,000	62,000
Rate Funded Capital	$0	$19,200	$15,675	$47,730	$30,990	$65,589
Total Expenses	**$682,662**	**$734,842**	**$777,789**	**$874,754**	**$922,818**	**$936,287**
Net Revenues	$15,697	-$23,947	$42,901	$12,102	$36,430	$102,785
Ending Reserves	**$295,964**	**$272,016**	**$314,918**	**$327,019**	**$363,450**	**$466,235**
Debt Coverage	1.50	0.85	2.87	1.96	1.72	2.80

*Reflects January rate implementation

7 WASTEWATER COST OF SERVICE ANALYSIS AND RATE DERIVATION

BWA derived updated wastewater rates that account for both a) the overall rate increases identified in the financial projections, and b) proposed rate structure modifications. The proposed rates are designed to equitably apportion and recover costs from the District's customer base. The basic methodology used to develop new rates includes the following steps:

Figure 6 – WW Cost of Service Analysis and Rate Derivation Process



7.1 Flows and Loadings

The following table estimates the flows and loadings of each customer class based on analysis of recent winter and annual water consumption data and wastewater strength assignments for each customer class.

- Residential flows per unit are based on analysis of historical winter water use data. Residential wastewater strength concentrations are based on estimates previously published by the State Water Resources Control Board (SWRCB). Residential wastewater strength concentrations have increased over the past decade as the volume of wastewater flow has decreased due to transition to low-flow toilets, water-efficient appliances, and other water conservation and efficiency measures.

- Commercial estimated wastewater flows are adjusted to account for a 20% RTS factor. The RTS factor was based on an analysis of winter and summer water use.

The resulting flow and strength projections for each class are shown in the following table and provide the basis for allocating costs and deriving equitable wastewater rates for each customer class.

Table 11 – Wastewater Flows and Loading

Wastewater Flows and Loadings	# of Sewer Customers	# of Sewer EDUs[1]	Est. Mo Flow CCF Per EDU[2]	Projected Water Use CCF[3]	Flow Factor[4]	Projected Flow CCF	Strength (mg/l)[9] BOD[7]	TSS[8]	Loadings (lbs) BOD	TSS
Residential	911	927	7.00	N/A		77,826	220	220	106,906	106,906
Commercial	2	9	35.00	3,782	20%	756	200	200	944	944
Total						**78,582**			**107,850**	**107,850**

[1] "EDU" stands for equivalent dwelling unit

[2] Flow estimate based on average winter use

[3] "CCF" stands for hundred cubic feet

[4] Flow factor based on estimated flow returning to sewer

[5] "MG" stands for 1,000 gallons

[6] "GPD" stands for gallons per day

[7] "BOD" stands for biochemical oxygen demand

[8] "TSS" stands for total suspended solids

[9] State Water Resource Control Board (SWRCB) Guidelines for Wastewater Agencies

7.2 Functional Allocation

The next step in the cost-of-service analysis is to assign wastewater system costs in each allocation category for revenue recovery via the functional cost components of flow, BOD (biochemical oxygen demand), and TSS (total suspended solids). While there is no single correct approach for cost allocation, BWA believes that costs should be allocated within a reasonable range that reflects both a) underlying cost causation, to the extent such causation can reasonably be determined or estimated, and b) the policy preferences of the agency in cases where a range of reasonable approaches can be justified. This process is intended to proportionately allocate costs to each functional component to determine the revenue requirement for each component. The allocations to each functional component were based on input from District staff.

The functional cost components are described as follows:

- **Flow** reflects costs associated with the volume of wastewater collected and treated.
- **BOD** reflects costs associated with treating BOD.
- **TSS** reflects costs associated with treating TSS.

The following table shows a breakdown of the wastewater utility's expenses, how they are allocated and calculates the unit rates per unit of flow, BOD and TSS. The wastewater rate revenue requirements from the prior table for each functional component are divided by the units related to each function.

Table 12 – Functional Cost Allocation

Projected 5-Year Average

		Offsetting	Allocation				
Functional Allocation	**Amount**	**Revenue**	**Amount**	**Flow**	**BOD**	**TSS**	**Total**
Administration	$468,541	$13,200	$455,341				0%
Collection System	$119,920	$0	$119,920	100%			100%
Treatment	$191,330	$0	$191,330	20%	40%	40%	100%
Debt Service	$62,377	$0	$62,377	20%	40%	40%	100%
Capital	$35,837	$9,984	$25,853	33%	33%	33%	100%
Functional Allocation $	$878,005	$23,184	$854,821	$179,279	$110,101	$110,101	$399,480
Functional Allocation %				44.88%	27.56%	27.56%	100%
FY 22/23 Revenue Requirement				**$226,120**	**$138,856**	**$138,856**	**$503,832**
LPSS Allocation				-$2,880			
Final Revenue Requirement				**$223,240**	**$138,856**	**$138,856**	**$503,832**

7.3 Flow and Strength Revenue Requirement by Class

Revenue requirements for each customer class are calculated by multiplying the unit rates for flow, BOD and TSS from the volume of wastewater flow and loadings associated with each class.

Table 13 – Flow and Strength Revenue Requirement by Class

Allocation Units	Flow	BOD	TSS	
Unit of Measure	*#*	*EDU*	*CCF*	
Allocation Units	78,582	107,850	107,850	
Revenue Requirement	$223,240	$138,856	$138,856	
Unit Cost ($/Unit)	$2.84	$1.29	$1.29	
Revenue Requirement	**Flow**	**BOD**	**TSS**	**Total**
Units				
Residential	77,826	106,906	106,906	
Commercial	756	944	944	
Revenue Requirement				
Residential	$221,091	$137,640	$137,640	$496,371
Commercial	$2,149	$1,216	$1,216	$4,581

7.4 Domestic Rate Derivation

Residential rates are derived by dividing the total amount of costs designated residential rate recovery by the total number of residential fixed billing units.

Table 14 – Residential Rate Derivation

Unit Cost Calculation	Sewer System	Low Pressure
Total EDUs	926.50	22.00
Revenue Requirement	$496,370.98	$3,151.22
$ per EDU	$535.75	$143.24
Bi-Monthly $ per EDU	$89.29	$23.87

Bi-Monthly Residential Rate Derivation	EDUs	Sewer System	Low Pressure	At FY 22-23 Revenue	At FY 23-24 Revenue
Single Family Resid.	1.00	$89.29		$89.29	$102.68
1/2 single Fam Resid.	0.50	$44.65		$44.65	$51.34
TriPlex sewer	3.00	$267.89		$267.89	$308.08
Duplex Sewer	2.00	$178.59		$178.59	$205.38
Sewer Extention	1.00	$89.29		$89.29	$102.68
Low Pressure	1.00	$89.29	$23.87	$113.16	$130.14
Low Pressure Duplex	2.00	$178.58	$47.75	$226.33	$260.28

7.5 Non-Residential Rate Derivation

The following table calculates rates for the commercial customer class by dividing the revenue requirements for fixed and variable rates by the billable units applicable to each rate.

Table 15 – Non-Residential Rate Derivation

Commercial Rate Derivation	Fixed	Volumetric
FY 22/23 Revenue Requirement	$2,431.98	$2,148.57
Units	2.00	3,781.58
$ per Unit	$1,215.99	$0.57
Bi-Monthly $ per Customer	$202.66	
Bi-Monthly FY 23/24 Rates	**$233.06**	**$0.65**

7.6 Proposed Wastewater Rates

The following table shows a 5-year schedule of proposed wastewater rates. The rates are designed to recover the District's costs of providing wastewater service while achieving roughly balanced budgets in upcoming years.

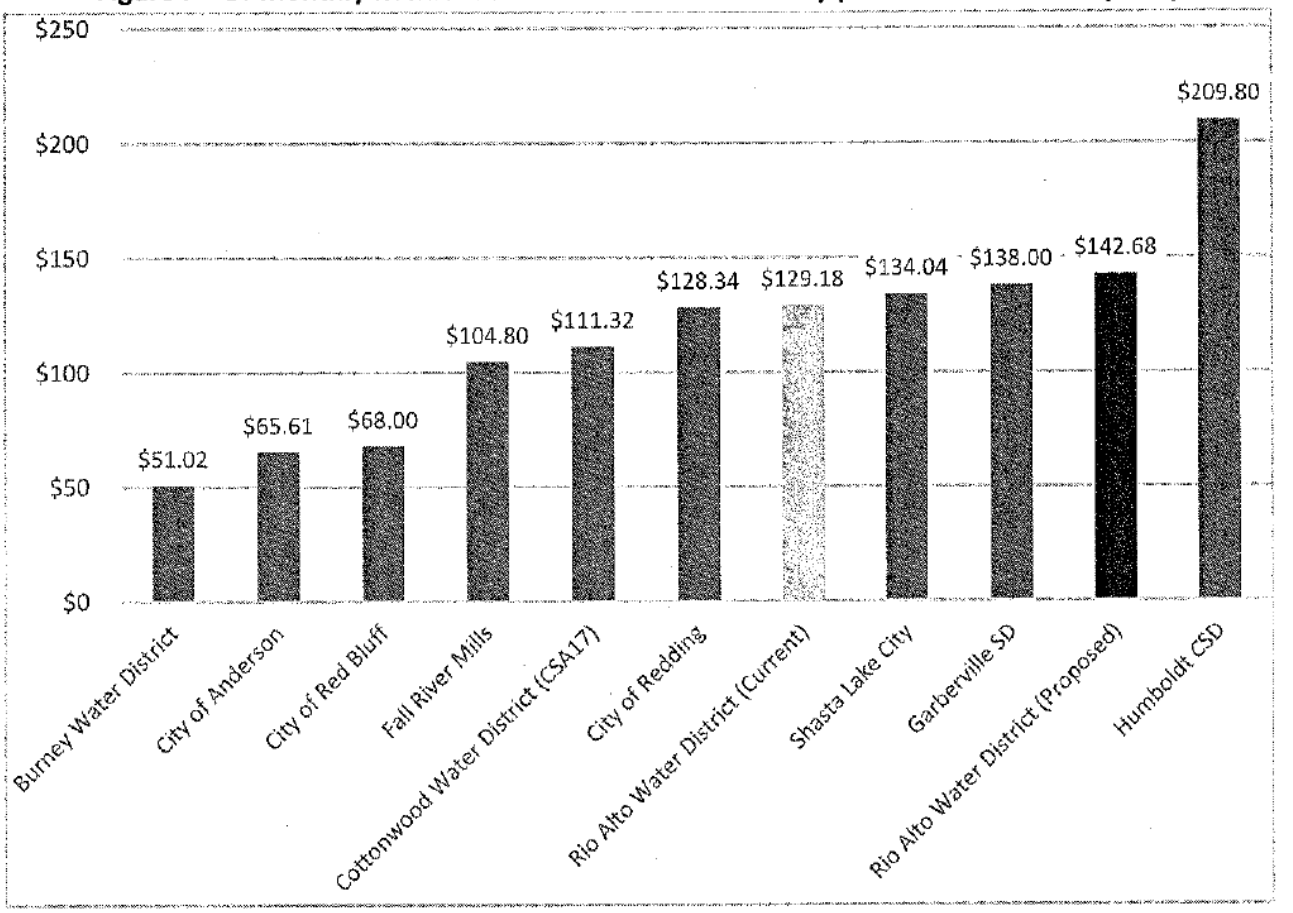
Table 16 – Proposed Wastewater Rates

Existing and Proposed Sewer Rates	Existing FY 22-23	Proposed Jan 1, 2024	Proposed Jul 1, 2024	Proposed Jul 1, 2025	Proposed Jul 1, 2026	Proposed Jul 1, 2027
Bi-Monthly Fixed Charges						
Single Family Resid.	$89.18	$102.68	$115.52	$127.07	$139.78	$153.76
1/2 single Fam Resid.	$44.59	$51.34	$57.76	$63.54	$69.89	$76.88
TriPlex sewer	$267.56	$308.08	$346.59	$381.25	$419.38	$461.32
Duplex Sewer	$178.37	$205.38	$231.05	$254.16	$279.58	$307.54
Sewer Extention	$105.26	$102.68	$115.52	$127.07	$139.78	$153.76
Low Pressure	$105.26	$130.14	$146.41	$161.05	$177.16	$194.88
Low Pressure Duplex	$210.52	$260.28	$292.82	$322.10	$354.31	$389.74
Commercial	$202.46	$233.06	$262.19	$288.41	$317.25	$348.98
Volumetric Charges						
Commercial	$0.55	$0.65	$0.73	$0.80	$0.88	$0.97

7.7 Regional Wastewater Rate Survey

The following charts compare the wastewater and wastewater bills for a typical single-family home to those of other regional agencies.

Figure 7 – Bi-Monthly Residential Wastewater Rate Survey (7 CCF winter consumption)



APPENDIX A

Water Rate Study Tables

Rio Alto Water District
Draft Water Rate Study Tables

November 21, 2023

BARTLE WELLS ASSOCIATES
Independent Public Finance Advisors

Table 1
Rio Alto WD
Water Rate Study
Projected Operating Expenses

Expenses[1]		FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28	FY 28-29	FY 29-30	FY 30-31	FY 31-32	FY 32-33
		Budgeted	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*
General Inflation Factor			4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%
Regulatory Officer	Source of Supply	20,639	$21,568	$22,538	$23,553	$24,612	$25,720	$26,877	$28,087	$29,351	$30,672
Systems Operator II	Source of Supply	32,469	$33,930	$35,457	$37,053	$38,720	$40,462	$42,283	$44,186	$46,174	$48,252
Systems Operator III	Source of Supply	20,950	$21,893	$22,878	$23,907	$24,983	$26,108	$27,282	$28,510	$29,793	$31,134
Part Time Employee	Source of Supply	2,700	$2,822	$2,948	$3,081	$3,220	$3,365	$3,516	$3,674	$3,840	$4,012
Well #4 Utility PG&E	Source of Supply	9,200	$9,614	$10,047	$10,499	$10,971	$11,465	$11,981	$12,520	$13,083	$13,672
Well #5 Utility PG&E	Source of Supply	1,000	$1,045	$1,092	$1,141	$1,193	$1,246	$1,302	$1,361	$1,422	$1,486
Well #3 Utility PG&E	Source of Supply	650	$679	$710	$742	$775	$810	$846	$885	$924	$966
Tools	Source of Supply	150	$157	$164	$171	$179	$187	$195	$204	$213	$223
General Supplies	Source of Supply	200	$209	$218	$228	$239	$249	$260	$272	$284	$297
Well #6 Utility PG&E	Source of Supply	2,000	$2,090	$2,184	$2,282	$2,385	$2,492	$2,605	$2,722	$2,844	$2,972
Contracted Services	Source of Supply	500	$523	$546	$571	$596	$623	$651	$680	$711	$743
Auto Fuel	Source of Supply	2,150	$2,247	$2,348	$2,454	$2,564	$2,679	$2,800	$2,926	$3,058	$3,195
Auto Maintenance	Source of Supply	800	$836	$874	$913	$954	$997	$1,042	$1,089	$1,138	$1,189
Auto Repair	Source of Supply	350	$366	$382	$399	$417	$436	$456	$476	$498	$520
Well #3 Repair	Source of Supply	0	$0	$0	$0	$0	$0	$0	$0	$0	$0
Well #4 Repair	Source of Supply	50	$52	$55	$57	$60	$62	$65	$68	$71	$74
Well #4 Maintenance	Source of Supply	200	$209	$218	$228	$239	$249	$260	$272	$284	$297
Well #5 Maintenance	Source of Supply	200	$209	$218	$228	$239	$249	$260	$272	$284	$297
Well #6 Repair	Source of Supply	50	$52	$55	$57	$60	$62	$65	$68	$71	$74
Well #5 Repair	Source of Supply	50	$52	$55	$57	$60	$62	$65	$68	$71	$74
Well #6 Maintenance	Source of Supply	200	$209	$218	$228	$239	$249	$260	$272	$284	$297
Telemetry System	Source of Supply	750	$784	$819	$856	$894	$935	$977	$1,021	$1,067	$1,115
Drinking Water Samples	Source of Supply	3,220	$3,365	$3,516	$3,675	$3,840	$4,013	$4,193	$4,382	$4,579	$4,785
Regulatory Officer	Transmission & Distribution	20,638	$21,567	$22,537	$23,551	$24,611	$25,719	$26,876	$28,085	$29,349	$30,670
Systems Operator II	Transmission & Distribution	39,263	$41,030	$42,876	$44,806	$46,822	$48,929	$51,131	$53,432	$55,836	$58,349
Systems Operator III	Transmission & Distribution	25,690	$26,846	$28,054	$29,317	$30,636	$32,014	$33,455	$34,961	$36,534	$38,178
Auto Fuel	Transmission & Distribution	2,050	$2,142	$2,239	$2,339	$2,445	$2,555	$2,670	$2,790	$2,915	$3,046
Auto Maintenance	Transmission & Distribution	800	$836	$874	$913	$954	$997	$1,042	$1,089	$1,138	$1,189
Auto Repair	Transmission & Distribution	350	$366	$382	$399	$417	$436	$456	$476	$498	$520
Part Time Employee	Transmission & Distribution	2,700	$2,822	$2,948	$3,081	$3,220	$3,365	$3,516	$3,674	$3,840	$4,012
Booster Station Utility	Transmission & Distribution	420	$439	$459	$479	$501	$523	$547	$572	$597	$624
Meters/Backflows	Transmission & Distribution	7,000	$7,315	$7,644	$7,988	$8,348	$8,723	$9,116	$9,526	$9,955	$10,403
Tools	Transmission & Distribution	5,000	$5,225	$5,460	$5,706	$5,963	$6,231	$6,511	$6,804	$7,111	$7,430
General Supplies	Transmission & Distribution	1,000	$1,045	$1,092	$1,141	$1,193	$1,246	$1,302	$1,361	$1,422	$1,486
Contracted Services	Transmission & Distribution	560	$585	$612	$639	$668	$698	$729	$762	$796	$832
Equipment Maintenance/Repair	Transmission & Distribution	1,000	$1,045	$1,092	$1,141	$1,193	$1,246	$1,302	$1,361	$1,422	$1,486
Booster Station Maintenance/Repair	Transmission & Distribution	500	$523	$546	$571	$596	$623	$651	$680	$711	$743
Tanks #1,2,3 Maintenance/Repair	Transmission & Distribution	500	$523	$546	$571	$596	$623	$651	$680	$711	$743
Line Maintenance/Repair	Transmission & Distribution	20,000	$20,900	$21,841	$22,823	$23,850	$24,924	$26,045	$27,217	$28,442	$29,722
Valve Maintenance/Repair	Transmission & Distribution	1,000	$1,045	$1,092	$1,141	$1,193	$1,246	$1,302	$1,361	$1,422	$1,486
Hydrant Maintenance/Repair	Transmission & Distribution	500	$523	$546	$571	$596	$623	$651	$680	$711	$743
Telemetry System	Transmission & Distribution	750	$784	$819	$856	$894	$935	$977	$1,021	$1,067	$1,115
Hydrant Replacement Fund	Transmission & Distribution		$0	$0	$0	$0	$0	$0	$0	$0	$0
General Manager	Administration	59,716	$62,403	$65,211	$68,146	$71,212	$74,417	$77,766	$81,265	$84,922	$88,744

Table 1
Rio Alto WD
Water Rate Study
Projected Operating Expenses

Expenses[1]		FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28	FY 28-29	FY 29-30	FY 30-31	FY 31-32	FY 32-33
		Budgeted	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*
General Inflation Factor			4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%
Regulatory Officer	Administration	9,326	$9,746	$10,184	$10,643	$11,121	$11,622	$12,145	$12,691	$13,263	$13,859
Systems Operator II	Administration	1,242	$1,298	$1,356	$1,417	$1,481	$1,548	$1,617	$1,690	$1,766	$1,846
Systems Operator III	Administration	790	$826	$863	$902	$942	$984	$1,029	$1,075	$1,123	$1,174
Secretary	Administration	35,840	$37,453	$39,138	$40,899	$42,740	$44,663	$46,673	$48,773	$50,968	$53,262
Bookkeeper	Administration	33,903	$35,429	$37,023	$38,689	$40,430	$42,249	$44,151	$46,137	$48,213	$50,383
Part Time Employee	Administration	-									
PERS Employer Unfunded Liability	Administration	47,585	$49,831	$52,073	$54,417	$56,865	$59,424	$62,098	$64,893	$67,813	$70,864
Workers Compensation Insurance	Administration	4,425	$4,624	$4,832	$5,050	$5,277	$5,514	$5,763	$6,022	$6,293	$6,576
FICA	Administration	23,000	$24,035	$25,117	$26,247	$27,428	$28,662	$29,952	$31,300	$32,708	$34,180
PERS Retirement	Administration	27,369	$28,601	$29,888	$31,233	$32,638	$34,107	$35,642	$37,245	$38,921	$40,673
Health Insurance ACWA	Administration	38,268	$39,990	$41,790	$43,670	$45,635	$47,589	$49,835	$52,077	$54,421	$56,870
SUI	Administration	1,840	$1,923	$2,009	$2,100	$2,194	$2,293	$2,396	$2,504	$2,617	$2,734
Retiree Health Benefits	Administration	13,974	$14,603	$15,260	$15,947	$16,664	$17,414	$18,198	$19,017	$19,872	$20,767
PEPRA Employer Contributions	Administration	11,155	$11,657	$12,182	$12,730	$13,303	$13,901	$14,527	$15,180	$15,864	$16,577
PEPRA Employer Unfunded Liability	Administration	-									
Dental/Vision Insurance	Administration	3,502	$3,660	$3,824	$3,996	$4,176	$4,364	$4,561	$4,766	$4,980	$5,204
Life Insurance	Administration	804	$840	$878	$917	$959	$1,002	$1,047	$1,094	$1,143	$1,195
Supplies	Administration	4,000	$4,180	$4,368	$4,565	$4,770	$4,985	$5,209	$5,443	$5,688	$5,944
Postage	Administration	5,000	$5,225	$5,460	$5,706	$5,963	$6,231	$6,511	$6,804	$7,111	$7,430
Printing	Administration	1,200	$1,254	$1,310	$1,369	$1,431	$1,495	$1,563	$1,633	$1,707	$1,783
Employee Travel/Expenses	Administration	2,500	$2,613	$2,730	$2,853	$2,981	$3,115	$3,256	$3,402	$3,555	$3,715
Employee Meetings/Conferences	Administration	1,500	$1,568	$1,638	$1,712	$1,789	$1,869	$1,953	$2,041	$2,133	$2,229
Education	Administration	300	$314	$328	$342	$358	$374	$391	$408	$427	$446
Certification Renewal	Administration	200	$209	$218	$228	$239	$249	$260	$272	$284	$297
Public Relations	Administration	1,000	$1,045	$1,092	$1,141	$1,193	$1,246	$1,302	$1,361	$1,422	$1,486
District Uniforms	Administration	950	$993	$1,037	$1,084	$1,133	$1,184	$1,237	$1,293	$1,351	$1,412
Alarm System Monitoring	Administration	504									
Membership/Subscriptions	Administration	1,200	$1,254	$1,310	$1,369	$1,431	$1,495	$1,563	$1,633	$1,707	$1,783
Banking/Court Costs	Administration	3,000	$3,135	$3,276	$3,423	$3,578	$3,739	$3,907	$4,083	$4,266	$4,458
Website & Advertising	Administration	275	$287	$300	$314	$328	$343	$358	$374	$391	$409
Insurance	Administration	28,710	$30,002	$31,352	$32,763	$34,237	$35,778	$37,388	$39,070	$40,829	$42,666
Cell Phone Allowance	Administration	458	$479	$500	$523	$546	$571	$596	$623	$651	$681
Propane - Fat Cat	Administration	300	$314	$328	$342	$358	$374	$391	$408	$427	$446
Equipment Lease	Administration	5,304	$5,543	$5,792	$6,053	$6,325	$6,610	$6,907	$7,218	$7,543	$7,882
Office Equipment Expense	Administration	900	$941	$983	$1,027	$1,073	$1,122	$1,172	$1,225	$1,280	$1,337
Office Equipment Maintenance	Administration	180	$188	$197	$205	$215	$224	$234	$245	$256	$267
Office Building Maintenance	Administration	960	$1,003	$1,048	$1,096	$1,145	$1,196	$1,250	$1,306	$1,365	$1,427
Contracted Services	Administration	3,770	$3,940	$4,117	$4,302	$4,496	$4,698	$4,910	$5,130	$5,361	$5,603
Engineering Services	Administration	1,000	$1,045	$1,092	$1,141	$1,193	$1,246	$1,302	$1,361	$1,422	$1,486
Lot Selling Expense	Administration	100	$105	$109	$114	$119	$125	$130	$136	$142	$149
Safety Supplies	Administration	900	$941	$983	$1,027	$1,073	$1,122	$1,172	$1,225	$1,280	$1,337
Office Utility-PG&E	Administration	-									
Telephone	Administration	1,714	$1,791	$1,872	$1,956	$2,044	$2,136	$2,232	$2,333	$2,437	$2,547
Service Fee - State	Administration	13,725	$14,343	$14,988	$15,663	$16,367	$17,104	$17,874	$18,678	$19,518	$20,397

Table 1
Rio Alto WD
Water Rate Study
Projected Operating Expenses

Expenses[1]		FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28	FY 28-29	FY 29-30	FY 30-31	FY 31-32	FY 32-33
		Budgeted	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*
General Inflation Factor			5%	4.5%	4%	5%	4.5%	4.5%	4.5%	4.5%	5.0%
Service Fee - Federal SSA	Administration	150	$157	$164	$171	$179	$187	$195	$204	$213	$223
Service Fee - County	Administration	4,900	$5,121	$5,351	$5,592	$5,843	$6,106	$6,381	$6,668	$6,968	$7,282
Auditor	Administration	8,400	$8,778	$9,173	$9,586	$10,017	$10,468	$10,939	$11,431	$11,946	$12,483
Legal Counsel	Administration	2,400	$2,508	$2,621	$2,739	$2,862	$2,991	$3,125	$3,266	$3,413	$3,567
Board Meeting Supplies	Administration	250	$261	$273	$285	$298	$312	$326	$340	$356	$372
Director Fees	Administration	4,040	$4,222	$4,412	$4,610	$4,818	$5,035	$5,261	$5,498	$5,745	$6,004
Director Travel/Conferences	Administration	7,260	$7,587	$7,928	$8,285	$8,658	$9,047	$9,454	$9,880	$10,324	$10,789
Director Election (non-election yr.)	Administration	600		$655		$716		$781		$853	
Director Election (election yr.)	Administration		$2,613		$2,853		$3,115		$3,402		$3,715
GASB OPEB Evaluations (total eval)	Administration	1,500		$1,638		$1,789		$1,953		$2,133	
GASB OPEB Evaluations (disclosure)	Administration		$314		$342		$374		$408		$446
Computer Updates & Subscriptions	Administration	6,220	$6,500	$6,792	$7,098	$7,417	$7,751	$8,100	$8,465	$8,845	$9,244
Water Rate Study	Administration	21,000					$26,170				
OPEB Contributions (CERBT Trust)	Administration										
Asset Evaluation Consultant	Administration	15,000					$18,693				
OPEB Liability	Administration		$15,000	$15,675	$16,380	$17,117	$17,888	$18,693	$19,534	$20,413	$21,332
Computer Upgrades	Administration		$7,000	$7,315	$7,644	$7,988	$8,348	$8,723	$9,116	$9,526	$9,955
Total Operating Expenses		**$692,408**	**$708,151**	**$739,254**	**$773,319**	**$807,283**	**$889,346**	**$881,574**	**$922,197**	**$962,700**	**$1,007,062**

[1] Based on District's FY 23-24 budget with minor modifications reflecting the updated capital spending projections

Table 2
Rio Alto WD
Water Rate Study
Projected Revenues

Revenue	Category	FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28	FY 28-29	FY 29-30	FY 30-31	FY 31-32	FY 32-33
		Actual	*Budgeted*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*
Rate Revenue Assumptions												
Customer Growth				0.14%	0.14%	0.14%	0.14%	0.14%	0.14%	0.14%	0.14%	0.14%
Rate Revenue												
Rate Revenue Before Increase		$528,471	$528,487	$587,442	$652,973	$725,815	$799,515	$880,697	$970,123	$1,068,630	$1,155,736	$1,238,369
Revenue from Rate Increase[1,2]			$29,067	$64,619	$71,827	$72,582	$79,951	$88,070	$97,012	$85,490	$80,902	$61,918
Total Rate Revenue		**$528,471**	**$557,554**	**$652,061**	**$724,801**	**$798,397**	**$879,466**	**$968,767**	**$1,067,136**	**$1,154,120**	**$1,236,637**	**$1,300,287**
Other Revenue												
Avail Water Revenue	Administration	$54,975	$53,163	$53,163	$53,163	$53,163	$53,163	$53,163	$53,163	$53,163	$53,163	$53,163
Hydrant Revenue	Administration	$20,228	$19,728	$19,728	$19,728	$19,728	$19,728	$19,728	$19,728	$19,728	$19,728	$19,728
Avail Hydrant Revenue	Administration	$11,514	$11,106	$11,106	$11,106	$11,106	$11,106	$11,106	$11,106	$11,106	$11,106	$11,106
Connections Water Revenue	Capital	$23,304	$18,864	$9,432	$9,432	$9,432	$9,432	$9,432	$9,432	$9,432	$9,432	$9,432
Interest Revenue RAWD	As All Other	$42,574	$11,752	$8,730	$8,326	$7,966	$8,654	$8,741	$7,227	$6,567	$6,163	$5,966
Cell Tower Lease Revenue	As All Other	$10,200	$13,950	$18,450	$19,004	$19,574	$20,161	$20,766	$21,389	$22,030	$22,691	$23,372
Tax Revenue RAWD	As All Other	$174,309	$150,000	$150,000	$150,000	$150,000	$150,000	$150,000	$150,000	$150,000	$150,000	$150,000
County Interest	As All Other	$2,897	$2,600	$2,600	$2,600	$2,600	$2,600	$2,600	$2,600	$2,600	$2,600	$2,600
County Penalty	As All Other	$714	$1,000	$1,000	$1,000	$1,000	$1,000	$1,000	$1,000	$1,000	$1,000	$1,000
Administrative Revenue	Other Revenues	$26,165	$15,300	$15,300	$15,300	$15,300	$15,300	$15,300	$15,300	$15,300	$15,300	$15,300
Capacity Expansion Interest RAWD	As All Other	$12										
Capacity Expansion Revenue RAWD	As All Other	$1,549										
Sewer Liability to Water Enterprise	As All Other			$23,592	$23,592	$23,592	$23,592	$23,592	$23,592	$23,592	$23,592	$23,592
Total Other Revenue		$368,441	$297,463	$313,101	$313,251	$313,460	$314,736	$315,428	$314,536	$314,518	$314,775	$315,259
Total Revenue		**$896,912**	**$855,017**	**$965,161**	**$1,038,051**	**$1,111,857**	**$1,194,202**	**$1,284,194**	**$1,381,672**	**$1,468,638**	**$1,551,413**	**$1,615,546**

[1]Additional revenue based on recommended increase

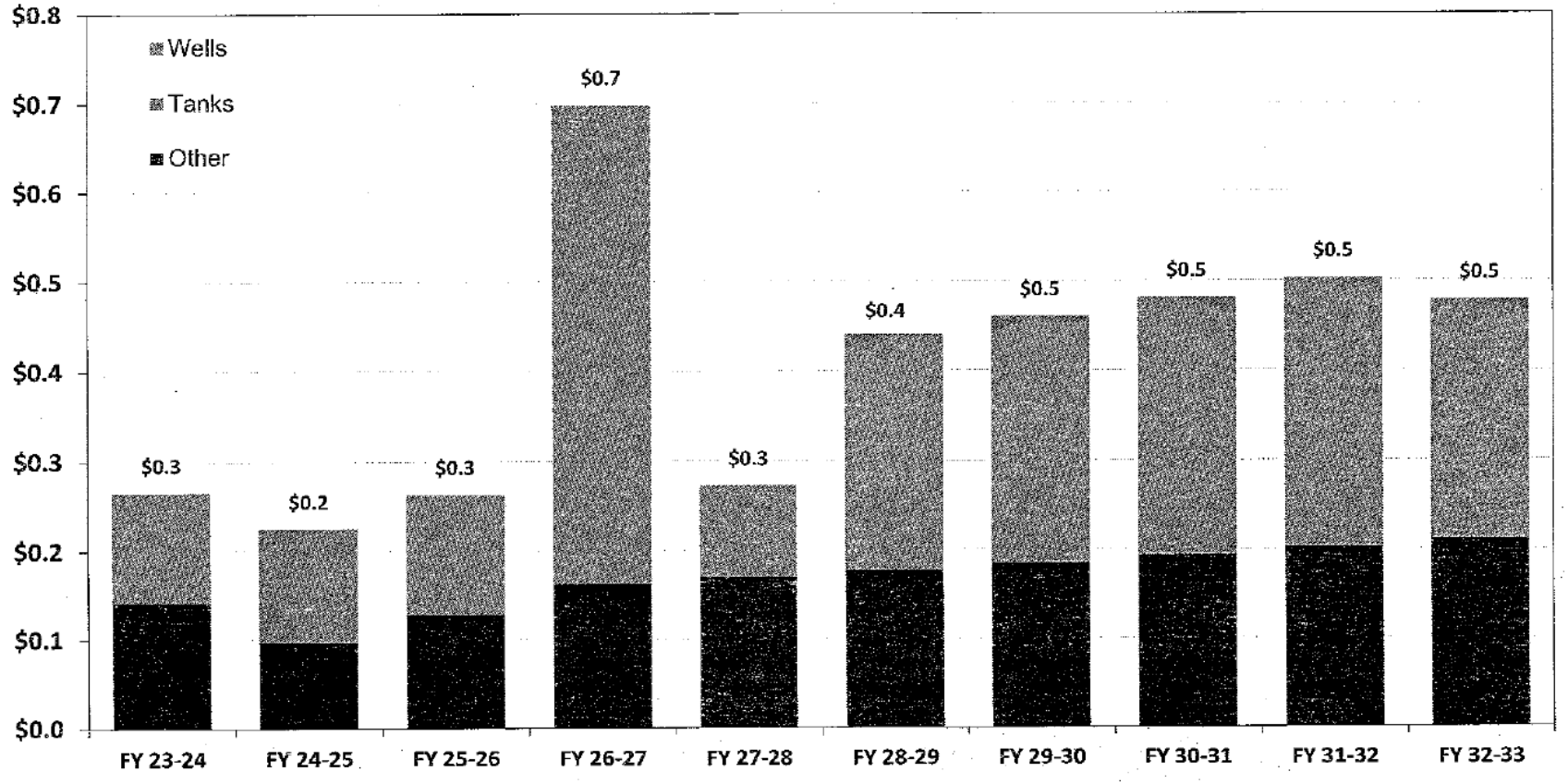
[2]Adjusted if rates adopted in the middle of fiscal year

Table 3
Rio Alto WD
Water Rate Study
Capital Improvement Costs

Project Description	FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28	FY 28-29	FY 29-30	FY 30-31	FY 31-32	FY 32-33
	Projected	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*
CIP (Current Dollars)											
Tanks (from Superior Tank):											
Tanks 1A & 2A		$123,722	$123,722	$123,722	$36,336	$36,336	$36,336	$36,336	$36,336	$36,336	$36,336
Tank 1B						$50,000	$50,000	$50,000	$50,000	$50,000	$18,500
Tank 2B							$125,000	$125,000	$125,000	$125,000	$125,000
Wells (Pump, Motor & Controls):											
Well 5 - 150 HP Submersible					$207,287						
Well 6 - 175 HP Submersible					$225,802						
Other:											
Roof	$21,000										
AC	$7,800										
Repair and Abandon 12" Line	$30,000	$120,000									
Fire Hydrants - 2 per year		$22,000	$22,000	$22,000	$22,000	$22,000	$22,000	$22,000	$22,000	$22,000	$22,000
Vehicles			$20,000	$20,000	$20,000	$20,000	$20,000	$20,000	$20,000	$20,000	$20,000
Line Replacement			$50,000	$75,000	$100,000	$100,000	$100,000	$100,000	$100,000	$100,000	$100,000
Total CIP (Current Dollars)	**$58,800**	**$265,722**	**$215,722**	**$240,722**	**$611,425**	**$228,336**	**$353,336**	**$353,336**	**$353,336**	**$353,336**	**$321,836**
CIP (Inflated Dollars)											
Total CIP (Inflated Dollars)	**$58,800**	**$265,722**	**$225,429**	**$262,874**	**$697,737**	**$272,295**	**$440,321**	**$460,135**	**$480,841**	**$502,479**	**$478,279**
Annual Inflation Rate			*4.5%*	*4.5%*	*4.5%*	*4.5%*	*4.5%*	*4.5%*	*4.5%*	*4.5%*	*4.5%*

Rio Alto Water District
Water Capital Improvements ($ millions)

Future $; includes annual construction cost inflation.



Source: District 2023 CIP plus annual construction cost inflation.

Table 4
Rio Alto WD
Water Rate Study
Debt

Debt	FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28	FY 28-29	FY 29-30	FY 30-31	FY 31-32	FY 32-33
	Actual	*Budgeted*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*
Existing Debt											
CEC Loan Payment Well #5	$25,378	$25,378	$25,378	$25,378	$25,378	$25,378	$25,378	$25,378	$25,378	$25,378	$25,378
CEC Loan Payment Well #6	$34,469	$34,469	$34,469	$34,469	$34,469	$34,469	$34,469	$34,469	$34,469	$34,469	$34,469
CEC Loan Interest Office	$10,461	$10,461	$10,461	$10,461	$10,461	$10,461	$10,461	$10,461	$10,461	$10,461	$10,461
CEC Loan Payments Office	$1,646	$1,646	$1,646	$1,646	$1,646	$1,646	$1,646	$1,646	$1,646	$1,646	$1,646
Total Current Debt Service	**$71,954**	**$71,954**	**$71,954**	**$71,954**	**$71,954**	**$71,954**	**$71,954**	**$71,954**	**$71,954**	**$71,954**	**$71,954**
Proposed Borrowing											
Net Proceeds Needed						$500,000					
Repayment Term (yrs)						30					
Interest Rate						5.0%					
Month of Issue						1					
Issuance Costs (% of Net Proceeds)											
Issuance Cost						$30,000					
Debt Service Reserve											
Total Debt Issue Size						$530,000					
Prorated Debt Service Payment - Current Yr. Only						$34,000					
Annual Debt Service Payment (rounded)						$34,000					
Total Proposed Annual Water Del	**$0**	**$0**	**$0**	**$0**	**$0**	**$34,000**	**$34,000**	**$34,000**	**$34,000**	**$34,000**	**$34,000**

Table 5
Rio Alto WD
Water Rate Study
Cash Flow Projections

Water Fund	FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28	FY 28-29	FY 29-30	FY 30-31	FY 31-32	FY 32-33
Rate Revenue Increase		**11.0%**	**11.0%**	**11.0%**	**10.0%**	**10.0%**	*10.0%*	*10.0%*	*8.0%*	*7.0%*	*5.0%*
Beginning Reserves	**$891,721**	**$1,048,042**	**$872,974**	**$832,601**	**$796,570**	**$865,417**	**$874,087**	**$722,660**	**$656,669**	**$616,314**	**$596,593**
Revenues											
Rate Revenue	$528,471	$528,487	$587,442	$652,973	$725,815	$799,515	$880,697	$970,123	$1,068,630	$1,155,736	$1,238,369
Rate Increase Revenue	0	58,134	64,619	71,827	72,582	79,951	88,070	97,012	85,490	80,902	61,918
Timing Adjustment*		-29,067									
Other Revenue	368,441	297,463	313,101	313,251	313,460	314,736	315,428	314,536	314,518	314,775	315,259
Total Revenue	**$896,912**	**$855,017**	**$965,161**	**$1,038,051**	**$1,111,857**	**$1,194,202**	**$1,284,194**	**$1,381,672**	**$1,468,638**	**$1,551,413**	**$1,615,546**
Expenses											
Operating Expenses	$609,837	$692,408	$708,151	$739,254	$773,319	$807,283	$889,346	$881,574	$922,197	$962,700	$1,007,062
Existing Debt Service	71,954	71,954	71,954	71,954	71,954	71,954	71,954	71,954	71,954	71,954	71,954
New Debt Service	0	0	0	0	0	34,000	34,000	34,000	34,000	34,000	34,000
Rate Funded Capital	$58,800	$265,722	$225,429	$262,874	$197,737	$272,295	$440,321	$460,135	$480,841	$502,479	$478,279
Total Expenses	**$740,591**	**$1,030,084**	**$1,005,534**	**$1,074,082**	**$1,043,010**	**$1,185,532**	**$1,435,621**	**$1,447,663**	**$1,508,992**	**$1,571,133**	**$1,591,295**
Net Revenues	**$156,321**	**-$175,067**	**-$40,373**	**-$36,031**	**$68,847**	**$8,670**	**-$151,426**	**-$65,992**	**-$40,355**	**-$19,721**	**$24,251**
Ending Reserves	**$1,048,042**	**$872,974**	**$832,601**	**$796,570**	**$865,417**	**$874,087**	**$722,660**	**$656,669**	**$616,314**	**$596,593**	**$620,844**
Debt Coverage	3.99	2.26	3.57	4.15	4.70	3.65	3.73	4.72	5.16	5.56	5.74

*Reflects January rate implementation

Capital Funding	FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28	FY 28-29	FY 29-30	FY 30-31	FY 31-32	FY 32-33
Capital Revenues											
Use of Debt Proceeds					$500,000						
Rate Funded Capital	$58,800	$265,722	$225,429	$262,874	$197,737	$272,295	$440,321	$460,135	$480,841	$502,479	$478,279
Total Capital Revenue	**$58,800**	**$265,722**	**$225,429**	**$262,874**	**$697,737**	**$272,295**	**$440,321**	**$460,135**	**$480,841**	**$502,479**	**$478,279**
Total Capital Expenditures	**$58,800**	**$265,722**	**$225,429**	**$262,874**	**$697,737**	**$272,295**	**$440,321**	**$460,135**	**$480,841**	**$502,479**	**$478,279**

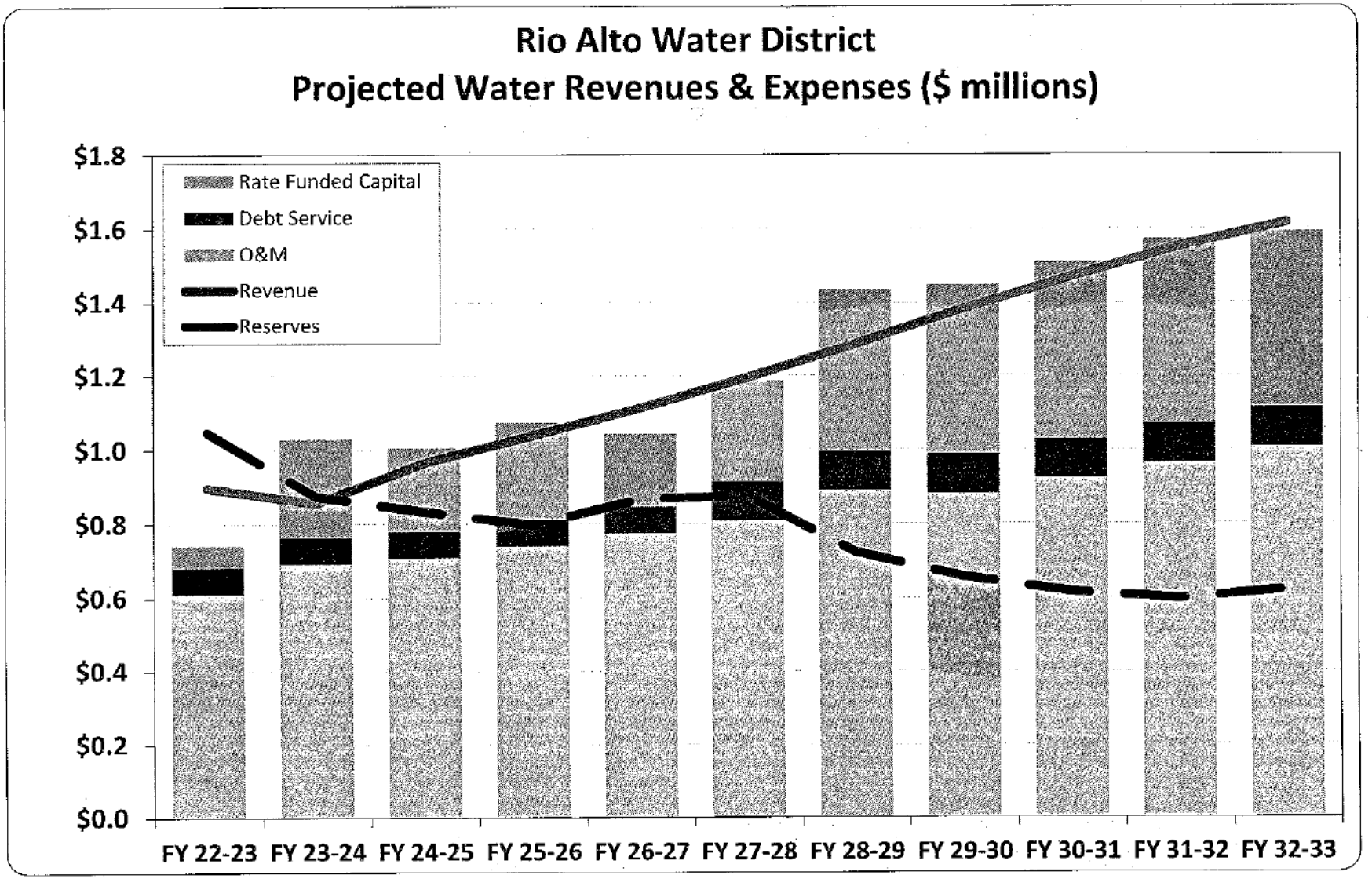

Rio Alto Water District
Projected Water Revenues & Expenses ($ millions)
$1.8
$1.6
$1.4
$1.2
$1.0
$0.8
$0.6
$0.4
$0.2
$0.0
Rate Funded Capital
Debt Service
O&M
Revenue
Reserves
FY 22-23
FY 23-24
FY 24-25
FY 25-26
FY 26-27
FY 27-28
FY 28-29
FY 29-30
FY 30-31
FY 31-32
FY 32-33

Table 6
Rio Alto WD
Water Rate Study
Customer Data

Customer Data	FY 17-18	FY 18-19	FY 19-20	FY 20-21	FY 21-22	FY 22-23	FY 23-24
	Actual	*Actual*	*Actual*	*Actual*	*Actual*	*Actual*	*Projected*
Total Water Production (CCF)	254,283	248,214	268,254	271,507	246,452	227,070	227,070
Billed, Metered Consumption (CCF)	231,695	225,599	250,999	247,510	232,326	210,642	210,642
Water Loss (%)	8.9%	9.1%	6.4%	8.8%	5.7%	7.8%	7.8%
Total Accounts (#)	1,322	1,340	1,365		1,412	1,412	1,412
Growth (%)		1.36%	1.87%	1.76%	1.66%	0.00%	0.00%
Annual Metered Use (CCF) per Account	175	168	184	178	165	165	165

Table 7
Rio Alto WD
Water Rate Study
Meter Equivalent Units

Meter Size	Services	Meter Equivalent Ratio**	Meter Equivalent Units (MEUs)
3/4"	1,226	1.0	1,226.0
1"	180	1.7	300.6
2"	6	5.3	32.0
Total	**1,412.0**		**1,558.6**

* Customer data as of June 2023 provided by staff

** Capacity factors based on AWWA operating capacity standards by meter size

Table 8
Rio Alto WD
Water Rate Study
Functional Allocation

Projected 5-Year Average

Functional Allocation	Amount	Offsetting Revenue	Allocation Amount	Customer	Capacity	All Volume	Total
Administration	$531,066	$83,997	$447,069	55%	25%	20%	100%
Source of Supply	$107,749	$0	$107,749		30%	70%	100%
Transmission & Distribution	$141,933	$0	$141,933			100%	100%
Debt Service	$71,954	$0	$71,954		50%	50%	100%
Capital	$244,812	$11,318	$233,493		60%	40%	100%
Functional Allocation $	$1,097,514	$95,315	$1,002,199	$245,888	$320,165	$436,146	$1,002,199
Functional Allocation %				24.53%	31.95%	43.52%	100%
FY 23/24 Revenue Requirement				**$143,898**	**$187,425**	**$255,297**	**$586,621**

Table 9
Rio Alto WD
Water Rate Study

Volumetric Charge Calculation

Allocation Units	All Volume
Unit of Measure	*CCF*
Total Water Use CCF	210,642
Revenue Requirement	$255,297
Unit Cost ($/Unit)	**$1.21**

Bi-Monthly Fixed Charge Calculation

Allocation Units	Customer	Capacity
Unit of Measure	*Customers*	*MEUs*
Allocation Units	8,472	9,351
Revenue Requirement	$143,898	$187,425
Unit Cost ($/Unit)	$16.99	$20.04

Meter	Capacity Factor**	Bi-Monthly Capacity Component	Bi-Monthly Capacity Component	Bi-Monthly Fixed Charge
3/4"	1.00	$16.99	$20.04	**$37.03**
1"	1.67	$16.99	$33.47	**$50.46**
2"	5.33	$16.99	$106.83	**$123.81**

Table 10
Rio Alto WD
Water Rate Study
Water Rate Schedule

Current and Proposed Water Rates	Existing FY 22-23	Proposed Mar 1, 2024	Proposed Jul 1, 2024	Proposed Jul 1, 2025	Proposed Jul 1, 2026	Proposed Jul 1, 2027
Volumetric Rates ($/CCF)						
Base Use (0-15 CCF)	$0.00					
Volumetric (>15 CCF)	$1.30					
Uniform Rate (All CCF)		$1.21	$1.35	$1.50	$1.65	$1.82
Bi-Monthly Fixed Charge						
Meter Size						
3/4"	$42.87	$37.03	$41.10	$45.62	$50.18	$55.20
1"	$58.45	$50.46	$56.01	$62.17	$68.39	$75.23
2"	$144.15	$123.81	$137.43	$152.55	$167.81	$184.59

APPENDIX B

Wastewater Rate Study Tables

Rio Alto Water District
Draft Sewer Rate Study Tables

November 21, 2023

BARTLE WELLS ASSOCIATES
Independent Public Finance Advisors

Table A
Rio Alto WD
Sewer Rate Study
Sewer Rate Schedule

Existing and Proposed Sewer Rates	Existing FY 22-23	Proposed Mar 1, 2024	Proposed Jul 1, 2024	Proposed Jul 1, 2025	Proposed Jul 1, 2026	Proposed Jul 1, 2027
Bi-Monthly Fixed Charges						
Single Family Resid.	$89.18	$102.68	$115.52	$127.07	$139.78	$153.76
1/2 single Fam Resid.	$44.59	$51.34	$57.76	$63.54	$69.89	$76.88
TriPlex sewer	$267.56	$308.08	$346.59	$381.25	$419.38	$461.32
Duplex Sewer	$178.37	$205.38	$231.05	$254.16	$279.58	$307.54
Sewer Extention	$105.26	$102.68	$115.52	$127.07	$139.78	$153.76
Low Pressure	$105.26	$130.14	$146.41	$161.05	$177.16	$194.88
Low Pressure Duplex	$210.52	$260.28	$292.82	$322.10	$354.31	$389.74
Commercial	$202.46	$233.06	$262.19	$288.41	$317.25	$348.98
Volumetric Charges						
Commercial	$0.55	$0.65	$0.73	$0.80	$0.88	$0.97

Table 1
Rio Alto WD
Sewer Rate Study
Projected Operating Expenses

Expenses[1]		FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28	FY 28-29	FY 29-30	FY 30-31	FY 31-32	FY 32-33
		Actual	*Budgeted*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*
General Inflation Factor				4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%
Systems Operator II	Treatment	64,294	30,318	$31,682	$33,108	$34,598	$36,155	$37,782	$39,482	$41,259	$43,115	$45,055
Regulatory Officer	Treatment	23,158	20,638	$21,567	$22,537	$23,551	$24,611	$25,719	$26,876	$28,085	$29,349	$30,670
Sys Operator III	Treatment	16,088	15,802	$16,513	$17,256	$18,033	$18,844	$19,692	$20,578	$21,504	$22,472	$23,483
Part Time Employee	Treatment	555	2,700	$2,822	$2,948	$3,081	$3,220	$3,365	$3,516	$3,674	$3,840	$4,012
Auto Fuel	Treatment	3,874	2,150	$2,247	$2,348	$2,454	$2,564	$2,679	$2,800	$2,926	$3,058	$3,195
Auto Maintenance	Treatment	1,525	800	$836	$874	$913	$954	$997	$1,042	$1,089	$1,138	$1,189
Auto Repair	Treatment	438	350	$366	$382	$399	$417	$436	$456	$476	$498	$520
Wetlands Utility	Treatment	$113	$60	$63	$66	$68	$72	$75	$78	$82	$85	$89
WWTP Utility	Treatment	9,213	10,000	$10,450	$10,920	$11,412	$11,925	$12,462	$13,023	$13,609	$14,221	$14,861
General Supplies	Treatment	775	600	$627	$655	$685	$716	$748	$781	$817	$853	$892
Tools	Treatment	$69	100	$105	$109	$114	$119	$125	$130	$136	$142	$149
Chlorine/Bisulfite	Treatment	46,212	50,000	$55,000	$60,000	$62,700	$10,000	$10,450	$10,920	$11,412	$11,925	$12,462
Bacti Lab Supplies/Equipment	Treatment	5,950	6,400	$6,688	$6,989	$7,303	$7,632	$7,976	$8,334	$8,710	$9,101	$9,511
Plant Lab Supplies	Treatment	303	500	$523	$546	$571	$596	$623	$651	$680	$711	$743
Plant Lab Equipment Repair	Treatment		2,000	$2,090	$2,184	$2,282	$2,385	$2,492	$2,605	$2,722	$2,844	$2,972
Plant Lab Equipment Maintenance	Treatment	158	500	$523	$546	$571	$596	$623	$651	$680	$711	$743
Contracted Services	Treatment	1,057	1,000	$1,045	$1,092	$1,141	$1,193	$1,246	$1,302	$1,361	$1,422	$1,486
Sludge Disposal	Treatment	5,965	6,000	$6,270	$6,552	$6,847	$7,155	$7,477	$7,814	$8,165	$8,533	$8,917
Equipment Maintenance	Treatment	507	1,000	$1,045	$1,092	$1,141	$1,193	$1,246	$1,302	$1,361	$1,422	$1,486
Safety Supplies & Equipment	Treatment	831	1,000	$1,045	$1,092	$1,141	$1,193	$1,246	$1,302	$1,361	$1,422	$1,486
Equipment Repair	Treatment	4,770	5,000	$5,225	$5,460	$5,706	$5,963	$6,231	$6,511	$6,804	$7,111	$7,430
Plant Maintenance	Treatment	236	2,000	$2,090	$2,184	$2,282	$2,385	$2,492	$2,605	$2,722	$2,844	$2,972
Wetlands Maintenance	Treatment	8,699	8,300	$8,674	$9,064	$9,472	$9,898	$10,343	$10,809	$11,295	$11,803	$12,335
Wetlands Security	Treatment	7,609	400	$418	$437	$456	$477	$498	$521	$544	$569	$594
Plant Repair	Treatment	2,286	3,000	$3,135	$3,276	$3,423	$3,578	$3,739	$3,907	$4,083	$4,266	$4,458
Waste Water Permit Testing	Treatment	9,116	10,000	$10,450	$10,920	$11,412	$11,925	$12,462	$13,023	$13,609	$14,221	$14,861
Telemetry System	Treatment	734	800	$836	$874	$913	$954	$997	$1,042	$1,089	$1,138	$1,189
Regulatory Officer	Collection System	7,637	20,639	$21,568	$22,538	$23,553	$24,612	$25,720	$26,877	$28,087	$29,351	$30,672
Sys Operator II	Collection System	13,502	32,000	$33,440	$34,945	$36,517	$38,161	$39,878	$41,672	$43,548	$45,507	$47,555
Sys Operator III	Collection System	15,586	18,963	$19,816	$20,708	$21,640	$22,614	$23,631	$24,695	$25,806	$26,967	$28,181
Part Time Employee	Collection System	540	2,700	$2,822	$2,948	$3,081	$3,220	$3,365	$3,516	$3,674	$3,840	$4,012
Auto Fuel	Collection System	3,874	2,150	$2,247	$2,348	$2,454	$2,564	$2,679	$2,800	$2,926	$3,058	$3,195
Auto Maintenance	Collection System	1,486	800	$836	$874	$913	$954	$997	$1,042	$1,089	$1,138	$1,189
Auto Repair	Collection System	620	350	$366	$382	$399	$417	$436	$456	$476	$498	$520
Lift Stations #3,4,5,6,7 Utility	Collection System	3,444	3,500	$3,658	$3,822	$3,994	$4,174	$4,362	$4,558	$4,763	$4,977	$5,201
Lift Station #2 Utility	Collection System	3,672	3,500	$3,658	$3,822	$3,994	$4,174	$4,362	$4,558	$4,763	$4,977	$5,201
Lift Station #1 Utility	Collection System	12,528	10,000	$10,450	$10,920	$11,412	$11,925	$12,462	$13,023	$13,609	$14,221	$14,861
General Supplies	Collection System	1,631	1,000	$1,045	$1,092	$1,141	$1,193	$1,246	$1,302	$1,361	$1,422	$1,486
Tools	Collection System	1,750	250	$261	$273	$285	$298	$312	$326	$340	$356	$372
Safety Equip Repair	Collection System			$0	$0	$0	$0	$0	$0	$0	$0	$0

Table 1
Rio Alto WD
Sewer Rate Study
Projected Operating Expenses

Expenses[1]		FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28	FY 28-29	FY 29-30	FY 30-31	FY 31-32	FY 32-33
		Actual	*Budgeted*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*
General Inflation Factor				4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%
Telemetry System	Collection System	760	750	$784	$819	$856	$894	$935	$977	$1,021	$1,067	$1,115
Equipment Maintenance	Collection System	263	1,000	$1,045	$1,092	$1,141	$1,193	$1,246	$1,302	$1,361	$1,422	$1,486
Equipment Repair	Collection System	619	1,500	$1,568	$1,638	$1,712	$1,789	$1,869	$1,953	$2,041	$2,133	$2,229
Contracted Services	Collection System	11,600	500	$523	$546	$571	$596	$623	$651	$680	$711	$743
Lift Station Maintenance	Collection System	391	1,000	$1,045	$1,092	$1,141	$1,193	$1,246	$1,302	$1,361	$1,422	$1,486
Lift Station Repair	Collection System	4,997	5,000	$5,225	$5,460	$5,706	$5,963	$6,231	$6,511	$6,804	$7,111	$7,430
Sewer Line Maintenance	Collection System	486	1,000	$1,045	$1,092	$1,141	$1,193	$1,246	$1,302	$1,361	$1,422	$1,486
Sewer Line Repair	Collection System	1,880	3,000	$3,135	$3,276	$3,423	$3,578	$3,739	$3,907	$4,083	$4,266	$4,458
General Manager	Administration	49,412	49,576	$51,807	$54,138	$56,574	$59,120	$61,781	$64,561	$67,466	$70,502	$73,675
Regulatory Officer	Administration	7,245	9,326	$9,746	$10,184	$10,643	$11,121	$11,622	$12,145	$12,691	$13,263	$13,859
Operations Supervisor	Administration		0	$0	$0	$0	$0	$0	$0	$0	$0	$0
Systems Operator II	Administration	88	1,899	$1,984	$2,074	$2,167	$2,265	$2,366	$2,473	$2,584	$2,701	$2,822
Sys Operator III	Administration	211	790	$826	$863	$902	$942	$984	$1,029	$1,075	$1,123	$1,174
Secretary	Administration	20,528	19,656	$20,541	$21,465	$22,431	$23,440	$24,495	$25,597	$26,749	$27,953	$29,211
Bookkeeper	Administration	21,428	25,113	$26,243	$27,424	$28,658	$29,948	$31,295	$32,704	$34,175	$35,713	$37,320
PERS Employer Unfunded Liability	Administration	46,585	42,285	$44,188	$46,176	$48,254	$50,426	$52,695	$55,066	$57,544	$60,134	$62,840
Workers Comp Insurance	Administration	3,759	3,924	$4,101	$4,285	$4,478	$4,679	$4,890	$5,110	$5,340	$5,580	$5,831
FICA	Administration	19,106	20,399	$21,317	$22,276	$23,279	$24,326	$25,421	$26,565	$27,760	$29,009	$30,315
PERS Retirement	Administration	20,622	23,460	$24,516	$25,619	$26,772	$27,976	$29,235	$30,551	$31,926	$33,362	$34,864
Health Insurance ACWA	Administration	37,295	33,612	$35,125	$36,705	$38,357	$40,083	$41,887	$43,772	$45,741	$47,800	$49,951
SUI	Administration	2,013	1,632	$1,705	$1,782	$1,862	$1,946	$2,034	$2,125	$2,221	$2,321	$2,425
Dental/Vision Insurance	Administration	3,523	3,108	$3,248	$3,394	$3,547	$3,706	$3,873	$4,047	$4,230	$4,420	$4,619
Life Insurance	Administration	817	712	$744	$778	$813	$849	$887	$927	$969	$1,013	$1,058
Retiree Health Benefits	Administration	10,391	12,396	$12,954	$13,537	$14,146	$14,782	$15,448	$16,143	$16,869	$17,628	$18,422
Cell Phone Allowance	Administration	389	346	$362	$378	$395	$413	$431	$451	$471	$492	$514
PEPRA Employer Contributions	Administration	8,330	9,892	$10,337	$10,802	$11,288	$11,796	$12,327	$12,882	$13,462	$14,067	$14,700
PEPRA Employer Unfunded Liability	Administration	852	0	$0	$0	$0	$0	$0	$0	$0	$0	$0
Alarm System Monitoring	Administration	140	336	$351	$367	$383	$401	$419	$438	$457	$478	$499
Supplies	Administration	3,044	3,000	$3,135	$3,276	$3,423	$3,578	$3,739	$3,907	$4,083	$4,266	$4,458
Postage	Administration	3,233	3,114	$3,254	$3,401	$3,554	$3,714	$3,881	$4,055	$4,238	$4,428	$4,628
Printing	Administration	651	597	$624	$652	$681	$712	$744	$777	$812	$849	$887
Employee Travel/Expenses	Administration	1,832	2,000	$2,090	$2,184	$2,282	$2,385	$2,492	$2,605	$2,722	$2,844	$2,972
Employee Meeting/Conferences	Administration	578	1,000	$1,045	$1,092	$1,141	$1,193	$1,246	$1,302	$1,361	$1,422	$1,486
Education	Administration	800	400	$418	$437	$456	$477	$498	$521	$544	$569	$594
Certificate Renewal	Administration	390	390	$408	$426	$445	$465	$486	$508	$531	$555	$580
Public Relations	Administration	515	600	$627	$655	$685	$716	$748	$781	$817	$853	$892
District Uniforms	Administration	634	640	$669	$699	$730	$763	$798	$833	$871	$910	$951
Membership/Subscription	Administration	720	525	$549	$573	$599	$626	$654	$684	$714	$747	$780
Banking/Court Costs	Administration	1,146	1,800	$1,881	$1,966	$2,054	$2,147	$2,243	$2,344	$2,450	$2,560	$2,675
Advertising & Website	Administration	182	200	$209	$218	$228	$239	$249	$260	$272	$284	$297

Table 1
Rio Alto WD
Sewer Rate Study
Projected Operating Expenses

Expenses[1]		FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28	FY 28-29	FY 29-30	FY 30-31	FY 31-32	FY 32-33
		Actual	*Budgeted*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*
General Inflation Factor				4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%	4.5%
Insurance	Administration	16,789	19,140	$20,001	$20,901	$21,842	$22,825	$23,852	$24,925	$26,047	$27,219	$28,444
Propane - Fat Cat	Administration	87	125	$131	$137	$143	$149	$156	$163	$170	$178	$186
Equipment Lease	Administration	2,558	3,538	$3,697	$3,864	$4,037	$4,219	$4,409	$4,607	$4,815	$5,031	$5,258
Misc. Office Equip. Expense	Administration	1,977	600	$627	$655	$685	$716	$748	$781	$817	$853	$892
Office Equipment Maintenance	Administration	-	200	$209	$218	$228	$239	$249	$260	$272	$284	$297
Office Building Maintenance	Administration	529	640	$669	$699	$730	$763	$798	$833	$871	$910	$951
Safety Supplies	Administration	290	500	$523	$546	$571	$596	$623	$651	$680	$711	$743
Contracted Services	Administration	2,275	2,514	$2,627	$2,745	$2,869	$2,998	$3,133	$3,274	$3,421	$3,575	$3,736
Engineering	Administration	-	5,000	$5,225	$5,460	$5,706	$5,963	$6,231	$6,511	$6,804	$7,111	$7,430
Lot Selling Expense	Administration	-	100	$105	$109	$114	$119	$125	$130	$136	$142	$149
Office Utility	Administration	13	60	$63	$66	$68	$72	$75	$78	$82	$85	$89
Telephone	Administration	819	821	$858	$897	$937	$979	$1,023	$1,069	$1,117	$1,168	$1,220
Service Fee - State	Administration	36,201	39,821	$41,613	$43,486	$45,442	$47,487	$49,624	$51,857	$54,191	$56,629	$59,178
Service Fee - County	Administration	2,489	2,600	$2,717	$2,839	$2,967	$3,101	$3,240	$3,386	$3,538	$3,697	$3,864
Service Fee - Federal SSA	Administration	-	100	$105	$109	$114	$119	$125	$130	$136	$142	$149
Auditor	Administration	5,390	5,600	$5,852	$6,115	$6,391	$6,678	$6,979	$7,293	$7,621	$7,964	$8,322
Legal Counsel	Administration	1,753	1,600	$1,672	$1,747	$1,826	$1,908	$1,994	$2,084	$2,177	$2,275	$2,378
Board Meeting Supplies	Administration	149	150	$157	$164	$171	$179	$187	$195	$204	$213	$223
Director Fees	Administration	2,640	3,360	$3,511	$3,669	$3,834	$4,007	$4,187	$4,376	$4,572	$4,778	$4,993
Directors Travel/Conferences	Administration	3,297	4,500	$4,703	$4,914	$5,135	$5,366	$5,608	$5,860	$6,124	$6,399	$6,687
Sewer Rate Study	Administration	-	14,000					$17,447				
Asset Evaluation Consultant	Administration	-	10,000					$12,462				
Director Election (non-election yr.)	Administration	1,558	400		$437		$477		$521		$569	
Director Election (election yr.)	Administration			$1,672		$1,826		$1,994		$2,177		$2,378
Computer/Software Upgrades & Su	Administration	3,767	4,148	$4,335	$4,530	$4,734	$4,947	$5,169	$5,402	$5,645	$5,899	$6,164
Computer Software Update	Administration	-	0	$0	$0	$0	$0	$0	$0	$0	$0	$0
Liability to Water Enterprise	Administration			$23,592	$23,592	$23,592	$23,592	$23,592	$23,592	$23,592	$23,592	$23,592
OPEB Liability	Administration			$10,000	$10,450	$10,920	$11,412	$11,925	$12,462	$13,023	$13,609	$14,221
Computer Upgrades	Administration			$4,000	$4,180	$4,368	$4,565	$4,770	$4,985	$5,209	$5,443	$5,688
GASB OPEB Evaluations (total eval)	Administration		1,000		$1,092		$1,193		$1,302		$1,422	
GASB OPEB Evaluations (disclosure)	Administration			$209		$228		$249		$272		$297
OPEB Contributions (CERBT Trust)	Administration	200		$0	$0	$0	$0	$0	$0	$0	$0	$0
Total Operating Expenses		**$651,041**	**$684,265**	**$730,737**	**$764,647**	**$798,451**	**$777,321**	**$841,645**	**$846,683**	**$884,266**	**$922,427**	**$963,470**

[1] Based on District's FY 23-24 budget with minor modifications reflecting the updated capital spending projections

Table 2
Rio Alto WD
Sewer Rate Study
Projected Revenues

Revenue	Category	Escalation	FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28	FY 28-29	FY 29-30	FY 30-31	FY 31-32	FY 32-33
			Actual	*Budgeted*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*
Revenue Assumptions													
Customer Growth		Growth			0.22%	0.22%	0.22%	0.22%	0.22%	0.22%	0.22%	0.22%	0.22%
Cell Tower		Cell			3.00%	3.00%	3.00%	3.00%	3.00%	3.00%	3.00%	3.00%	3.00%
Interest Rate on Reserves		Interest			1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	0%
Rate Revenue													
Rate Revenue Before Increase		Growth	$504,391	$503,832	$580,681	$654,544	$721,310	$794,756	$875,550	$955,731	$1,043,131	$1,091,914	$1,142,895
Revenue from Rate Increase[1,2]				$37,787	$72,426	$65,183	$71,702	$78,872	$78,083	$85,110	$46,385	$48,473	$50,654
Total Rate Revenue			$504,391	$541,619	$653,107	$719,727	$793,012	$873,628	$953,633	$1,040,842	$1,089,517	$1,140,386	$1,193,549
Other Revenue													
Avail Sewer Revenue	As All Other	None	$49,672	$47,712	$47,712	$47,712	$47,712	$47,712	$47,712	$47,712	$47,712	$47,712	$47,712
Cell Tower Lease Revenue	As All Other	Cell	$10,200	$13,950	$18,450	$19,004	$19,574	$20,161	$20,766	$21,389	$22,030	$22,691	$23,372
Sewer Interest Revenue	As All Other	Interest	$7,249	$3,100	$2,720	$3,149	$3,270	$3,634	$4,662	$4,693	$4,690	$4,540	$4,676
Connections Sewer Revenue	Capital	None	$18,152	$13,634	$9,076	$9,076	$9,076	$9,076	$9,076	$9,076	$9,076	$9,076	$9,076
Tax Revenue RAID	As All Other	None	$87,106	$75,000	$75,000	$75,000	$75,000	$75,000	$75,000	$75,000	$75,000	$75,000	$75,000
Interest Revenue RAID	As All Other	None	$1,932		$0	$0	$0	$0	$0	$0	$0	$0	$0
County Penalty/Interest	As All Other	None	$476	$700	$700	$700	$700	$700	$700	$700	$700	$700	$700
Administrative Revenue	Administration	None	$14,382	$13,200	$13,200	$13,200	$13,200	$13,200	$13,200	$13,200	$13,200	$13,200	$13,200
Capacity Expansion Interest RAID	As All Other	None	$17		$0	$0	$0	$0	$0	$0	$0	$0	$0
LAIF Capacity Expansion Interest	Other Revenues	None	$2,889	$2,000	$2,000	$2,000	$2,000	$2,000	$2,000	$2,000	$2,000	$2,000	$2,000
Capacity Expansion Revenue RAID	As All Other	None	$1,943										
Total Other Revenue			$193,968	$169,276	$168,858	$169,841	$170,532	$171,483	$173,116	$173,770	$174,408	$174,919	$175,735
Total Revenue			$698,359	$710,895	$821,965	$889,567	$963,544	$1,045,111	$1,126,749	$1,214,611	$1,263,925	$1,315,305	$1,369,284

[1]Additional revenue based on recommended increase

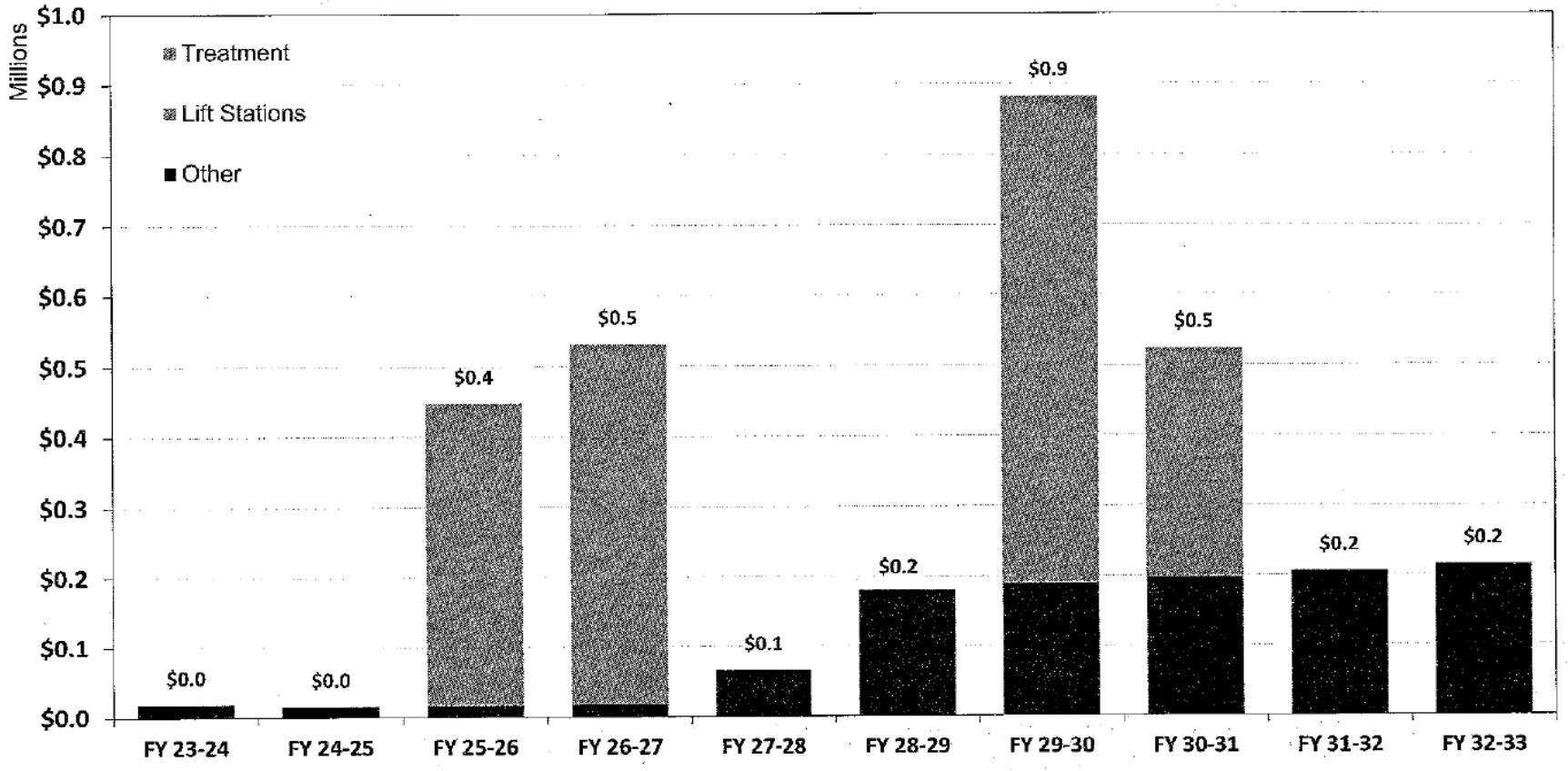
[2]Adjusted if rates adopted in the middle of fiscal year

Table 3
Rio Alto WD
Sewer Rate Study
Capital Improvement Costs

Project Description	FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28	FY 28-29	FY 29-30	FY 30-31	FY 31-32	FY 32-33
	Projected	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*	*Projected*
CIP (Current Dollars)											
Onsite Hypo Generation at WWTP					238,805						
Replace Oxidation Ditch Aeration System								532,500			
Replace Muffin Monster w/ Multi-rake Bar Screen				395,000							
Lift Station 1					91,500						
Lift Station 2					60,000						
Lift Station 3					60,000						
Lift Station 4									60,000		
Lift Station 5									60,000		
Lift Station 6									60,000		
Lift Station 7									60,000		
Office AC		5,200									
Office Roof		14,000									
Annual Allowance for Wastewater Treatment Replacement							50,000	50,000	50,000	50,000	50,000
Pipeline Replacement						40,000	80,000	80,000	80,000	80,000	80,000
Vehicle Replacement			15,000	15,000	15,000	15,000	15,000	15,000	15,000	15,000	15,000
Total CIP (Current Dollars)	**$0**	**$19,200**	**$15,000**	**$410,000**	**$465,305**	**$55,000**	**$145,000**	**$677,500**	**$385,000**	**$145,000**	**$145,000**
CIP (Inflated Dollars)											
Jan-00	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0
Onsite Hypo Generation at WWTP	$0	$0	$0	$0	$272,516	$0	$0	$0	$0	$0	$0
Replace Oxidation Ditch Aeration Syster	$0	$0	$0	$0	$0	$0	$0	$693,454	$0	$0	$0
Replace Muffin Monster w/ Multi-rake I	$0	$0	$0	$431,350	$0	$0	$0	$0	$0	$0	$0
Lift Station 1	$0	$0	$0	$0	$104,417	$0	$0	$0	$0	$0	$0
Lift Station 2	$0	$0	$0	$0	$68,470	$0	$0	$0	$0	$0	$0
Lift Station 3	$0	$0	$0	$0	$68,470	$0	$0	$0	$0	$0	$0
Lift Station 4	$0	$0	$0	$0	$0	$0	$0	$0	$81,652	$0	$0
Lift Station 5	$0	$0	$0	$0	$0	$0	$0	$0	$81,652	$0	$0
Lift Station 6	$0	$0	$0	$0	$0	$0	$0	$0	$81,652	$0	$0
Lift Station 7	$0	$0	$0	$0	$0	$0	$0	$0	$81,652	$0	$0
-	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0
Office AC	$0	$5,200	$0	$0	$0	$0	$0	$0	$0	$0	$0
Office Roof	$0	$14,000	$0	$0	$0	$0	$0	$0	$0	$0	$0
Annual Allowance for Wastewater Treat	$0	$0	$0	$0	$0	$0	$62,309	$65,113	$68,043	$71,105	$74,305
Pipeline Replacement	$0	$0	$0	$0	$0	$47,701	$99,695	$104,181	$108,869	$113,768	$118,888
Vehicle Replacement	$0	$0	$15,675	$16,380	$17,117	$17,888	$18,693	$19,534	$20,413	$21,332	$22,291
Jan-00	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0
Total CIP (Inflated Dollars)	**$0**	**$19,200**	**$15,675**	**$447,730**	**$530,990**	**$65,589**	**$180,696**	**$882,281**	**$523,932**	**$206,205**	**$215,484**
Annual Inflation Rate			*4.5%*	*4.5%*	*4.5%*	*4.5%*	*4.5%*	*4.5%*	*4.5%*	*4.5%*	*4.5%*

Rio Alto Water District
Sewer Capital Improvements ($ thousands)

Future $; includes annual construction cost inflation.



Source: District CIP plus annual construction cost inflation.

Table 4
Rio Alto WD
Sewer Rate Study
Debt

Debt	FY 21-22 *Actual*	FY 22-23 *Budgeted*	FY 23-24 *Budgeted*	FY 24-25 *Projected*	FY 25-26 *Projected*	FY 26-27 *Projected*	FY 27-28 *Projected*	FY 28-29 *Projected*	FY 29-30 *Projected*	FY 30-31 *Projected*	FY 31-32 *Projected*	FY 32-33 *Projected*
Existing Debt												
WWTP CEC Loan Payments	$18,055	$25,378	$25,431	$25,431	$25,431	$25,431	$25,431	$25,431	$25,431	$25,431	$25,431	$25,431
CEC Loan Payments	$1,171	$1,646	$1,608	$1,608	$1,608	$1,608	$1,608	$1,608	$1,608	$1,608	$1,608	$1,608
CEC Interest Payments	$4,773	$4,597	$4,338	$4,338	$4,338	$4,338	$4,338	$4,338	$4,338	$4,338	$4,338	$4,338
Total Current Debt Service	**$23,999**	**$31,621**	**$31,377**	**$31,377**	**$31,377**	**$31,377**	**$31,377**	**$31,377**	**$31,377**	**$31,377**	**$31,377**	**$31,377**
Proposed Borrowing												
Net Proceeds Needed					$900,000				$950,000			
Repayment Term (yrs)					30				30			
Interest Rate					5.0%				5.0%			
Month of Issue					1				1			
Issuance Cost					$50,000				$50,000			
Total Debt Issue Size					$950,000				$1,000,000			
Prorated Debt Service Payment - Current Yr. Only					$31,000				$32,500			
Annual Debt Service Payment (rounded)					$62,000				$65,000			
Total Proposed Annual Water Debt Ser	**$0**	**$0**	**$0**	**$0**	**$31,000**	**$62,000**	**$62,000**	**$62,000**	**$94,500**	**$127,000**	**$127,000**	**$127,000**

Table 5
Rio Alto WD
Sewer Rate Study
Cash Flow Projections

Sewer Fund	FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28	FY 28-29	FY 29-30	FY 30-31	FY 31-32	FY 32-33
Rate Revenue Increase		15.0%	12.5%	10.0%	10.0%	10.0%	*9.0%*	*9.0%*	*4.5%*	*4.5%*	*4.5%*
Beginning Reserves	$280,267	$295,964	$272,016	$314,918	$327,019	$363,450	**$466,235**	**$469,304**	**$469,014**	**$454,015**	**$467,566**
Revenues											
Rate Revenue	$504,391	$503,832	$579,406	$651,832	$717,015	$788,717	$867,589	$945,672	$1,030,782	$1,077,167	$1,125,640
Rate Increase Revenue	0	75,575	72,426	65,183	71,702	78,872	78,083	85,110	46,385	48,473	50,654
Timing Adjustment*		-37,787									
Other Revenue	193,968	169,276	168,858	169,841	170,532	171,483	173,116	173,770	174,408	174,919	175,735
Total Revenue	**$698,359**	**$710,895**	**$820,690**	**$886,856**	**$959,249**	**$1,039,072**	**$1,118,787**	**$1,204,552**	**$1,251,576**	**$1,300,559**	**$1,352,029**
Expenses											
Operating Expenses	$651,041	$684,265	$730,737	$764,647	$798,451	$777,321	$841,645	$846,683	$884,266	$922,427	$963,470
Existing Debt Service	31,621	31,377	31,377	31,377	31,377	31,377	31,377	31,377	31,377	31,377	31,377
New Debt Service	0	0	0	31,000	62,000	62,000	62,000	94,500	127,000	127,000	127,000
Rate Funded Capital	$0	$19,200	$15,675	$47,730	$30,990	$65,589	$180,696	$232,281	$223,932	$206,205	$215,484
Total Expenses	**$682,662**	**$734,842**	**$777,789**	**$874,754**	**$922,818**	**$936,287**	**$1,115,718**	**$1,204,841**	**$1,266,575**	**$1,287,009**	**$1,337,331**
Net Revenues	$15,697	-$23,947	$42,901	$12,102	$36,430	$102,785	$3,069	-$290	-$14,999	$13,550	$14,698
Ending Reserves	**$295,964**	**$272,016**	**$314,918**	**$327,019**	**$363,450**	**$466,235**	**$469,304**	**$469,014**	**$454,015**	**$467,566**	**$482,264**
Debt Coverage	1.50	0.85	2.87	1.96	1.72	2.80	2.97	2.84	2.32	2.39	2.45

*Reflects January rate implementation

Capital Funding	FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	FY 27-28	FY 28-29	FY 29-30	FY 30-31	FY 31-32	FY 32-33
Capital Revenues											
Use of Debt Proceeds				$400,000	$500,000			$650,000	$300,000		
Rate Funded Capital	$0	$19,200	$15,675	$47,730	$30,990	$65,589	$180,696	$232,281	$223,932	$206,205	$215,484
Total Capital Revenue	**$0**	**$19,200**	**$15,675**	**$447,730**	**$530,990**	**$65,589**	**$180,696**	**$882,281**	**$523,932**	**$206,205**	**$215,484**
Total Capital Expenditu	**$0**	**$19,200**	**$15,675**	**$447,730**	**$530,990**	**$65,589**	**$180,696**	**$882,281**	**$523,932**	**$206,205**	**$215,484**

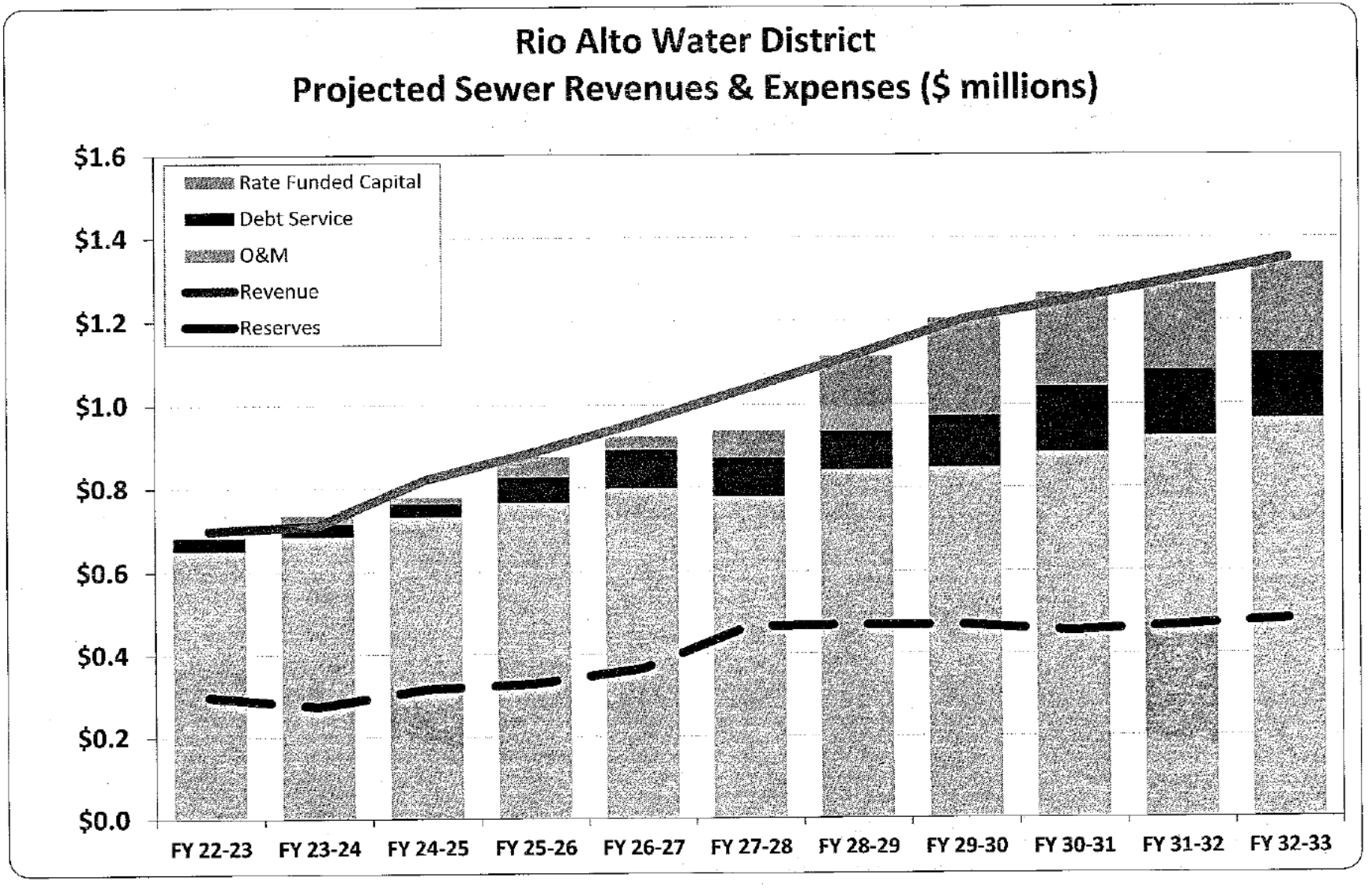

Rio Alto Water District
Projected Sewer Revenues & Expenses ($ millions)
$1.6
$1.4
$1.2
$1.0
$0.8
$0.6
$0.4
$0.2
$0.0
Rate Funded Capital
Debt Service
O&M
Revenue
Reserves
FY 22-23
FY 23-24
FY 24-25
FY 25-26
FY 26-27
FY 27-28
FY 28-29
FY 29-30
FY 30-31
FY 31-32
FY 32-33

Table 6
Rio Alto WD
Sewer Rate Study
Meter Equivalent Units

Bill Code	Quantity	Quantity	EDU	Total EDUs
Single Family Resid.	Customers	862	1.00	862.00
1/2 Single Fam Resid.	Customers	1	0.50	0.50
Triplex Sewer	Customers	1	3.00	3.00
Duplex Sewer	Customers	12	2.00	24.00
Sewer Extension	Customers	15	1.00	15.00
Low Pressure	Customers	18	1.00	18.00
Low Pressure Duplex	Customers	2	2.00	4.00
Commercial	Customers	2	4.50	9.00
Commercial	CCF	3,782	n/a	
Total				**935.5**

* Customer data as of June 2023 provided by staff

Table 7
Rio Alto WD
Sewer Rate Study
Cost Allocation

Wastewater Flows and Loadings	# of Sewer Customers	# of Sewer EDUs[1]	Est. Mo Flow CCF Per EDU[2]	Projected Water Use CCF[3]	Flow Factor[4]	Projected Flow CCF	Strength (mg/l)[9] BOD[7]	TSS[8]	Loadings (lbs) BOD	TSS
Residential	911	927	7.00	N/A		77,826	220	220	106,906	106,906
Commercial	2	9	35.00	3,782	20%	756	200	200	944	944
Total						**78,582**			**107,850**	**107,850**

[1] "EDU" stands for equivalent dwelling unit

[2] Flow estimate based on average winter use

[3] "CCF" stands for hundred cubic feet

[4] Flow factor based on estimated flow returning to sewer

[5] "MG" stands for 1,000 gallons

[6] "GPD" stands for gallons per day

[7] "BOD" stands for biochemical oxygen demand

[8] "TSS" stands for total suspended solids

[9] State Water Resource Control Board (SWRCB) Guidelines for Wastewater Agencies

Table 8
Rio Alto WD
Sewer Rate Study
Low Pressure Cost Allocation

Estimated Cost for Annual Low Pressure Customer Flushing

Cost Item	Amount
Labor- 3 days 3 employees	
35.37 x 1.5.24 hours	$1,273.20
$40.70 x 1.5 x 24 hours	$1,465.20
$25.95 x 1.5 x 24 hours	$934.00
Costs-	
Backflow annual testing	$60.00
Backflow Device Cost (1,500) deprec 5 yrs	$300.00
Fire Hoses Cost (410) deprec. 5 yrs	$82.00
Annual additional cost to flush LPSS lines:	$4,114.40
System wide benefit	30%
Total LPSS allocation	**$2,880.08**

Table 9
Rio Alto WD
Sewer Rate Study
Functional Allocation

Projected 5-Year Average

Functional Allocation	Amount	Offsetting Revenue	Allocation Amount	Flow	BOD	TSS	Total
Administration	$468,541	$13,200	$455,341				0%
Collection System	$119,920	$0	$119,920	100%			100%
Treatment	$191,330	$0	$191,330	20%	40%	40%	100%
Debt Service	$62,377	$0	$62,377	20%	40%	40%	100%
Capital	$35,837	$9,984	$25,853	33%	33%	33%	100%
Functional Allocation $	$878,005	$23,184	$854,821	$179,279	$110,101	$110,101	$399,480
Functional Allocation %				44.88%	27.56%	27.56%	100%
FY 22/23 Revenue Requirement				**$226,120**	**$138,856**	**$138,856**	**$503,832**
LPSS Allocation				-$2,880			
Final Revenue Requirement				**$223,240**	**$138,856**	**$138,856**	**$503,832**

Table 10
Rio Alto WD
Sewer Rate Study
Revenue Requirements

Allocation Units	Flow	BOD	TSS
Unit of Measure	*#*	*EDU*	*CCF*
Allocation Units	78,582	107,850	107,850
Revenue Requirement	$223,240	$138,856	$138,856
Unit Cost ($/Unit)	$2.84	$1.29	$1.29

Revenue Requirement	Flow	BOD	TSS	Total
Units				
Residential	77,826	106,906	106,906	
Commercial	756	944	944	
Revenue Requirement				
Residential	$221,091	$137,640	$137,640	**$496,371**
Commercial	$2,149	$1,216	$1,216	**$4,581**

Table 11
Rio Alto WD
Sewer Rate Study
Residential Rate Derivation

Unit Cost Calculation	Sewer System	Low Pressure
Total EDUs	926.50	22.00
Revenue Requirement	$496,370.98	$3,151.22
$ per EDU	$535.75	$143.24
Bi-Monthly $ per EDU	$89.29	$23.87

Bi-Monthly Residential Rate Derivation	EDUs	Sewer System	Low Pressure	At FY 22-23 Revenue	At FY 23-24 Revenue
Single Family Resid.	1.00	$89.29		$89.29	**$102.68**
1/2 single Fam Resid.	0.50	$44.65		$44.65	**$51.34**
TriPlex sewer	3.00	$267.89		$267.89	**$308.08**
Duplex Sewer	2.00	$178.59		$178.59	**$205.38**
Sewer Extention	1.00	$89.29		$89.29	**$102.68**
Low Pressure	1.00	$89.29	$23.87	$113.16	**$130.14**
Low Pressure Duplex	2.00	$178.58	$47.75	$226.33	**$260.28**

Table 12
Rio Alto WD
Sewer Rate Study
Commercial Rate Derivation

Commercial Rate Derivation	Fixed	Volumetric
FY 22/23 Revenue Requirement	$2,431.98	$2,148.57
Units	2.00	3,781.58
$ per Unit	$1,215.99	$0.57
Bi-Monthly $ per Customer	$202.66	
Bi-Monthly FY 23/24 Rates	**$233.06**	**$0.65**