Achievements in Water Independence

Fiscal Year 2024 Annual Budget

Albert Robles Center for Water Recycling and Environmental Learning (ARC)

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Mission Statement, Board of Directors & Standing Committees

The District's mission statement is interpreted and directed by the District's policymaking and governing body, the Board of Directors, which represents the highest authority within the management structure of the District.

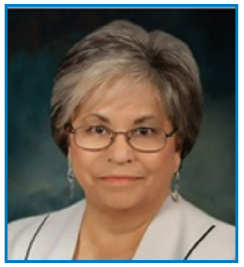
Board of Directors

Joy Langford
Division One

Robert Katherman
Division Two

John D.S. Allen
Division Three

Sergio Calderon
Division Four



Vera Robles Dewitt
Division Five

The five-member Board is elected by the voting public to serve four-year terms. Stated goals and objectives are accomplished through a committee structure that reports to the Board of Directors. Committees may delegate some of its authority to staff in the interest of efficiency, stability, and prudent management for completion of specific tasks.

Mission Statement

"To provide, protect and preserve safe and sustainable high-quality groundwater."

Standing Committees

The Board shall be organized into the following Standing Committees that are advisory to the Board with respect to matters within their respective areas of responsibility:

- Administrative Committee
- Capital Improvement Projects Committee
- External Affairs Committee
- Finance/Audit Committee
- Groundwater Quality Committee
- Water Resources Committee

Administrative Committee

The Administrative Committee shall study, advise, and make recommendations regarding the following:

1. Administrative and personnel policies and procedures to be considered by the Board of Directors
2. Policies and procedures pertaining to the oversight and management of the organization, including but not limited to the District's organization and flow of authority and responsibilities
3. Periodic independent reviews and studies of the organization, classification of positions and related compensation ranges, some of which are outlined in the Memorandum of Understanding with the employees' bargaining unit

Capital Improvement Projects Committee

The Capital Improvement Projects Committee, composed of the five members of the Board, shall advise the Board of Directors on all capital improvement program-related projects and issues related to the same.

External Affairs Committee

The External Affairs Committee, composed of the five members of the Board, shall study, advise, and make recommendations regarding the following:

1. Proposals and recommendations concerning local, regional, state, and federal legislation, or amendments thereto, that may affect the District
2. Opportunities for Directors to assist in outreach activities, including but not limited to efforts to inform members of the Legislature or the Congress of the District's position regarding proposed legislation
3. The effectiveness of legislative advocacy efforts
4. The development and implementation of school education programs, including the expectations and goals for these programs
5. The effectiveness of the District's external affairs programs and general communications efforts directed at member agencies and the general public
6. The selection of public information consultants and the scope of their assignments

Finance/Audit Committee

The Treasurer of the Board must serve on the Finance/ Audit Committee. The committee shall study, advise, and make recommendations regarding the following:

1. Financial activities of the District by reviewing the monthly demands, financial statements, reimbursements, and other key financial issues of the District
2. The coordination of the annual budget process and monitoring the budget as necessary to ensure that the operations of the District are conducted pursuant to it
3. The District's investment policy and the District's investment portfolio. The committee is to monitor any short, intermediate, and long-term capital needs of the District
4. Acts as the Audit Committee relating to the Comprehensive Annual Financial Audit conducted by the District's independent financial auditor

Groundwater Quality Committee

The Groundwater Quality Committee shall study, advise, and make recommendations regarding the following:

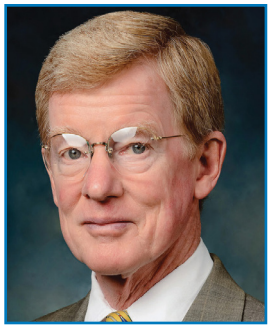
1. The operation, protection, and maintenance of the District's water quality facilities
2. Engineering aspects of all water quality projects
3. The effect on the District of existing and proposed federal, state, and local water quality statutes and regulations; and
4. The District's Capital Improvement Program as it relates to water quality projects

Water Resources Committee

The Water Resources Committee shall study, advise, and make recommendations regarding the following:

1. The operation, protection, and maintenance of the District's replenishment water facilities
2. Policies, sources and means related to the stewardship of the Central and West Coast Groundwater Basins, including but not limited to, importing, and distributing water, transferring water and wheeling as required by the District
3. Policies regarding the use, reuse, recycling, and underground storage of water
4. Environmental compliance and requirements and the effect on the District of existing and proposed federal, state, and local environmental statutes and regulations
5. Engineering aspects of all replenishment water projects
6. Input related to the District's Capital Improvement Program as it relates to replenishment water projects
7. Policies related to the District's conjunctive use efforts, including but not limited to the California Environmental Quality Act (CEQA) and National Environmental Policy Act (NEPA)

Board President's Report



John D. S. Allen
President

This has been a topsy turvy year for water agencies up and down the state, but especially so for those that rely on imported water for all or most of their supplies. What started as a historically dry year ended as one of the wettest on record, with flooding in parts of the Central Valley extending through the summer months. Thanks to our Water Independence Now (WIN) group of programs and projects completed four years ago, WRD does not rely on imported water to meet our replenishment needs, so we weathered the drought years in relatively good shape. And by virtue of the Los Angeles County Flood Control District's system of dams and spreading grounds, we were able to capture record amounts of stormwater for future use from the parade of atmospheric rivers that ended, temporarily, the persistent pattern of drought afflicting the state.

Through acute drought and sustained precipitation, WRD stayed the course, continuing to take advantage of outside funding for our local supply projects and programs, bringing two important projects to completion and taking steps to advance the Regional Brackish Water Reclamation Program, a priority project for WRD with regional implications for new water supply and storage opportunities.

Outside Funding

WRD has enjoyed great success over the years in securing state and federal funding to support our projects and programs. This year was no exception. In November, we were honored to receive a $15.48 million grant from the U.S. Bureau of Reclamation for the Albert Robles Center (ARC). A check in that amount was presented by Congresswoman Linda Sanchez and Tanya Trujillo, Assistant Secretary for Water and Science of the Department of the Interior, at a ceremony honoring the 60th anniversary of WRD's use of recycled water. The funding resulted from President Biden's Infrastructure Investment and Jobs Act. Both Sanchez and Trujillo praised WRD's pioneering use of recycled water and pointed to the ARC facility as a template for what needs to be done throughout the West to secure a sustainable water supply in the face of climate change. The grant equates to about $35 on the Replenishment Assessment.

In April, WRD was awarded $2 million by the Department of Water Resources to build a conveyance pipeline connecting an existing well at the Brewer Desalter to the Goldsworthy Desalter. Called the "WRD Brewer Well Optimization Project at Goldsworthy," the pipeline will increase desalinated water produced at Goldsworthy by 1,120 acre-feet per year. The treated water goes directly into the potable water distribution system for the city of Torrance. WRD is acquiring the Brewer Desalter from the West Basin Municipal Water District.

Projects Completed

Two significant projects were completed this year, one relating to WRD's treatment of a contaminated plume threatening the Central and West Coast Basins, the other adding to WRD's groundwater replenishment portfolio in the Long Beach area.

Contaminated Plume

Since 2015, WRD has been investigating a perchlorate groundwater "hot spot" plume with the assistance of various regulatory agencies in association with our Los Angeles Forebay Groundwater Task Force. The perchlorate detections are among the highest in the state and the groundwater plume is currently located in a deep aquifer system underlying the city of Vernon. In 2018, WRD obtained a grant of more than $10 million from the State Water Resources Control Board to pay for 80% of the construction costs for a treatment system to remediate the perchlorate and other commingled contaminants. I am pleased to say we completed construction this year and the treatment system is fully operational. After project completion, we approved construction of an additional monitoring well as part of a multi-agency investigation to identify a potentially responsible party for the perchlorate plume.

Injection Well in Long Beach

The Leo J. Vander Lans Advanced Water Treatment Facility (LVL AWTF) is designed to treat to the highest standards up to 8 million gallons per day (MGD) of tertiary effluent for groundwater injection at the Alamitos Seawater Intrusion Barrier. Actual demand varies seasonally between 4 to 7 MGD. To maximize treatment capacity of the LVL AWTF, allow for operational flexibility, and provide additional treated water for injection, we completed construction of a new groundwater injection well capable of injecting up to 2 MGD or more than 2,200 acre-feet of excess treated water per year. Funding for this project was provided by Pepsico ($1.5 million) and by the U.S. Bureau of Reclamation ($1.5 million). A pipeline connecting the injection well to LVL AWTF is under construction.

Regional Brackish Water Reclamation Program

Progress continued on WRD's effort to remediate a usable portion of the 600,000 acre-foot plume of salty water that intruded into the West Coast Basin in the 1940s and 1950s. The Regional Brackish Water Reclamation Program is an expansion of WRD's Robert W. Goldsworthy Desalter. First commissioned in 2001 and expanded in 2018, the Goldsworthy Desalter treats 5,600 acre-feet of brackish water annually to supply 25% of the water needs of the city of Torrance. The Regional Water Reclamation program will treat an additional 5,600 acre-feet annually for beneficial use by a partner agency to meet its service area demands. Just as importantly, removal of the brackish water will enable pumpers in the area to maximize their water rights usage.

The program also provides an opportunity for water augmentation storage projects through the Pure Water Southern California advanced treated recycled water project, a joint undertaking of the Metropolitan Water District (MWD) and the County Sanitation Districts. MWD envisions injection wells in the West Coast Basin as part of its early water delivery options.

The desalters aim to remediate 150,000 acre-feet of brackish water in the usable aquifer. Remediation of the remaining 450,000 acre-feet in the deeper aquifers may be evaluated in the future.

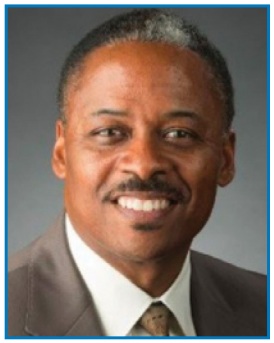
WRD awarded a contract for the installation of a pilot treatment project to identify the most effective pretreatment process to use in the full scale desalter facility. That should be up and operating in the next few months.

Thank you!

As always, the progress made this year against the backdrop of climate whiplash resulted from the hard work of many people. I want to thank my colleagues on the WRD Board for their thoughtful deliberation and service to the district, the pumpers who serve on our important Technical Advisory Committee and Budget Advisory Committee, and our extremely capable General Manager and staff who convert Board policy into the programs and projects that define what we do.

John D.S. Allen
President

General Manager's Report



Stephan Tucker
General Manager

Climate Whiplash

Last summer, the most acute drought in the last 1200 years afflicted much of the Southwest, with no signs of easing anytime soon. According to the U.S. Drought Monitor, three straight years of far below average precipitation had left most of California in a "severe," "extreme," or "exceptional" drought. Sources of imported water were stressed as never before, with only emergency supplies reaching Southern California from the State Water Project. State reservoirs were at all-time lows. Lake Mead was at its lowest level in history, jeopardizing even near-term delivery of water from the Colorado River. Mandatory water cutbacks of 35% were in effect in portions of the six-county service area of the Metropolitan Water District and voluntary curtailments of 20% were in effect everywhere else.

Abruptly, things changed, and the term "climate whiplash," meaning wild and sharp swings in the weather, was introduced into the water management vocabulary. In a three-month period starting in late December, a series of 14 atmospheric rivers slammed into the state, bringing torrential rain along the coast and valleys and massive snowfall in the mountains. In the blink of an eye, historic drought was replaced with historic precipitation. Reservoirs supplying the State Water Project filled to capacity, and by summer's end, Lake Mead will have risen by 20 feet, which equates to 9.1 million acre-feet.

Impact on WRD

While no longer dependent on imported water for replenishment, WRD reaped huge benefits from the significant precipitation in the region and the resulting stormwater that was stored and released behind rubber dams on the San Gabriel River and conventional dams at the Whittier Narrows and in the San Gabriel Mountains. Since October 1, precipitation locally of nearly 26 inches is 169% of the historic average for the period. Through June, stormwater captured and delivered to the spreading grounds of 161,864 acre-feet is 300% of the historic average and the highest on record. In the combined dry years of 2020-21 and 2021-2022, we had just 19% of that amount.

All of this is to say that the basins are in very good shape, Groundwater levels are up, the accumulated overdraft is down, the Central Basin is at its optimum quantity, and the water year doesn't end until October. By virtue of what we do and how we do it, WRD is prepared for the whiplash that is now a given characteristic of climate change. Because of artificial replenishment in the form of recycled water, the basins survive during periods of drought. And, as we have seen, they thrive when atmospheric rivers arrive.

WIN4ALL Strategic Plan

The goal of WRD's Water Independence Now (WIN) program was to eliminate reliance on imported water for groundwater replenishment. That goal was achieved in 2019 with the opening of the Albert Robles Center (ARC). Efforts to optimize WIN are underway, with the completion of the injection well at the Leo J. Vander Lans Advanced Water Treatment Facility (LVL AWTF) and completion nearing for a second connection to the Dominguez Gap Seawater Barrier that will enable the use of recycled water to a portion of the barrier currently served by imported water.

The goal of WIN4ALL is to increase the region's use of sustainable groundwater supplies in order to decrease reliance on imported water. The Board this year formally adopted a strategic plan to do just that. Specific steps toward that goal include:

- Coordinating with pumpers to exercise their currently unused groundwater rights instead of imported water, which equates to 29,000 acre-feet in the Central Basin and 23,000 acre-feet in the West Coast Basin. This entails increasing participation in WRD's Safe Drinking Water Program, the Well Construction and Rehabilitation Loan Program, and PFAS Remediation Program.
- Facilitating the development of groundwater augmentation projects by pursuing partnerships with pumpers as part of the MWD's Pure Water Southern California Project and LADWP's Operation Next Project at the Hyperion Water Reclamation Plant.

The WRD elements of the program are ongoing and can be implemented in the near term. The partnerships envisioned for the two major recycled water projects in the region will take longer, as will the projects themselves. The plan is to have WIN4ALL fully implemented by 2040.

PFAS Remediation Program Advances

PFAS (Per- and polyfluoroalkyl substances) are man-made chemicals that are called "forever chemicals" because they don't break down easily. That's because they have been used to make products that resist grease, oil, stains, heat, and water. Several wells in WRD's service area have been affected by the presence of excessive amounts of these chemicals.

Two years ago, WRD created a PFAS remediation program under which WRD pays a significant portion of the cost of well treatment systems in exchange for a commitment of a minimum volume of pumping once the well is completed. To date, 14 pumpers have applied for participating in the program. Last fiscal year, four projects received a total of $16.8 million to remediate 10 wells to restore the production of 12,344 acre-feet. This fiscal year, two additional projects received a total of $10.5 million to remediate 9 wells to restore the production of 5,459 acre-feet. Three funding applications are pending.

Gender and Racial Equity Organizational Assessment

One of my first initiatives as General Manager was to propose to the Board that we undertake a gender and racial equity organizational assessment of WRD. The

assessment concluded that WRD needed to take action with respect to:

- Perceptions of race and gender inequities.
- Reenforcing a culture of diversity, equity, and inclusion.
- Improving internal communications practices.
- Establishing clear and consistent policies relating to employee benefits and discipline.
- Advancing awareness of policies created for employee recruitment, promotion, and development.

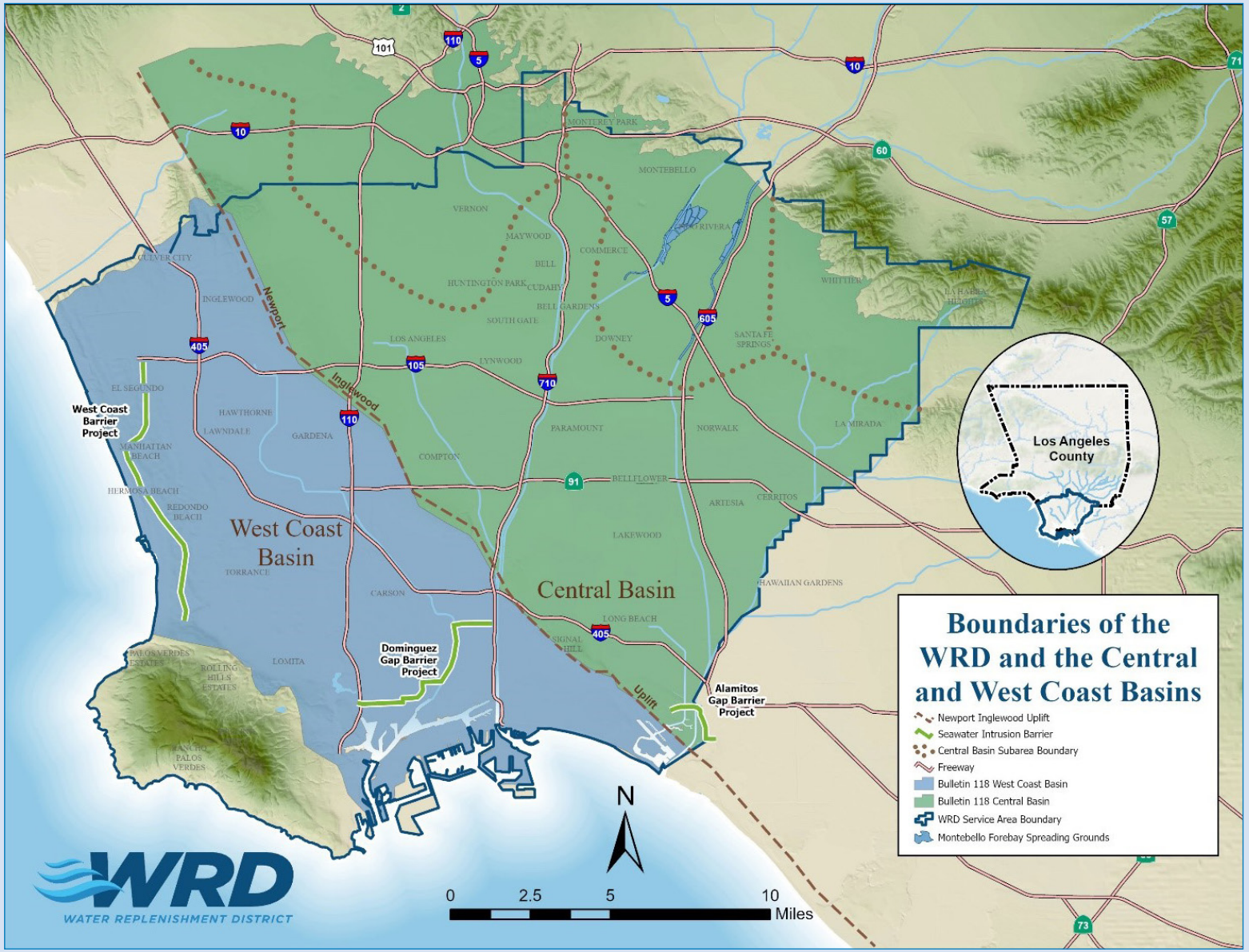
I am pleased to report that WRD has quickly taken several steps to address the assessment's findings and recommendations:

- WRD hired its first Senior Administrative Analyst overseeing WRD's diversity, equity, and inclusion program (DEI).
- We brought in experienced consultants to conduct DEI training for the staff, management, and Board of Directors.
- The Board adopted a clear and concise Employee Promotions Policy.
- We have implemented a number of initiatives to improve communication between management and staff, including monthly communication meetings, Brown Bag lunch and learn series, annual staff retreat, and an enhanced employee goal setting process.
- Additionally, we instituted a manager 360-degree annual review to improve feedback to managers from all levels of the organization to keep them accountable for fairness, equity and inclusion.

There is more to do, but WRD is well on its way to becoming a model for DEI introspection and implementation.

Stephan Tucker
General Manager

Water Replenishment District Service Area



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About the Water Replenishment District

The Water Replenishment District of Southern California (WRD) is a special water district that was established in 1959 by popular vote to counteract the effects of over pumping of groundwater from the Central and West Coast Groundwater Basins in Los Angeles County.

WRD is the only replenishment district in California operating under the provisions of the California Water Code, Section 60000 et seq., which specifically governs water replenishment district. The District manages the two major groundwater basins which provide groundwater for approximately four million residents in 43 cities of southern Los Angeles County.

Prior to the formation of the District, over-pumping of the two groundwater basins caused overdraft, and many wells went dry and seawater intruded into the groundwater aquifers – underground geological formations that store water. In 1957, the accumulated overdraft in the Central Basin was almost one million acre-feet, which translates to a tremendous withdrawal of water from aquifers in excess of the amount of water that naturally, or artificially, replaces it. In both basins, groundwater levels had dropped to below sea level.

In 1959, the Central Basin Water Association and West Basin Water Association, comprised of the major groundwater producers from each basin, jointly proposed and obtained voter approval for formation of the Water Replenishment District of Southern California to manage the Central and West Coast Groundwater Basins. Today the basins have recovered, are in balance, and independent of imported water for groundwater replenishment, using only recycled water and stormwater for recharge.

The District's mission is "to provide, protect and preserve safe and sustainable high-quality groundwater". The District accomplishes this through its various programs and projects to ensure a reliable supply of high-quality groundwater. In addition, the District's role has expanded as it developed programs to capture stormwater, recharge recycled wastewater, monitor water quality and build advanced water treatment plants to ensure safe and reliable groundwater supplies.

Local Economy

While Los Angeles County employment has not fully recovered from the COVID-19 pandemic, remaining shortfalls are concentrated in tourism-related industries. Current and future federal, state and local investments present opportunities for growth and resilience moving forward.

Los Angeles has weathered the many impacts of the COVID-19 pandemic; however, there remains an employment gap of 25,000 jobs in December 2022 compared to December 2019. This deficit in pre- pandemic employment is concentrated in only a few sectors, such

as Leisure and Hospitality, Manufacturing, and Wholesale Trade. At the same time, other sectors have experienced robust growth coming out of the pandemic, including Educational and Health Services and Professional and Business Services. While the recovery in total employment is promising, these shifting trends in sectorial employment, should they continue, have the power to shape the future of the Los Angeles economy.

One of the lingering effects of the pandemic (which directly impacts employment in the Leisure and Hospitality industry) is the lack of tourism. LAX's December air traffic data show that domestic and international arrivals remain around 75% of pre- pandemic levels. The volume of international visitors has been greatly depressed by the lack of tourism from China, although this could change in 2023 as the country reopens from COVID-19-related restrictions.

While the reduction in visitors affects the local economy, so does the exodus of its residents. The California Department of Finance estimates that over 300,000 Angelenos have left the county since 2019, with the City of Los Angeles shouldering more than half of that decrease. One commonly cited reason for leaving is the unaffordability of the housing market in the region.

At the same time, Los Angeles County should benefit from significant funding through announced public investment and private procurement. Notably, the State's Community Economic Resilience Fund and the Economic Development Agency's Build Back Better are intended to bring equitable, accessible, and sustainable jobs to the region.

The Los Angeles County economy is expected to flatline in 2022 and 2023 as the economy cools. Gross county product is expected to have grown by just 0.1% in 2022 and is projected to drop by -0.2% in 2023. Although growth is expected to essentially flatline over these two years, there are expectations that growth in the county will resume in 2024, with the GCP expanding by 1.3% once inflation has moderated and the Fed has stopped its tightening of monetary policy.

The unemployment rate in Los Angeles County has nearly returned to its pre-pandemic rate. Unlike the United States and California, the annual unemployment rate for the region remains slightly above the pre-pandemic level, at 4.4% in December 2022 compared to 4.3% in February 2020. The bulk of the year-over-year change, a drop of 4.0% from 2021 to 2022, occurred from October 2021 to February of 2022; since March, the unemployment rate has continued to fall, but not at the same pace as before, indicating that the county is reaching its 'new normal' in the aftermath of the COVID-19 pandemic.

Los Angeles County continues to steer the California economy due to the size of its population and reputation as a center of commerce. Employment changes in Los Angeles County are very similar to those experienced by California, as the county represents roughly a quarter of all jobs in the State. As of December 2022, total payroll employment in Los Angeles County reached 4,629,500 jobs; this remains slightly below the pre-pandemic peak in December 2019 of 4,654,500 jobs by 25,000 jobs.

Los Angeles, both the county and the city, have seen an acceleration in the decline of their population since the onset of the COVID-19 pandemic. Los Angeles County's rapid rate of population decline is the headline among demographic changes, as the county has seen a decrease in its population each year since 2018. The rate of population decline has also been increasing, from 0.1% leaving in 2018 to 1.1% in 2022, resulting in the population falling below 10 million for the first time since 2012. While the City of Los Angeles saw a sharp drop in population in 2021, population levels in 2022 have resumed the previous, more gradual decline.

While constrained financially, both Los Angeles County and the City of Los Angeles are undertaking their own efforts to attract and facilitate regional investments in infrastructure over the next few years. These efforts share the goal of helping transform the economy positively and equitably. For example, by adopting a motion on July 13, 2021, the Los Angeles County Board of Supervisors acted preemptively to maximize the allocation and use of American Rescue Plan funds. The Board recognized that an estimated $1.9 billion in funding from the American Rescue Plan was available to the county and another $2.6 billion across its 88 cities. The Board decided to strategically use these funds to maximize the benefits for communities suffering disproportionate health and economic impacts from the COVID-19 pandemic, and so established specific equity principles and guidelines for their use.

Overall, the forecasted economic indicators for Los Angeles County point to a small economic contraction, despite the principal economic concerns brought on by the COVID-19 pandemic mainly being resolved. The growth in real GCP slowed after its big recovery in 2021, with the forecast for the coming year expecting a slight decrease. Meanwhile, real personal income lost most of the increase it experienced in 2021, with 2023 expected to be a year with limited growth before a modest increase in 2024. Nonfarm employment growth did not fully rebound from the effects of the pandemic, nor is it forecasted to do so in the coming years. Meanwhile, the unemployment rate dropped close to the pre-pandemic level, though a slight labor market contraction is expected to increase in the coming years. Finally, though the consumer price index (CPI) rose at a rate not seen in decades in 2022, it is expected to gradually decline in 2023 and 2024 as inflation returns to around pre-pandemic rates.

Table 1

Economic Statistics - United States, California, & Los Angeles County

Description	2018	2019	2020	2021	Forecast 2022	Forecast 2023
Population (1 & 2) in millions						
United States	326.84	328.33	331.51	332.03	333.28	334.99
California	39.48	39.53	39.54	39.37	39.03	39.99
Los Angeles County	10.10	10.06	10.01	9.94	9.79	9.76
Median Home Listing Price (3)						
United States	$299,450	$319,450	$345,000	$379,000	$443,900	$440,000
California	$568,500	$596,500	$691,500	$744,900	$750,000	$775,000
Los Angeles County	$762,500	$799,000	$949,925	$949,925	$919,000	$1,100,000
Real GDP Growth (4)						
United States	2.3%	2.9%	-2.8%	-5.9%	1.1%	0.8%
California	4.2%	3.2%	-2.3%	7.8%	0.5%	0.3%
Los Angeles County	3.4%	2.5%	-5.8%	7.8%	0.1%	-0.2%
Unemployment Rate (4)						
United States	3.9%	3.7%	8.1%	5.4%	3.7%	4.2%
California	4.3%	4.1%	10.2%	7.3%	4.4%	4.9%
Los Angeles County	4.8%	4.7%	4.6%	12.8%	9.6%	6.4%
Real Per Capita Income (4)						
United States	2.8%	3.6%	5.4%	3.4%	0.50%	2.8%
California	1.8%	4.9%	6.6%	3.7%	0.5%	4.1%
Los Angeles County	1.2%	1.4%	3.1%	6.2%	-6.0%	0.1%

Sources

(1) U.S. Census Bureau
(2) California Department of Finance
(3) Federal Reserve Economic Data
(4) Los Angeles County Economic Development Corporation

Strategic Goals & Objectives

Strategic Planning: Purpose & Process

WRD has developed a strategic plan to guide the District in near-term and long-term planning efforts. These efforts begin at the highest level, looking 20 years into the future and setting visionary goals for increased regional sustainability. Building upon the successful WIN program, this effort has been envisioned as WIN4ALL: The 2040 Plan for Regional Water Independence.

To provide near-term focus for accomplishing the WIN4ALL goals, WRD has produced this 2-Year Strategic Plan, which incorporates planning efforts from the regularly updated 5-Year Capital Improvement Projects Program document and enlists a 2-Year work plan for immediate District strategy moving into the following year.

Top Strategic Accomplishments by Department

Hydrogeology Department

- Completed the installation of an additional extraction well, remedial design, and started the procurement process for treatment system installation to clean up perchlorate impacted groundwater in the Los Angeles Forebay. Eighty percent (80%) of the project costs are funded through a grant received through Proposition 1 for a total of $10 million
- Proposition 1 grant agreement received to destroy five inactive water supply wells to protect the drinking water aquifers of the Central Basin. The state of California is providing 80% of the total costs for an amount of $844,000.
- PFAS treatment technology pilot testing completed for two water supply wells located in the Montebello Forebay.
- Reported the results of a two-year perfluorinated compound groundwater monitoring study in our annual Regional Groundwater Monitoring Report in March 2021.
- Groundwater modeling support for multiple planning projects being considered where the results will help inform stakeholders on how best to balance planned increased production with additional replenishment via inland injection wells and/or existing seawater barriers located within the Central Basin and West Coast Basin.
- Received a grant from the U.S. Geological Survey to join the National Groundwater Monitoring Network. Grant funded activities included financial assistance to upload data, repair several deteriorating well vaults, conduct slug testing in key monitoring well screens to determine aquifer parameters, and install a deep, nested groundwater monitoring well in the City of Montebello

Engineering Department

- Completed Construction of Albert Robles Center for Water Recycling and Environmental Learning resulting in over 10,000 AFY of advanced treated recycled water to the Montebello Forebay.
- Transitioned operations at the Leo J. Vander Lans Advanced Water Treatment Facility to PERC Water Corporation.
- Performed O&M and Capital projects to allow LVL AWTF to reliably deliver 5 million gallons of water per day to the Alamitos Barrier Project.
- Completed Feedwater quality investigation and Pilot testing to better understand performance issues at the Goldsworthy Desalter.
- Managed ten Safe Drinking Water Disadvantaged Community Program projects at various stages of funding pursuits and project deliveries.

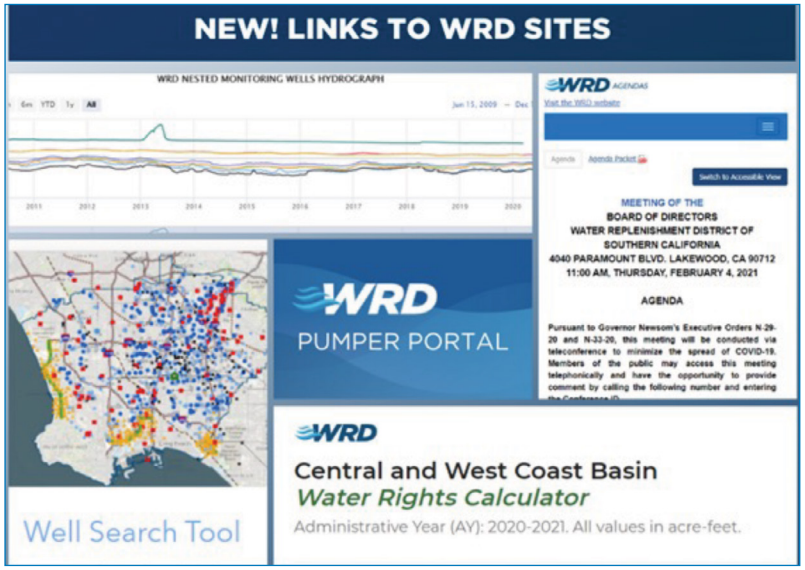
Human Resources Department

- Developed procedures to ensure compliance with local and state public health officials and implementation of COVID-19 Workforce Transition Plan. Maintained seamless operations throughout the COVID-19 pandemic.
- Implementation of new performance management evaluation form and process for staff.
- Increased communications with staff using regular staff meetings and the WRD Intranet Portal.
- Coordinated with the Los Angeles County Registrar's office for two Board election seats in 2020 General Election.
- Streamlined the Agenda Management process, including access to agendas on a web browser.
- Expanded District's internship program across technical departments.
- Completion of two comprehensive classification and compensation studies.

Data and Technology Services Department

- Implementation of a Computerized Maintenance Management System (CMMS) at Leo J. Vander Lans and the Albert Robles Center.
- Enhancements on network security and our Virtual Private Network (VPN) enabling our workforce to securely work from home while accessing internal resources.

- Launch of the Pumper Portal to collect groundwater production data from pumpers.
- Launch of WRD Hydrographs to the public to make access to water level data and graphs readily available.
- Launch of an updated Water Rights Calculator (version 2) adding several new dimensions.
- Launch of the WRD Agendas web app, enhancing our ability to quickly distribute public meeting information.



Finance Department

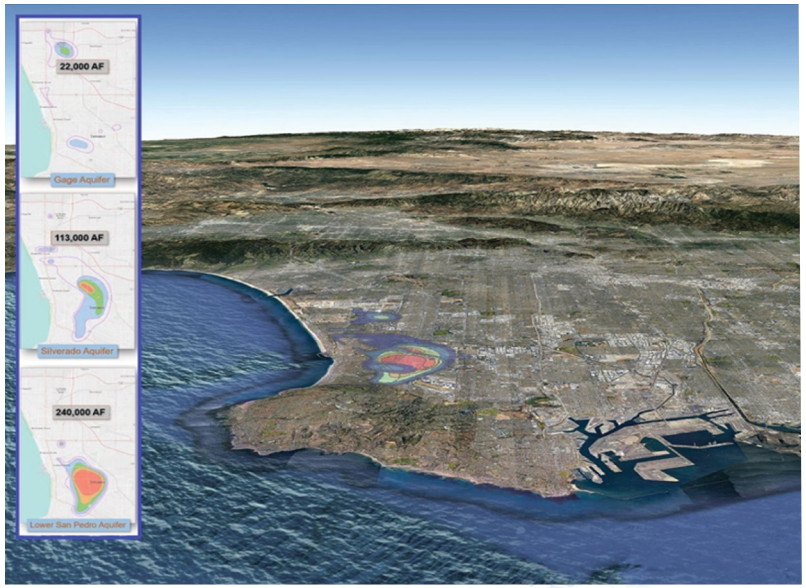
- Maintained AA+ rating from Fitch Ratings on the District's 2018 Replenishment Assessment Revenue Bonds reflecting the District's strong financial profile with strong revenue defensibility and low operating risks
- Received Distinguished Budget Presentation Award from the Government Finance Officers Association for the Fiscal Year 2023 budget.
- Received Certificate of Achievement for Excellence in Financial Reporting for the Fiscal Year 2022, the highest form of recognition in governmental accounting and financial reporting.

Water Resources Department

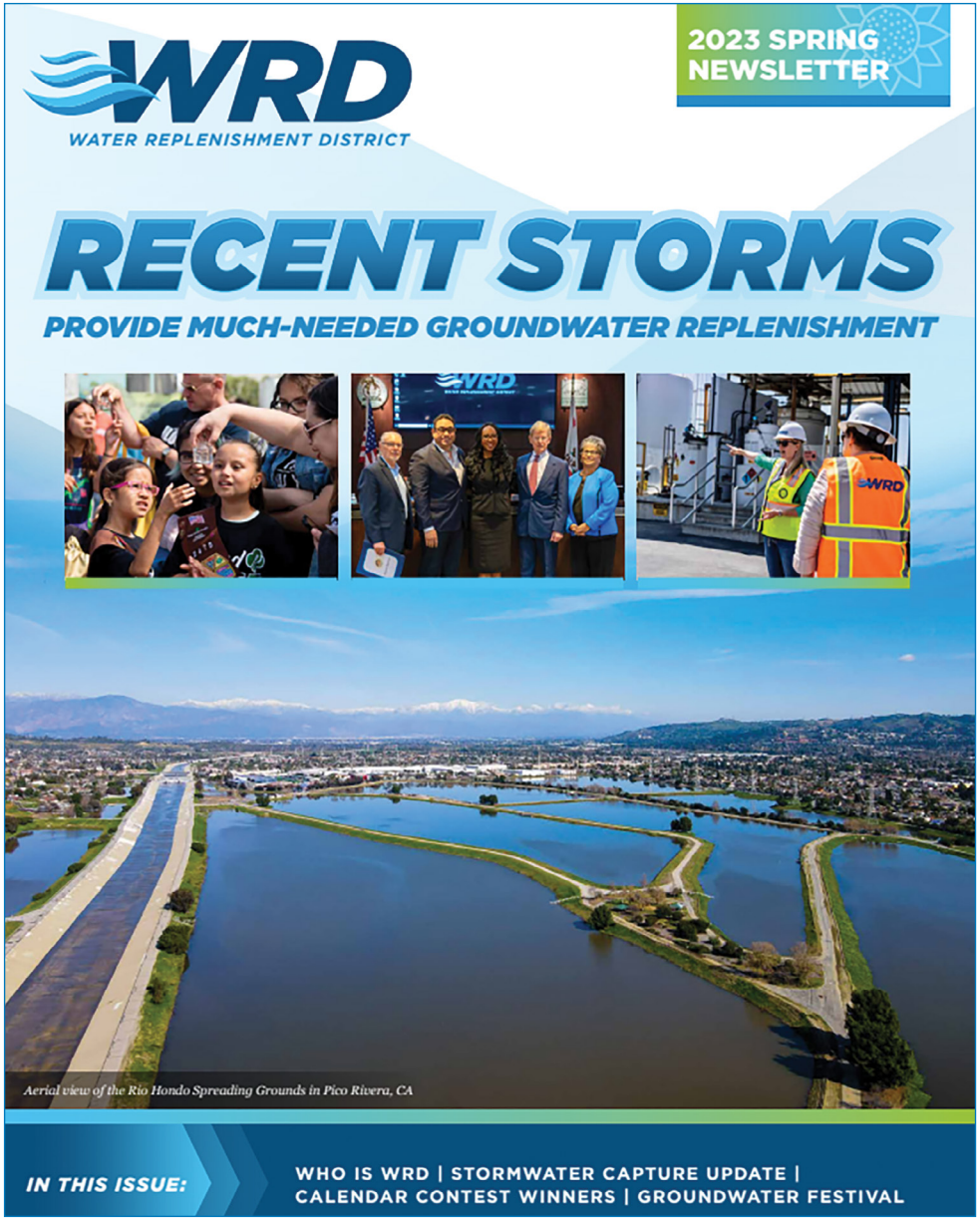
- Renegotiated and executed a new water purchase agreement with Long Beach Water Department for the recycled water supply to Leo J. Vander Lans Facility.
- Executed a Memorandum of Understanding with the Los Angeles County Department of Public Works to initiate the development of a Joint Power Authority (JPA) for cooperative operations of replenishment and resiliency facilities.
- Applied for and received a Title XVI authorization and $4.9M for the Regional Brackish Water Reclamation Program.
- Developed and implemented a PFAS Remediation Program to provide over $34 million of funding for the pumping community for remediation of PFAS.

External Affairs Department

- Developed a comprehensive virtual field trip program for Kindergarten through 12th-grade students at the Albert Robles Center for Water Recycling and Environmental Learning.



- Executed a successful COVID-19 outreach program informing the public that the virus has no effects on their water which had over 2.5 million views.
- Developed four newsletters mailed to half a million residents throughout the service area.
- Created new Eco Gardener Classes and hosted 30 in-person and virtual classes.
- Advocated for increased funding for PFAS remediation at the State and Federal levels.


WRD
WATER REPLENISHMENT DISTRICT
2023 SPRING NEWSLETTER
RECENT STORMS
PROVIDE MUCH-NEEDED GROUNDWATER REPLENISHMENT
Aerial view of the Rio Hondo Spreading Grounds in Pico Rivera, CA
IN THIS ISSUE:
WHO IS WRD | STORMWATER CAPTURE UPDATE |
CALENDAR CONTEST WINNERS | GROUNDWATER FESTIVAL

WRD Strategic Priorities for Fiscal Year 2024

WRD leadership identified key Strategic Priorities which describe the resources put into place to achieve our mission and accomplish our strategic goals. The Strategic Priorities are outlined and described below:

Human Resources: One of WRD's greatest assets is its people. WRD will ensure the recruitment and retention of a talented, highly qualified and diverse workforce to drive productivity and innovation within WRD. WRD's human resources include Executive Management, leadership and support staff, and interns.

Capital Program Development: Ensuring WRD's services continue to bring significant value to the region is our priority. This includes efficiently managing and maintaining WRD's infrastructure and investing in system improvements to continue the fulfillment of our mission. Capital Program Developments include water treatment facilities, wellhead treatment programs, replenishment monitoring infrastructure, groundwater monitoring well equipment, and engineering and hydrogeology expertise

Financial Stability: WRD will maintain strong financial standing through accurate budgeting and pursuing appropriate low-cost funding sources. Financial stability will be maintained by planning wisely for our financial future, enhancing our revenue stability, ensuring reasonable costs, and continuous improvement of financial transparency. WRD's financial resources include funds obtained through the Replenishment Assessment, revenues from water sales, and outside funding from revenue bonds and public or private grant and loan programs.

Groundwater Technical Expertise: WRD was established as the groundwater management agency responsible for maintaining the quality and quantity of groundwater in the region. To continue our mission, WRD relies on technical resources including an extensive asset management system, databases of groundwater monitoring and usage data, hydrogeological data, and spatial data, and historical WRD technical, operations, and budgeting reports.

Long Term Water Resource Planning: Given the impacts of climate change and issues that affect access to water resources, WRD must continue planning for long-term water shortages and accessibility. Planning resources include inter-departmental technical expertise, historical data and predictive modeling, and well-established relationships with local, state, and federal stakeholders.

Stakeholder and Community Engagement: WRD has built a reputation of being a reliable and innovative public agency and has been able to build support for large-scale projects through its stakeholder and community engagement. The district will continue this path utilizing external affairs operations including inter-agency coordination, legislative and governmental efforts, community education programs and grants advocacy.

WRD successfully completed the Water Independence (WIN) Now Program including the Albert Robles Center Advanced Water Treatment Facility which realized a long-term goal of eliminating imported water use for groundwater replenishment. The district is continually adapting this program to deal with the new normal of water shortages caused by climate change, increased conservation, and drought. The district is focused on new efforts to develop local supplies of water and regional sustainability.

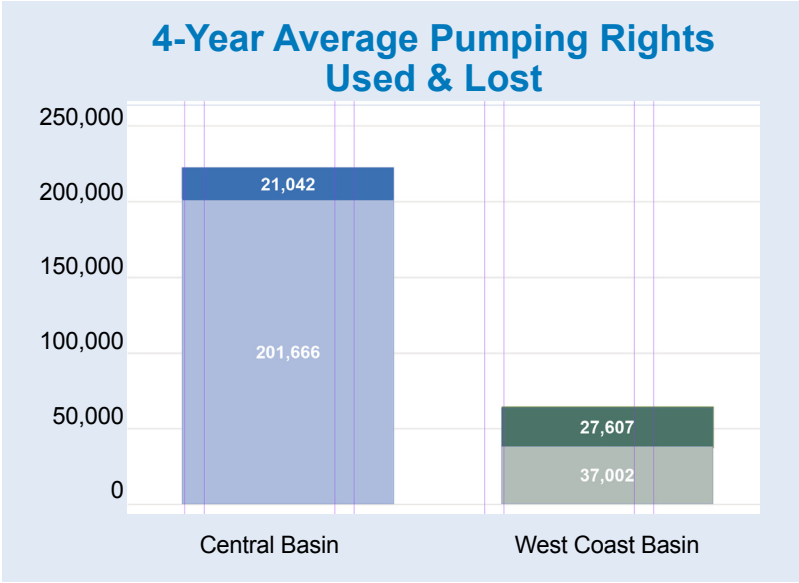
WRD's new effort- WIN4ALL aims to further offset the region's imported water use by working with regional partners such as the Los Angeles County Sanitation Districts, Metropolitan Water District, Los Angeles Department of Water and Power, Los Angeles Bureau of Sanitation, West Basin Municipal Water District, and Central Basin Municipal Water District to secure locally sustainable groundwater supplies for the greater Los Angeles Basin. Key components of WIN4ALL include expanded recycled water sources and increased stormwater capture. Combined, these goals prioritize local supply and maximize the use of available groundwater storage capacity in our groundwater aquifers.

As droughts intensify in our state, it is important that we invest in water infrastructure projects that will ease the strain on our state's water supply and offset the demand for drought-sensitive surface water.

WRD's Regional Brackish Water Reclamation Program (RBWRP) is a major groundwater desalination project that will treat up to 20 million gallons of water a day. This multi-faceted program includes the installation of groundwater

monitoring wells, extraction wells, implementation of advanced desalination technologies, and injection wells to replenish the West Coast Basin. The new source of drinking water may be used in the cities of Torrance, Manhattan Beach, Lomita, cities served by the Golden State Water Company, California Water Service, and the Los Angeles Department of Water and Power.

The real key to a sustainable drought-proof future lies under our feet. Groundwater aquifers are immense natural reserves, currently with empty storage space that can hold nearly a year's water supply for WRD's service area of four million people, located in southern Los Angeles County. The RBWRP will produce water that may be used to replenish groundwater basins and offset the demand for drought-sensitive and unsustainable imported surface water. Water used for the RBWRP will be derived from local sources and help to build a more drought resilient future.



Brackish Groundwater Reclamation Program

A collaborative effort to remediate a brackish groundwater plume in the West Coast Basin

WRD was established in 1959 by a vote of the people after groundwater was contaminated due to unregulated over pumping of the basins. During the 1940s and 1950s, modernization proved to be a boon for business, but it had unintended consequences for groundwater management. The construction of homes and high rises on undeveloped land changed the landscape of Los Angeles County. Streams and riverbeds that previously served as conduits to carry rainfall into basins were paved over. The resulting runoff made its way to the ocean rather than into groundwater

basins. Consequently, changes in groundwater pressure enabled seawater to migrate into the basins, an ecological process called seawater intrusion. This made some groundwater water too salty to drink which is called brackish water. After seawater barrier injection wells were installed to create an artificial pressure barrier that prevents seawater intrusion, the brackish plume became trapped.

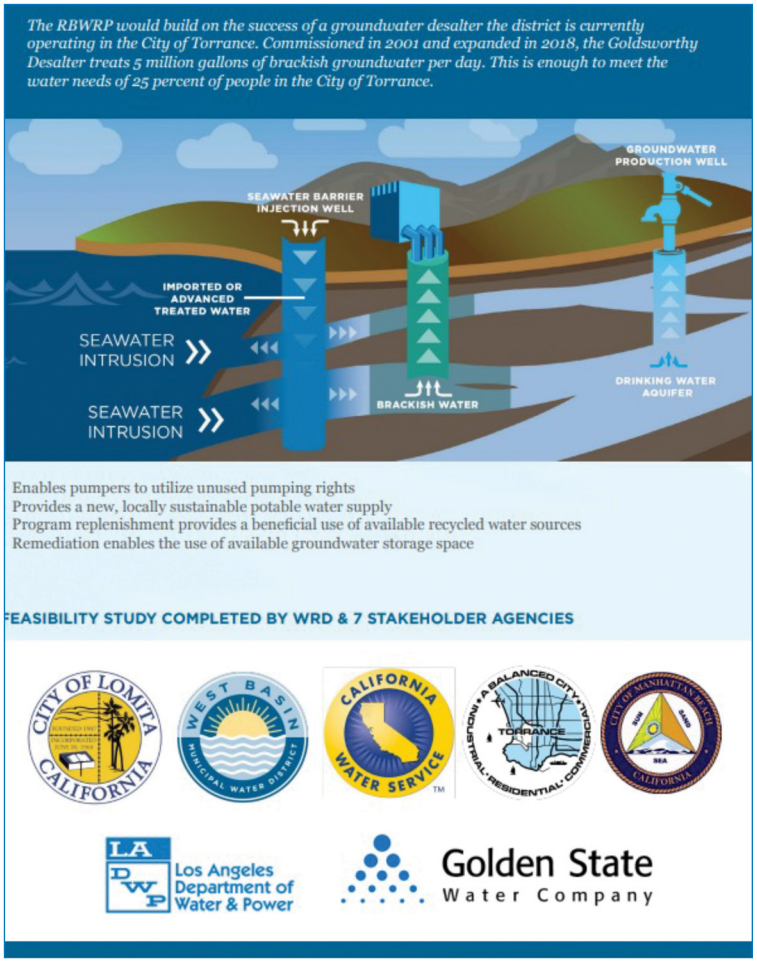
The brackish plume is approximately 600,000-acre feet and is trapped under the South Bay in Los Angeles County. The plume extends to the Gage, Silverado, Lynwood, and Lower San Pedro aquifers. To help visualize the scale of this, one acre foot is equivalent to one football field covered in water. This means the plume is large enough to cover 600,000 football fields in one foot of salty water.

If treated, the brackish plume can be used as a supply of drinking water. When removed from the aquifer, it also leaves space available to store drinking water for future use. With 95% of the Western United States experiencing drought and decreasing availability of water from the Colorado River and Bay Delta, every drop of treated water can help ease the strain on California's water supplies.

Proposed Solution: WRD's Regional Brackish Water Reclamation Program

The objective of WRD's Regional Brackish Water Reclamation Program (RBWRP) is to treat brackish water, and store drinking water in available empty aquifers for future use. Specifically, the program will treat up to 55- acre feet (20 million gallons) of water a day. The program will include the installation of:

- Groundwater monitoring wells to better define the brackish plume geometry and track long-term trends
- Groundwater extraction wells to remove brackish water from the aquifers
- Microfiltration and reverse osmosis technologies to treat brackish water
- Injection wells to store recycled water, to replenish the basin and balance the increased pumping associated with the RBWRP



PFAS Remediation Program

WRD is at the forefront of assisting with remediation of per-and polyfluoroalkyl substances (PFAS) affected groundwater sources.

PFAS are bioaccumulatory; these substances can build up in the human body and environment. The Environmental Protection Agency (EPA) states exposure to unsafe levels of certain PFAS substances may result in adverse health effects.

On February 6, 2021, the California Department of Drinking Water announced the response level (RL) for two of the most commonly used PFAS: 10 parts per trillion for PFOA and 40 parts per trillion for PFOS based on a running four-quarter average.

There are over 34 wells with PFAS levels above the RL in WRD's service area, and there are 13 different water purveyors that operate these PFAS-affected wells. Water purveyors with PFAS-affected wells above the RL must notify the public about the well or move the well out of use.

Some water purveyors have turned off their wells due to PFAS levels above the RL. These purveyors would be unable to bring the well back online without the PFAS Remediation Program. The threat of well closure is especially critical in low-income communities, where lost production can significantly increase the cost of tap water.

WRD's approach to water remediation is to act quickly and treat wells affected by contaminants before it spreads. The objective of WRD's PFAS Remediation Program is to treat PFAS-affected wells. The Program is a regional water treatment program that offers financial and technical support to water purveyors seeking to treat PFAS-affected wells.

PFAS are present in many everyday products including shampoo, stain resistant products, cookware, and other consumer items. Though we are exposed to small amounts of PFAS through day-to-day products higher concentrations of PFAS in groundwater can be associated with industrial-scale sources.

The PFAS Remediation Program provides the institutional support water purveyors need to treat PFAS-affected wells

and maintain an uninterrupted supply of water. Support is currently offered to water purveyors with wells that exhibit PFAS levels above the response level.

The PFAS Remediation Program offers clear benefits to the community. The program:

- Supports water purveyors in extracting and treating groundwater contaminated by PFAS
- Helps ensure an uninterrupted supply of groundwater
- Protects groundwater basins from further harm that could arise from contaminant migration
- Preserves groundwater for four million people and reduces community exposure to PFAS

WRD's proven strategy to ensure uninterrupted access to high-quality groundwater is to remediate wells affected by contaminants before it spreads. The benefit of the PFAS Remediation Program is removal of contaminants from the water and reducing public exposure to PFAS. It also ensures an uninterrupted supply of high-quality groundwater at affordable rates.

The greatest benefit of the PFAS Remediation Program is that prevents the spread of PFAS throughout WRD's service area. Some immediate benefits of the program include:

1. **Prevent Potential Spike in Replenishment Assessment (RA):** Waterpurveyors must pay a "replenishment assessment" (RA) to access groundwater. If all water purveyors affected by PFAS stopped pumping immediately, financial projections show that the RA could increase by 15%. The PFAS Remediation Program helps to maintain stable RA fees for water purveyors.
2. **Long-term Cost Savings:** Groundwater extraction, plus the annual cost of PFAS treatment operations and maintenance, is approximately 50% less than the local cost of imported water
3. **Bringing Wells Online:** Some water purveyors had to shut down wells due to PFAS contamination. These purveyors would be unable to bring the well back online without support from WRD's PFAS Remediation Program.
4. **Continued Access to Groundwater:** Some water purveyors do not have the required piping to access imported water. The only viable option these purveyors have is to ensure their customers have continued access to water is to remediate PFAS-affected wells. This option is only made possible through WRD's PFAS Remediation program.

Fiscal Year 2024 Budget Overview

Short-term Factors Influencing Fiscal Year 2024 Budget

The challenges and short-term factors which impact the development of the District's budget are different every year. This could range from the amount of rainfall, drought conditions, legislation affecting water usage and economic conditions. Over the past year, the Southern California region has experienced above average rainfall (25.64 inches) through May 5, 2023. The normal rainfall for this time period is 14.89 inches, so the District is 172% of normal. Even with the significant increase in water to the basin, drought conditions, conservation signals from local governments and clean water regulations will continue to curtail water usage and increase water costs. This is exacerbated by higher prices for basic necessities that is putting pressure on local governments and utilities to minimize rate increases for water, gas and electricity.

Although record rainfall is great for the Basin, the downside is a lower demand for water which in turn decreases overall groundwater pumping. This coupled with the factors described above can be attributed to lower than normal groundwater pumping. For Fiscal Year 2024, groundwater pumping has been lowered from 213,000 acre-feet to 205,000 acre-feet. Pumping is the primary driver in the determination of the Replenishment Assessment the pumpers pay for every acre-foot of groundwater pumped during the Fiscal Year. This was the case in the Fiscal Year 2024 budget. The Replenishment Assessment increased from $411/acre-foot in Fiscal Year 2023 to $423/acre-foot in Fiscal Year 2024, or a 3.1% increase, which includes a $12/acre-foot for the per- and polyfluoroalkyl substances (PFAS) program.

Each year, the District calculates the Cost to Provide Service to determine the revenue required for the ensuing Fiscal Year. Based on the proposed budget, the Cost to Provide Service for Fiscal Year 2024 is $87.3 million or a Replenishment Assessment of $439/acre-foot. The Board of Directors authorized the use of up to $3,300,000 to reduce the impact of the Replenishment Assessment or an overall reduction of $16/acre-foot.

The Fiscal Year 2024 budget includes revenues for anticipated carryover conversions. This occurs when a pumper determines it is in their interest to convert a pumping right to storage and pays the District even though it has not pumped its right – but, rather reserves the water to be pumped in a future year. The estimated carryover conversion revenues in Fiscal Year 2023 budget are $6.5 million for Fiscal Year 2024. The increase seen to Carryover Conversion is the result of some pumpers exercising rights to convert set amounts of pumping into storage with the expectation of extracting that water from storage in the subsequent year at the prior year price. WRD will have to

review this strategy going forward as the amount of storage has been increasing offsetting the current year assessable pumping estimates used for the budget,

WRD owns and operates 3 Treatment and Production facilities, Albert Robles Center for Water Recycling and Environmental Learning (ARC), Leo J. Vander Lans Water Treatment Facility and Goldsworthy Desalter. For Fiscal Year 2024 WRD has a total budget of $22.4 million. This is approximately $3 million higher than the budget for Fiscal Year 2023. The is an acceptable increase considering the inflation and high costs in general.

Although Basin conditions have improved in the basin over the past couple water years, we are not completely out of pre-drought conditions. The District will continue to replenish with recycled water and continue to monitor groundwater levels in the Central and West Coast basins.

Long-range Financial Plans

In the past, a large percentage of replenishment water for the Central and West Coast Basins came from sources in Northern California and the Colorado River. Over the last 15 years, the District has moved to its goal of independence from imported water through the Water Independence Now (WIN) initiative, a series of projects that fully utilize storm water and recycled water sources to restore and protect the groundwater resources of the Central and West Coast Groundwater Basins.

Going forward, the District will continue to partner with organizations with similar objective that will improve the supply of clean water to the basin and the pumping community. Currently, WRD plans to participate in operation Pure Water Southern California with the Metropolitan Water District of Southern California and Project NEXT with the Los Angeles Department of Water and Power:

Pure Water Southern California (formerly called the Regional Recycled Water Program) is a proposed partnership between The Metropolitan Water District of Southern California (Metropolitan) and the Los Angeles County Sanitation Districts (Sanitation Districts) to beneficially reuse cleaned wastewater that currently is being discharged to the Pacific Ocean from the Sanitation Districts' Joint Water Pollution Control Plant (JWPCP) in the city of Carson.

Operation NEXT is a new water supply initiative by LADWP and LASAN that will recycle 100% of available treated wastewater from the Hyperion Water Reclamation Plant for beneficial reuse by 2035. This will improve the water supply resiliency and reliability for Los Angeles and help achieve long-term sustainability goals. The initiative is undergoing environmental review with a Notice of Preparation in accordance with CEQA. The project will also reduce LADWP's dewatering and water importing program.

WRD will also be increasing the capacity of the Torrance Desalter to provide additional water, these initiatives target specific contaminants threatening the groundwater's quality. WRD is not only ensuring the delivery of safe and clean water but is also fortifying the region's resilience against future water quality challenges.

WRD Management

Stephan Tucker
General Manager

Rob Beste
Assistant General Manager / Chief Operating Officer

Greg Black
Chief Financial Officer

Eric Owens
Manager of Engineering and Operations

Brian Partington
Manager of Hydrogeology

Esther Rojas
Manager of Watermaster Services and Water Resources

Angie Mancillas
Manager of External Affairs

Dina Hidalgo
Manager of Administration and Human Resources

Evan Lue
Manager of Data and Technology Services (DTS)

Tom Knoell
Water Operations Superintendent

Binhyen Bui
Accounting Supervisor

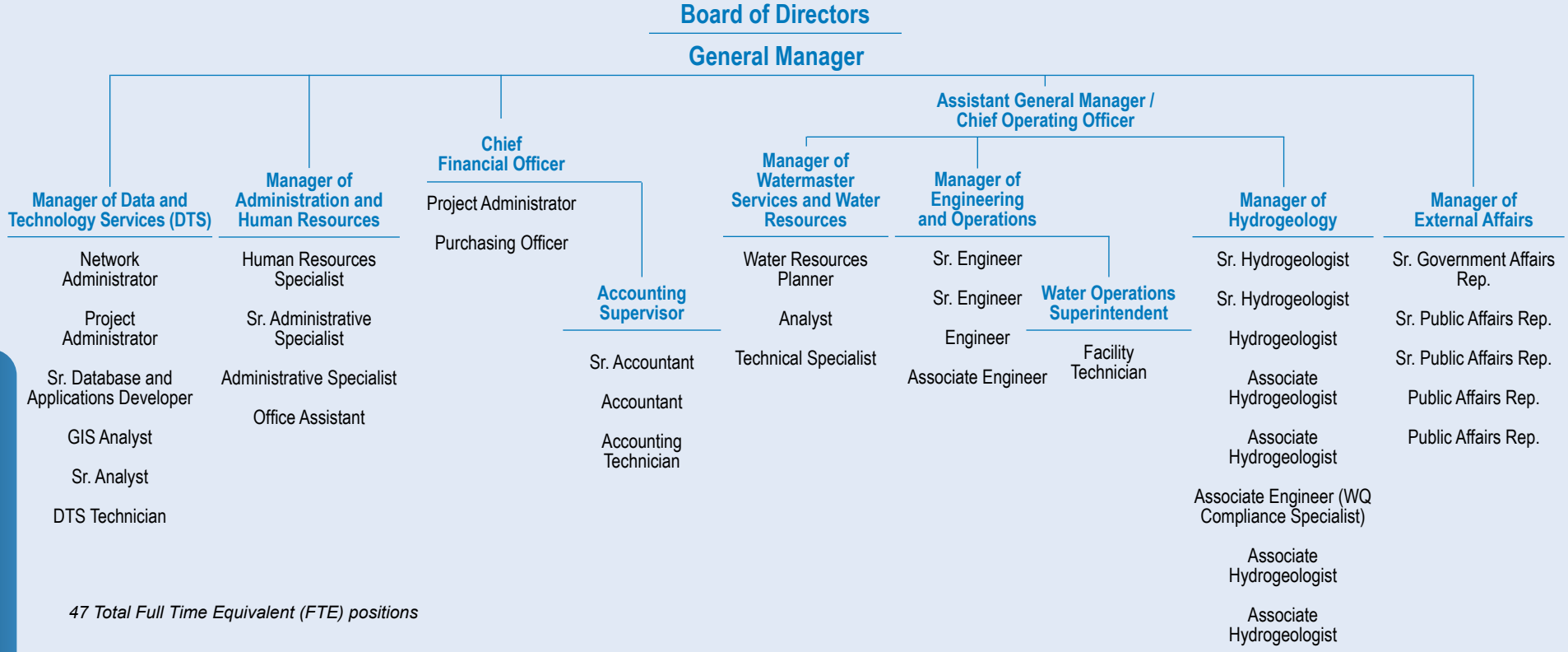
Organization Chart and Staffing Summary

The District has 46 budgeted professional and administrative staff in Fiscal Year 2023, 43.5 staff positions are paid for through the collection of the Replenishment Assessment and 2.5 staff positions are allocated to the District's Watermaster function and are paid for independently outside of the Replenishment Assessment.

In Fiscal Year 2024, District will continue to fill in the vacant positions that were frozen in prior years due to the COVID-19 pandemic. The District's staffing on its various projects remains relatively stable. WRD's organizational structure adjusts from time to time to adapt to changes in the District responsibilities and to provide increased efficiencies.

Organization Chart

Effective July 1, 2023



47 Total Full Time Equivalent (FTE) positions

Table 2

Summary of Personnel by Department

	FY 2022 Budget	FY 2023 Budget	FY 2024 Budget	Change from FY 2023 Budget
General Management				
General Manager	1	1	1	0
Assistant General Manager/Chief Operating Officer	1	1	1	0
Hydrogeology Department				
Manager of Hydrogeology	1	1	1	0
Senior Hydrogeologist	2	2	2	0
Hydrogeologist	1	1	1	0
Associate Hydrogeologist	2	3	3	0
Associate Engineer	1	1	1	0
Assistant Hydrogeologist	1	1	1	0
Water Resources & Watermaster Department				
Manager of Water Resources & Watermaster	1	1	1	0
Senior Water Resources Planner	1	0	0	0
Water Resources Planner	0	1	1	0
Senior Analyist	1	0	0	0
Analyst	0	1	1	0
Technical Specialist	1	1	1	0
Engineering Department				
Manager of Engineering & Operations	1	1	1	0
Water Operations Superintendent	1	1	1	0
Senior Engineer	1	2	2	0
Engineer	2	1	1	0
Associate Engineer	1	1	1	0
Facilities Technician	0	1	1	0
Finance Department				
Chief Financial Officer	1	1	1	0
Accounting Supervisor	0	1	1	0
Financial Analyst	1	0	0	0
Project Administrator	1	1	1	0
Senior Accountant	3	2	1	(1)
Purchasing Officer	1	1	1	0
Accountant	0	1	1	0
Accounting Technician	1	1	1	0

Table 2

Summary of Personnel by Department (cont.)

	FY 2022 Budget	FY 2023 Budget	FY 2024 Budget	Change from FY 2023 Budget
External Affairs				
Manager of External Affairs	1	1	1	0
Senior Government Affairs Rep.	1	1	1	0
Senior Public Affairs Rep.	1	2	2	0
Public Affairs Rep.	1	2	2	0
Administration and Human Resources Department				
Manager of Administration and HR	1	1	1	0
Human Resources Specialist	0	1	1	0
Senior Administrative Specialist	1	0	1	1
Administrative Specialist	1	1	1	0
Senior Office Assistant	1	0	0	0
Office Assistant	0	1	1	0
Data and Technology Services				
Manager of Data & Technology Services	1	1	1	0
Network Administrator	1	1	1	0
Project Administrator	1	1	1	0
Online Data & Technology Specialist	1	0	0	0
Senior Database & Applications Developer	0	1	1	0
Geographic Information Systems Analyst	1	1	1	0
Technical Specialist	1	0	0	0
Senior Analyst	0	1	1	0
DTS Technician	0	0	1	1
TOTAL	**42**	**46**	**47**	**1**

Kiewit Infrastructure Constructors Inc. - Leo J. Vander Lans Water Treatment Facility
Slideshows - February 11

Financial Policies

Budget Controls and Revisions

The District reports its activities as an enterprise fund, which is used to account for operations that are financed and operated in a manner similar to a private business enterprise. The intent of the District is that the costs of managing the groundwater basins on a continuing basis be financed or recovered primarily through user charged replenishment assessments, capital grants and similar funding. Revenues and expenses are recognized on the full accrual basis of accounting.

Operating Revenues result from exchange transactions associated with the District's principal activity. Exchange transactions are those in which each party receives and gives up essentially equal values. Non-operating revenues, such as grant funding and investment income, result from non-exchange transactions in which the District gives (receives) value without directly receiving (giving) value in exchange. Operating expenses, such as water purchases, are the result of the District's exchange transactions along with associated expenses for running the District's day-to-day operations. Non-operating expenses, such as interest paid on debt service or election costs are the result of expenses that do not relate to the District's day-to-day operations.

Basic of Accounting and Budgeting

The basis of accounting and budgeting refers to the method of recognition of revenues and expenses in financial and budgetary reporting.

The District operates as a utility enterprise, and Enterprise Funds are accounted for using the accrual basis of accounting. Revenues are recognized when earned and expenses are recognized when incurred.

During the year end June 30, 2012, the District implemented certain provisions of Government Accounting Standards Board (GASB) No 62, Codification of Accounting and Financial Reporting Guidance contained in Pre-November 30, 1989 FASB and AICPA Pronouncements, specifically the accounting for rate-regulated activities which allows deferral of the recognition of revenues until the related costs or charges associated with the rates assessed are incurred. The District's accounting and financial reporting systems are maintained in compliance with Generally Accepted Accounting Principles and standards of the Government Accounting Standards Board (GASB).

As the District's financials are accounted for as an Enterprise Fund, the budget is prepared based on the full accrual basis of accounting. Revenues are recognized when earned and expenses are recognized when a liability is incurred. Exceptions are as follows:

Depreciation and amortization are handed differently in financial reporting and budgetary reporting. In financial reporting, depreciation and amortization are included, and the repayment of principal on debt is not reported as expenses. In budgetary reporting, depreciation and amortization are excluded, and the repayment of principal on debt as expenditures are included.

Financial Reporting

The District's basic financial statements are presented in conformance with the provisions of Government Accounting Standards Board (GASB) Statement No. 34, "Basis Financial Statement and Management's Discussion and Analysis for State and Local Governments". This statement established revised financial reporting requirements for state and local governments throughout the United States for the purpose of enhancing the understandability and usefulness of financial reports.

Budgetary Policies

The District adopts an annual budget for planning, control, and evaluation purposes. Budgetary control and evaluation are affected by comparisons of actual revenues and expenses with planned revenues and expenses for the period. Each year, the Board of Directors follows the legislation as set forth in the California State Water Code when preparing and adopting the annual budget and establishing the ensuing year's Replenishment Assessment.

Replenishment Assessment Policy

On or before the second Tuesday of May each year, the Board of Directors, in accordance with California Water Code Section 60315 sets the Replenishment Assessment rate for the ensuing fiscal year. In order to prepare for this action, the District holds public hearings in the spring of each year to determine to what extent the estimated costs for the ensuing year shall be paid for by a Replenishment Assessment. In preparing for these hearings, the District develops an annual operating budget and updates its five-year capital plan. These documents outline the funds needed to:

1. Purchase replenishment water
2. Protect and preserve the groundwater supply
3. Pay for the related administrative expenses

Investment Policy

The Board of Directors has adopted an investment policy that conforms to California Government Code Sections 53600-53686. The objectives of the investment policy are safety, liquidity, and yield. In 2009, at the direction of the Board of Directors, the District implemented its Community Banking Program and invested in several local community banks that are fully insured by the Federal Deposit Insurance Corporation (FDIC) or secured as required by state law. The Board of Directors reviews the adopted investment policy on an annual basis and approves any changes.

Capital Assets

Capital assets acquired and/or constructed are capitalized at historical cost. District policy has set the capitalization threshold for reporting capital assets at $10,000 and for software at $5,000. Donated assets are recorded at estimated fair value at the date of donation. Upon retirement or other disposition of capital assets, the cost and related accumulated depreciation are removed from the respective balances and any gains or losses are recognized. Provision for depreciation is computed using

the straight-line method over the following estimated useful lives of the assets:

Table 3
Capital Assets

Asset	Useful Life (in years)
Service Connection	50
Monitoring and Injection Equipment	3 to 20
Building and Improvements	40
Improvements other than Buildings	10 to 40
Machinery and Equipment	10 to 20
Autos and Trucks	3 to 7
Office Furniture and Equipment	5 to 10
Utility Plant and Equipment	30

Procurement Policy

Purchases will be made in accordance with the District's Procurement Policies & Procedures as outlined in the District's Administration Code. The District gives preference to local businesses when the District enters into contracts for materials, supplies and equipment(MSE), construction and professional services totaling under $40,000. Summarized below are the significant provisions of the District's procurement policies and procedures:

1. All contracts for construction work, professional services, materials, supplies and equipment (MSE) shall be in writing and, at a minimum, include the relevant scope of work, duration and terms of payment (Authority: Water Code § 60230.5; Government Code § 54202)
2. All contracts valued less than $40,000 may be approved and signed by the General Manager or other District's representative authorized by the Board of Directors. The General Manager may not execute multiple contracts on behalf of the District with the same person or entity within a one-year period that cumulatively total $40,000 or more without the Board of Directors' prior approval (Authority: Water Code § 60622(b)).
3. All contracts valued $40,000 or more shall be authorized by the Board of Directors and signed by the President and the Secretary except that the Board of Directors may, by resolution for a specific expense, authorize the General Manager or the other District's representative to sign contracts in the name of the District, not to exceed $100,000 (Authority: Water Code § 60622(a)).
4. Where the Materials, Supplies, and Equipment (MSE) contract amount is less than $100,000, an informal MSE Contract Solicitation may be made by the General Manager or their Designee, without written bids, and by informal quotes through telephone, mail or electronic inquiry, comparison of prices on file or otherwise. Every attempt shall be made to receive at least three price quotations. Where the contract amount is $100,000.00 or more within any twelve (12) month period, the District shall advertise for bids by issuing a formal MSE Contract Solicitation.
5. Before making any contract for construction work or

purchase of MSE that total $40,000 or more within any 12 month period, the District shall advertise for bids by issuing a Contract Solicitation.

6. Advertising should be in a newspaper of general circulation in Los Angeles County at least once a week for four consecutive weeks. Advertisement for bids shall set forth all of the following information:
   a. That plans and specifications for the work to be done can be seen and obtained at the District's office;
   b. That the Board of Directors will receive sealed bids for the contract;
   c. That the contract will be awarded to the lowest responsive and responsible bidder; and
   d. That bids will be publicly opened at a given time and place.
7. Bids shall be opened in public at the time and place stated in the notice inviting bids. Two District employees and/or representatives shall be present at the bid openings. As each bid is opened, the bidder's name and bid amount shall be announced. At the conclusion of the bid opening, the name of the apparent low bidder and its bid amount shall be announced. A tabulation of all bids received shall be open for public inspection during regular business hours for a period of not less than 30 calendar days after the bid opening.
8. Before making any contract for professional services, the District may solicit a Request for Proposals (RFP) for such services. However, a RFP is not required for professional services contracts. The District from time to time may issue a request for qualifications for the purpose of developing a list of qualified consultants to provide professional services for future work. Prior to issuing a request for qualifications or a request for proposal, District staff shall obtain the approval from the Board of Directors.
9. Request for qualifications may be advertised in a publication of the respective professional society or by any other means reasonably calculated to reach its intended audience. Upon review and receipt of the qualifications from the interested consultants, the District shall develop the list of qualified consultants based upon criteria established by the District.
10. The District has an economic interest in leveraging the money it spends when contracting with private firms for construction, professional services, and materials, supplies and equipment to maximize competition for District Contracts and to ensure open access to contracting opportunities to businesses that reflect the diversity of the District's service area. It is, therefore, the District's policy to encourage and solicit participation in the performance of Construction, Professional Services, and MSE Contracts by individuals and businesses, including, but not limited to, SBEs, DVBEs, LBEs, and Other Business Enterprises (OBEs). To attract the greatest number of qualified bidders, the District promotes and supports broad-based participation in its contracting activities in order to stimulate participation by responsible bidders who might otherwise be prevented or discouraged from participating in the District's procurement activities.

The following table summarizes the District's purchasing thresholds:

1	Professional:		
	Threshold	**Signing Authority**	**Approval Authority**
	Small Dollar Thresholds (<$10K)	Informal: at least 3 bids at GM discretion	GM and other District Rep (AGM/CFO)	GM Approval
	$10K - $40K	Informal: at least 3 bids	GM and other District Rep (AGM/CFO)	GM Approval
	$40K - $100K	Informal: at least 3 bids	Board	Board Approval
	>$100K	Formal	Board	Board Approval

2	Other Services:		
	Threshold	**Signing Authority**	**Approval Authority**
	Small Dollar Thresholds (<$10K)	Informal: at least 3 bids at GM discretion	GM and other District Rep (AGM/CFO)	GM Approval
	$10K - $40K	Informal: at least 3 bids	GM and other District Rep (AGM/CFO)	GM Approval
	$40K - $100K	Informal: at least 3 bids	Board	Board Approval
	>$100K	Formal	Board	Board Approval

3	MSE:		
	Threshold	**Signing Authority**	**Approval Authority**
	Small Dollar Thresholds (<$10K)	Informal: at least 3 bids at GM discretion	GM and other District Rep (AGM/CFO)	GM Approval
	$10K - $40K	Informal: at least 3 bids	GM and other District Rep (AGM/CFO)	GM Approval
	$40K - $100K	Informal: at least 3 bids	Board	Board Approval
	>$100K	Formal	Board	Board Approval

4	Construction Services (excludes Maintenance):		
Threshold		**Signing Authority**	**Approval Authority**
<$25K	Informal: at least 3 bids	GM and other District Rep (AGM/CFO)	GM Approval
>$25K	Formal	Board	Board Approval
Threshold		**Signing Authority**	**Approval Authority**
<$25K	Informal: at least 3 bids	GM and other District Rep (AGM/CFO)	GM Approval
$25K - $40K	Formal	Board	Board Approval
$40K - $100K	Formal	Board	Board Approval
>$100K	Formal	Board	Board Approval

Debt Management

Each year during the budgeting process the Board of Directors reviews the District's Capital Improvement Plan to determine the ensuing year's capital needs. Based on this review, the Board of Directors determines whether there is a need for any additional long-term debt financing or whether projects can be funded on a pay-go basis.

If the Board of Directors determines that additional debt financing is necessary, the Board holds public workshops in order to obtain stakeholder input relating to any increases to the Replenishment Assessment due to annual debt service payments. Additionally, as part of this process, the District prepares a five-year financial projection in order to ascertain the long-term impact to the Replenishment Assessment. The Board of Directors approves the debt management structure when adopting the five-year Capital Improvement Plan.

Auditing

As required by the California State Water Code Section 60292, the district shall order, review, and maintain on file an independent, audited financial statement not later than 180 days from the conclusion of the District's fiscal year. The independent audited financial statement shall be prepared by a certified public accountant and shall be consistent with standards provided in the Generally Accepted Government Auditing Standards. Copies of the independent audited financial statement shall be submitted to the Governor, the Senate Committee on Governance and Finance or its successor, the Assembly Committee on Local Government or its successor, and the California State Auditor on or before December 31 of each year.

Internal Control Structure

The Board of Directors manages the District's internal control structure through the Board-adopted Administrative Code, which provides internal control guidelines. They also monitor internal controls through communications with the independent financial auditor. District Management is responsible for the establishment and maintenance of the internal control structure that ensures the assets of the District are protected from loss, theft, or misuse. The internal control structure also ensures that adequate accounting data are compiled to allow for the preparation of financial statements in conformity with generally accepted accounting principles. The District's internal control structure is designed to provide reasonable assurance that these objectives are met. The concept of reasonable assurance recognizes that (1) the cost of control should not exceed the benefits likely to be derived, and (2) the valuation of costs and benefits requires estimates and judgments by management.

Risk Management

The District is exposed to various risks of loss related to torts, theft of, damage to and destruction of assets, errors and omissions, injuries to employees, and natural disasters. The District is a member of the Association of California Water Agencies/Joint Power Insurance Authority (ACWA/JPIA), an intergovernmental risk sharing joint powers authority created to provide self-insurance programs for California water agencies. The purpose of the ACWA/JPIA is to arrange and administer programs of self-insured losses and to purchase excess insurance coverage. Risk management policy is not adopted by the Board of Directors but is a requirement of membership in the ACWA/JPIA.

Fund Balance/Net Assets

Within governmental funds, equity is reported as fund balance; proprietary and fiduciary fund equity is reported as net position. Fund balance and net position are the difference between fund assets plus deferred outflows of resources and liabilities plus deferred inflows of resources reflected on the balance sheet or statement of net position.

Reserve Policies

The annual analysis of the District's reserve funds is an important part of responsible financial planning, particularly as the District transitions from an agency that produces water to one that produces water and operates and maintains three capital facilities.

Restricted Reserve Fund

Debt Service Reserve	Established pursuant to the debt covenants in the Clean Water State Revolving Fund Loan. The District is required to maintain one year of debt service in reserve as security for the State Revolving Fund Loan

Unrestricted Reserve Fund

Water Purchase Carryover & Rate Stabilization Reserve	Ensures the District's ability to acquire or develop water supplies to replenish the Central and West Coast groundwater basins and to stabilize rates.
Operating Reserve	Provides needed working capital and to help ensure against unforeseen events, including lower than expected sales, unbudgeted expenses, emergencies (e.g. earthquakes or other natural disasters), and other unforeseen events. Due to the potential impact of COVID-19 on projected District revenues, at its meeting on April 23, 2020, the Board of Directors increased the Operating Reserve from three months to four and a half months of the cost of operations.

Encumbered Program Funds - Capital

Safe Drinking Water Reserve	Accounts for, and fund loans and grants to help clean up the groundwater basin.
Well Rehabilitation & Construction Reserve	Provides zero interest loans to help finance well construction and rehabilitation to increase pumping capacity in the basin.
PAYGO Capital Fund	Funds various capital projects and periodic replacement of assets with expected useful life to three to twenty years.
PFAS Remediation Fund	Funds PFAS remediation program.

WRD Fund Allocation

Operating & Capital Expenses by Fund Allocation

California Water Code Sections 60220 through 60226 describe the broad purposes and powers of the District to perform any acts necessary to replenish, protect, and preserve the groundwater supplies of the District. To meet statutory responsibilities, WRD has instituted numerous projects and programs in a continuing effort to effectively manage groundwater replenishment and groundwater quality in the Central and West Coast Basins. These projects and programs include activities that enhance the replenishment program, increase the reliability of the groundwater resources, improve and protect groundwater quality, and ensure that the groundwater supplies are suitable for beneficial uses. These projects and programs have had a positive influence on the basins, and WRD will continue these activities into the ensuing year as a necessary act to replenish, protect, preserve and enhance the groundwater resources in the basins.

The following sections discuss the projects and programs that WRD will continue or initiate during the upcoming budget year. The tables below breakdown the expenses by fund. The percentages are calculated by relating the costs to the purpose benefited by those costs – replenishment or clean water. The capital expenses are funded through long-term financing.

Relationships of Funds, Projects, & Programs

The District operates two major funds: the Replenishment Fund and the Clean Water Fund. Expenses from the projects and programs are allocated to each fund, reflecting the benefits arising from these expenditures. For budget purposes, projects and programs are separated into either Replenishment, Clean Water Projects or Dual Purpose Projects and Programs. Dual purpose projects and programs are those that address both replenishment operations and clean water efforts.

Replenishment Fund

The annual amount pumped from the Central and West Coast Groundwater Basins is greater than the natural replenishment of groundwater aquifers, creating an annual deficit or annual overdraft. The District has the authority and responsibility under the California State Water Code to acquire water supplies for recharge to make up this overdraft.

The Replenishment Fund is the budgetary control for all expenses related to the District's replenishment efforts. This includes the following primary expenses of the District:

- Water Purchases
- Water Treatment and Production
- Water Resources
- Water Quality Programs
- Water Replenishment Support

Clean Water Fund

Consistent with the District's mission to provide, protect and preserve safe and reliable high-quality groundwater, the District annually collects nearly 600 groundwater samples from its monitoring well network. The District tests these samples for over 100 water quality constituents to produce nearly 60,000 individual data points to help track the water quality in the basins. By analyzing and reviewing the results on a regular basis, any new or growing water quality concerns can be identified and managed. In addition, the District funds programs to help prevent, reduce and eliminate contamination in the basin to increase the amount of water available for pumping.

The Clean Water Fund is the budgetary control for all expenses related to the District's efforts to provide clean and safe water to the nearly four million residents in the District's service area.

The table below illustrates Programs/Projects and Funds relationship:

Table 4

Programs/Projects Fund Allocation

Program/Project Number & Title		Replenishment Fund	Clean Water Fund
Water Purchases			
WTR	Water Costs	100%	
Water Treatment and Production			
001	Leo J Vander Lans Water Treatment Facility	100%	
002	Robert W. Goldsworthy Desalter		100%
033	Albert Robles Center (ARC)	100%	
Water Resources			
EAC	Water Conservation	50%	50%
004	Montebello Forebay Recycled Water	100%	
005	Groundwater Resources Planning Program	100%	
Water Quality Programs			
006	Water Quality Improvement Program		100%
011	Regional Groundwater Monitoring Program	50%	50%
012	Safe Drinking Water Program		100%
018	Dominguez Gap Barrier Recycled Water Injection	100%	
025	Hydrogeology Program	50%	50%
043	Regional Brackish Water Program	50%	50%
046	Well Construction & Rehabilitation Program	100%	
048	Per- and Polyfluoroalkyl Substances (PFAS) Program		100%
Water Replenishment Support			
010	Geographic Information Systems (GIS)	50%	50%
DTS	Data Technology Services	94%	6%
023	Replenishment Operations	100%	
038	Engineering Program	100%	
040	Asset Management Program	100%	
EAE	Water Education	50%	50%

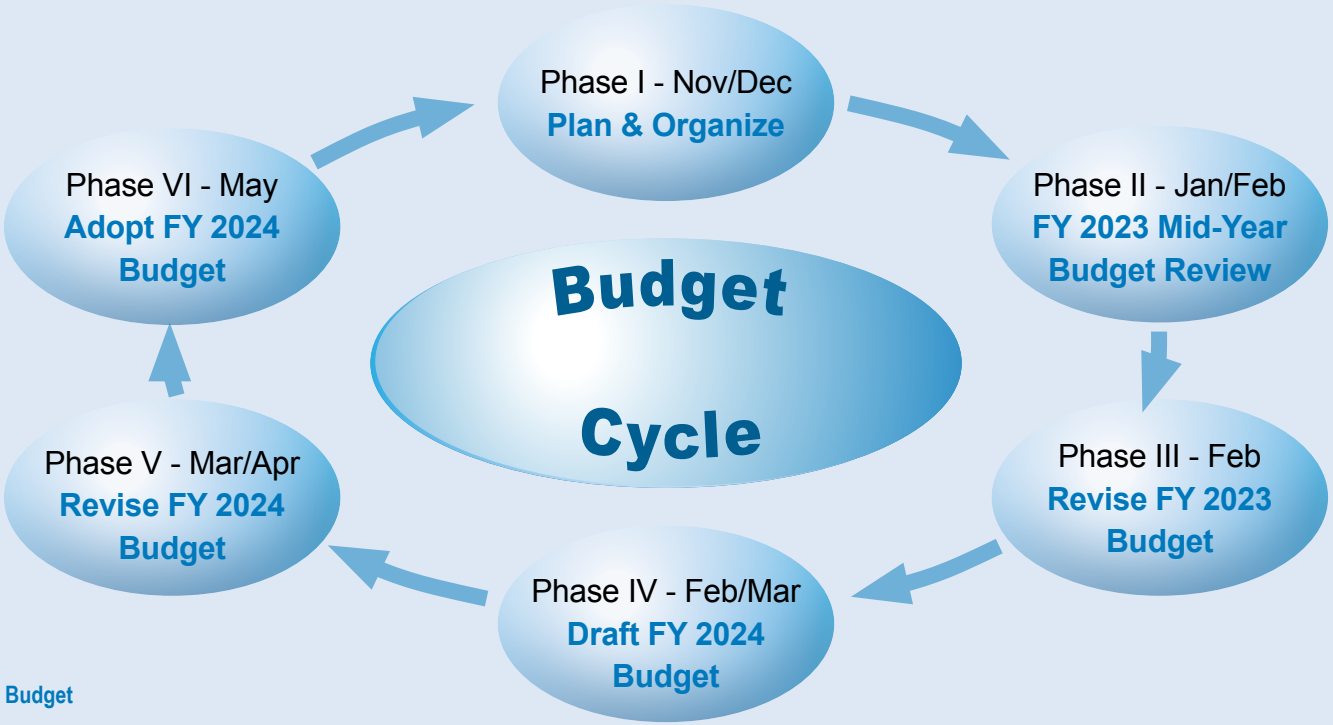

CENTRAL GROUNDWATER BASIN
Groundwater in the WRD service area is found in the aquifers of two basins - the Central Basin and the West Coast Basin
AQUITARD
AQUIFER
AQUITARD
AQUIFER
AQUIT

Budget Process

The budget process is not simply an exercise in balancing one year at a time, it is strategic in nature, encompassing a multi-year financial and operating plan that allocates resources based on identified goals and objectives. These goals and objectives were established by the Board of Directors and District staff through the District's Strategic Plan and the five-year Capital Improvement Program.

The District moved beyond the traditional concept of line-item expense control and provided incentives and flexibility to Project/Program Managers that has led to improved program efficiency and effectiveness. The District's staff continually assesses program and financial performance to encourage progress toward achieving the goals and objectives of the District.

Figure 1 - Budget Process Cycle



Plan and Organize

The budget sets forth a strategic resource allocation plan that is distinctly aligned with the District's mission and the Board of Director's goals and objectives for staff. The budget process is a year-long effort of monitoring revenue and adjusting expenses based on the changing needs of operations. The Finance Department organizes the ensuing year's budget as early as November and December the year before. This phase includes preparing election ballots for the Budget Advisory Committee (in election years), preparing a mid-year budget review as well as budget request forms that are provided to the Project/Program Managers.

FY 2023 Mid-year Budget Review

The Mid-Year Budget Review is a time when the District measures how we are tracking according to the planned budget and how we expect to end the fiscal year. It provides a financial assessment of the District's budget condition and is based on six months of actual data and six months of projected data. The mid-year analysis is also a platform and guide to the ensuing year's budget. The mid-year budget analysis is presented to the Board of Directors and the public. It is a time when the Board is given details of how well District projects and programs are aligned with the Board's goals and objectives.

Revise FY 2023 Budget

Based on feedback provided by the Board of Directors and the public, the Board may direct staff to adjust resources to various projects or programs and modify the budget through Board approval. This process helps to ensure that the Board is aware of the financial and human resources allocated to each of the District's goals.

Draft FY 2024 Budget

With the mid-year budget review and adjustments completed, staff prepares the first draft of the ensuing year's budget. Project/Program Managers prepare their budget requests and submits to the Finance Department who then organize and compile all budget information into a consolidated package. To confirm that all project and program expense requests are in line with the directions of the Board, the General Manager, Assistant General Manager, Chief Financial Officer along with the Finance Staff, review each individual line-item expense prior to submitting it to the Finance/Audit Committee for review. The Finance/Audit Committee of the Board of Directors is responsible to study, advise and make recommendations regarding the budget to the Board of Directors. Once reviewed and verified through the Finance/Audit Committee, the budget is presented to the Board of Directors.

Revise FY 2024 Budget

Staff makes the necessary adjustments to the budget based on the feedback obtained through meetings with the General Manager and public budget workshops with the Finance/Audit Committee and the Board of Directors. These refinements are related to reallocation of resources to best accomplish the Board's goals and objectives.

Adopt FY 2024 Budget

Based on section 60315 of the California Water Code, the Board of Directors must adopt the ensuing year's

Replenishment Assessment no later than the second Tuesday in May. The basis of the Replenishment Assessment is the annual budget, which is adopted at the same time as the Board sets the Replenishment Assessment. Every year, the District conducts a series of public budget meetings to seek comments pursuant to the Water Code and other applicable regulatory requirements.

To ensure transparency, accountability, and fiscal responsibility, the District has an independent Budgetary Advisory Committee (BAC) comprised of stakeholders from the groundwater pumping community that are charged with providing guidance and advice on budgetary, finance, and technical matters relating to the District's projects and programs. The BAC was initiated by state law under Senate Bill 620 but was sunset in January 2020. However, the Water Replenishment District's Board of Directors recognized the benefits of having the BAC and allowed its continuance through amendment of its Administrative Code to incorporate the BAC as a standing entity.

The BAC consists of seven members who serve a two-year term, are elected from among representatives of groundwater producers and who are owners or operators of groundwater producing facilities that are subject to the Replenishment Assessment. No later than the second Tuesday in April of each year, the BAC will make its recommendation to the Board of Directors of the Water Replenishment District on the annual Replenishment Assessment, reserve funds and the draft budget. After considering the recommendations from the BAC, as well as the public, the Finance/Audit Committee makes budget recommendations to the Board of Directors.

Upon final approval by the Board of Directors, the preliminary estimates will be revised accordingly to reflect the approved budget amounts and corresponding levels of services. The District's Replenishment Assessment rates have increased gradually over the years as shown in the chart below, for the District to meet the demands of maintenance and preservation of the Basins, and, thus, availability of water for pumpers to pump.

Budget Controls and Revisions

The District's budget is prepared on an annual basis and since the budget is an estimate, at times it is necessary to make adjustments to meet the priorities and needs of the District.

The first milestone in this process is the mid-year budget review. During this process, the District compiles the six months of actual financial data and projects the final six months of data to obtain a new 12-month projected budget. The Finance Department compares the adjusted 12-month projection to the original budget adopted by the Board of Directors and presents the results to the Finance/Audit Committee and the Board of Directors. The budget is revised when expenses are anticipated to exceed estimates. A report outlining the reasons for increasing any budget appropriation is prepared and submitted to the Board of Directors for consideration.

Increases in budget appropriations must be approved by the Board of Directors. Budget transfers affecting personnel and capital outlay must be approved by the General Manager. Reallocations or transfers within a department or program require the approval of the General Manager or Department Manager.

Pumper Notification Process

The District also conducts a separate process known as the Pumper Notification Process in setting the budget and Replenishment Assessment. This process generally follows the notice requirements and protest rights granted by Proposition 218 for property-related fees. However, the District conducts the process voluntarily as an extra measure for transparency and opportunity for public input and comment, and not because it believes that the Replenishment Assessment is a property-related fees that is subject to the requirements of Proposition 218. If the Board receives written protests to the proposed Replenishment Assessment from more than 50% of the active pumpers it has been given notice to, the Board will not approve an increase to the current Replenishment Assessment rate.

As part of the Pumper Notification Process, a detailed Cost of Service Report is prepared each year by the District to explain how the Replenishment Assessment complies with these requirements. The Cost-of-Service Report describes the services the District anticipates performing during the ensuing fiscal year and analyzes the costs of providing these services. The costs associated with these services are described using the best available information, along with an evaluation of the fair and equitable Replenishment Assessment necessary to cover these costs. The Cost-of-Service Report is available via the District's web site at www.wrd.org.

The District approved the Fiscal Year 2024 Replenishment Assessment of $423 per acre-foot at the public hearing on May 2, 2023. The Replenishment Assessment was approved after an extensive and transparent process to inform all parcel owners and groundwater pumping rights holders in the District's service area. The funds generated from the Replenishment Assessment cover the cost of water purchased to replenish the two largest and most utilized groundwater basins in Southern California. Moreover, the new Replenishment Assessment is critical to helping achieve the District's goal in becoming 100% independent from costly and unreliable imported water.

Budget Calendar

November/December 2022

Internal budget meetings with District Staff to communicate the expectations, responsibilities and projected timeline to all staff involved in the budget.

January 2023

The budget team interviews with Project and Program Managers to complete the Mid-Year Budget Review of the District's operations. This review process starts with six months of actual financial data from July 1 through December 31, six months of financial projections and a twelve-month analysis of all the data. The Mid-Year Budget Review serves as the basis for planning for the ensuing year's budget.

February 2023

Staff prepares budget requests for the ensuing year's budget. The Finance Department compiles all of staff's budget requests into a draft report which accounts for all the District's financial needs. The draft budget is reviewed by the General Manager and the budget team. The resulting draft budget is presented to the public through several budget workshops, ending with the final

budget workshop and the Board of Directors setting the Replenishment Assessment no later than the second Tuesday in May.

February 8, 2023 – Finance/Audit Committee

Discussed Fiscal Year (FY) 2023 mid-year budget, previewed FY 2024 proposed budget and the 5-year rate forecast model.

February 15, 2023 - Budget Advisory Committee

Previewed FY 2024 budget and the Replenishment Assessment (RA) upper limit scenarios. The Committee provided feedback on the proposed budget.

February 16, 2023 – Board of Directors

Reviewed FY 2023 Mid-Year Projection, FY 2024 proposed budget and the RA upper limit. Discussed feedback from the Budget Advisory Committee (BAC) on the proposed budget.

March 2023

Based on input received from the public budget meetings, Finance staff continues to refine the budget.

March 1, 2023 – Budget Advisory Committee

Reviewed proposed FY 2024 budget and discussed options for setting the RA upper limit. The Committee had not made a recommendation to the Board at this time.

March 7, 2023 – Budget Advisory Committee

The Committee discussed and recommended the FY 2024 RA upper limit of $409 per AF, which is a 2.5% or $10 increase on the current RA of $399 per AF including the assessment for PFAS Remediation of $12 per AF; the total Replenishment Assessment has a projected upper limit of $421 per AF.

March 8, 2023 – Finance/Audit Committee

The Committee was not submitting a recommendation and was forwarding to the Board of Directors for discussion and approval the BAC's recommendation for the FY 2024 RA upper limit of 409 per AF, which is 2.5% or $10 increase on the current RA of $399 per AF, including the assessment for PFAS Remediation of $12 per AF for a total Replenishment Assessment with a projected upper limit of $421.

March 9, 2023 – Board of Directors

The Board of Directors received and filed the 2023 Engineering Survey and Report (adopt Resolution No. 23-1199). The report determines the groundwater conditions, the District's replenishment water needs and the estimated costs for the water. The report combined with the FY 2024 proposed budget, provides the Board and the public with the necessary information to determine the RA for the next fiscal year.

The Board of Directors reviewed FY 2024 proposed budget and approved scenario 7 that has RA upper limit of $434 per AF, which is an 8.7% or $35 increase on the current RA of $399 per AF, including the assessment for PFAS Remediation of $12 per AF, for a total Replenishment Assessment with a projected upper limit of $421.

March 28, 2023 – Budget Advisory Committee

Reviewed proposed FY 2024 budget and discussed options for setting the RA upper limit. The Committee had not made a recommendation to the Board at this time.

April 2023

Present the proposed budget to the Board of Directors for consideration in setting the annual Replenishment Assessment rate.

April 4, 2023 – Board of Directors

The Board had taken no action at this time until a subsequent BAC meeting, which is held on April 11, 2023, prior to the Board of Directors meeting on April 18, 2023.

April 11, 2023 – Budget Advisory Committee

The Committee recommended the Board of Directors to consider budget scenario 4, which has $0 increase on the current RA of $399 per AF, utilize $5.8 million of reserve funds and estimate pumping of $205,000 AF for FY 2024.

April 12, 2023 – Finance/Audit Committee

The Committee recommended an RA increase of 3.1% utilizing $3.3 million of reserve funds and estimating pumping of 205,000 AF for FY 2024.

April 18, 2023 – Board of Directors

The Board of Directors received and filed the FY 2024 Cost of Service Report. The report is intended for use in the FY 2024 budget review and public input process.

The Board discussed FY 2024 proposed budget and convened public hearing on the FY 2024 proposed RA per Water Code section 60306.

May 2023

Adopt the proposed budget and Replenishment Assessment for the next fiscal year.

May 2, 2023 – Board of Directors

The Board convened the continued Water Code Public Hearing, received public comments and closed the Public Hearing. The Board opened the Pumper Notification Public Hearing on the Fiscal Year 2024 RA, received staff reports and testimony, and closed the Public Hearing.

The Board of Directors adopted Resolution No. 23-1204 to establish the FY 2024 Replenishment Assessment at $423 per AF.

May 16, 2023 – Board of Directors

The Board adopted the Fiscal Year 2024 budget reflecting the RA of $423 per acre-foot, which includes a $12 per acre-foot for the PFAS program.

The initial draft budget was presented to the Budget Advisory Committee in February 2023. The BAC requested the District to see if reductions were possible to bring the budget closer to the Budget adopted for FY 2022-2023. As a result of this request, total expenses were reduced by $1.9 million and revenues increased by $0.9 million for a total reduction of $2.8 million to the cost of service.

RESOLUTION NO. 23-1204

A RESOLUTION OF THE BOARD OF DIRECTORS OF THE WATER REPLENISHMENT DISTRICT OF SOUTHERN CALIFORNIA LEVYING A REPLENISHMENT ASSESSMENT ON THE PRODUCTION OF GROUNDWATER FROM THE GROUNDWATER SUPPLIES WITHIN THE DISTRICT DURING THE FISCAL YEAR COMMENCING JULY 1, 2023 AND ENDING ON JUNE 30, 2024 AS PROVIDED IN SECTION 60317 OF THE CALIFORNIA WATER CODE AND MAKING FINDINGS AND DETERMINATIONS REGARDING SAID ASSESSMENT IN ACCORDANCE WITH SECTIONS 60315 AND 60316 OF THAT CODE

WHEREAS, the Board of Directors (the "Board") of the Water Replenishment District of Southern California (the "District") on February 2, 2023, in compliance with California Water Code § 60300, timely ordered an Engineering Survey and Report (the "ESR") to be made regarding the groundwater supplies and groundwater quality issues within the District; and

WHEREAS, the ESR has been prepared pursuant to the Board's request and the ESR has been available for inspection by any interested party for the time required by law; and

WHEREAS, the Board, by Resolution No. 23-1199, has declared that funds shall be raised to purchase water for replenishment of groundwater supplies within the District during the ensuing fiscal year, beginning July 1, 2023 through June 30, 2024 (FY 2023/24), and to accomplish all acts reasonably necessary pursuant to said replenishment, including, but not limited to, the development and operation of capital projects, and that such funds shall be raised by a replenishment assessment as provided in Chapter 2 of Part 6 of the California Water Code, and further finding that the funds to be raised will benefit, directly or indirectly, all of the persons or real property and improvements within the District; and

WHEREAS, the Board, by Resolution No. 23-1199, has declared that funds shall be raised to remove contaminants from groundwater supplies and to exercise any other power under California Water Code § 60224, including, but not limited to, the development and operation of capital projects, and that such funds shall be raised by a replenishment assessment as provided in Chapter 2 of Part 6 of the California Water Code, and further finding that the funds so raised will benefit, directly or indirectly, all of the persons or real property and improvements within the District; and

WHEREAS, the District prepared a Cost of Service Report dated April 18, 2023, which has been made available to the public, describing the services the District anticipates performing in FY 2023/24, estimating the costs of providing those services, and calculating a Replenishment Assessment that ensures that those costs are spread amongst water producers in an equitable manner; and

WHEREAS, on April 18, 2023, as required by California Water Code § 60307, the Board held a public hearing for the purpose of determining whether and to what extent the estimated cost of water replenishment programs and the estimated cost of water quality programs for the ensuing year shall be paid for by a replenishment assessment; and

WHEREAS, notice of the April 18, 2023 hearing was published as required by law; and

WHEREAS, in addition to the public hearing, the District also held budget workshops that were open to the public, where the District provided the public with information concerning its FY 2024 budget, which is directly related to the Replenishment Assessment; and

WHEREAS, the District's Budget Advisory Committee (BAC) met and the Board has received and considered recommendations from the BAC; and

WHEREAS, all evidence and testimony relevant to the ESR and the Board's determination that such a Replenishment Assessment shall be levied was heard at the public hearing; and

WHEREAS, all other findings required by law have already been made, including, but not limited to, any findings required by California Water Code § 60231; and

WHEREAS, the Board desires to move forward with the levy of a Replenishment Assessment for the upcoming year.

NOW, THEREFORE, BE IT RESOLVED AND DECLARED BY THE BOARD OF DIRECTORS OF THE WATER REPLENISHMENT DISTRICT OF SOUTHERN CALIFORNIA AS FOLLOWS:

1. That said Board pursuant to §60315 of the Water Code of the State of California finds as follows:

   a) The annual overdraft of the preceding water year, Fiscal Year beginning July 1, 2021 through June 30, 2022 was 108,409 acre-feet as provided in the 2023 ESR and any updates.

   b) The estimated annual overdraft for the current water year, Fiscal Year beginning July 1, 2022 through June 30, 2023, is 68,800 acre-feet as provided in the 2023 ESR and any updates.

c) The estimated annual overdraft for the ensuing water year, Fiscal Year beginning July 1, 2023 through June 30, 2024, is 64,800 acre-feet as provided in the 2023 ESR and any updates.

d) The accumulated overdraft as of the last day of the preceding water year was 829,140 acre-feet as provided in the 2023 ESR and any updates.

e) The estimated accumulated overdraft as of the last day of the current water year is 806,800 acre-feet as provided in the 2023 ESR and any updates.

f) The total production of groundwater from the groundwater supplies within the District during the preceding water year was 206,316 acre-feet as provided in the 2023 ESR and any updates.

g) The estimated total production of groundwater from groundwater supplies within the District for the current water year is 204,000 acre-feet as provided in the 2023 ESR and any updates.

h) The estimated total production of groundwater from the groundwater supplies within the District for the ensuing water year is also 210,000 acre-feet as provided in the 2023 ESR and any updates.

i) Water Year 2021/22 had below normal precipitation, decreased pumping, and a close to average amount of replenishment by WRD. Groundwater levels in some areas of the basin decreased, but overall there was slight increase of 1.2 feet District wide. This led to a decrease in groundwater storage of approximately 20,000 AF. The 2023 ESR and any updates provide details of water levels and basin conditions.

j) The District is currently experiencing 217% of normal rainfall through January 17, 2023. Water levels in the Montebello Forebay rose nearly 23 feet by the start of the winter season and are presently about 3.6 feet higher than the previous water year (January 2022). Basin conditions have not changed much over the past couple water years and are still below pre-drought conditions. The 2023 ESR and any updates provide details of water levels and basin conditions.

k) The quantity of water that should be purchased by the District for the replenishment of the groundwater supplies of the District during the ensuing water year is 93,000 acre-feet, which includes 65,000 acre-feet at the spreading grounds and 28,000 acre-feet at the seawater barrier wells. Details of the calculations for these amounts are presented in the 2023 ESR and any updates, and on budget discussions with the Board and BAC.

l) The source and estimated cost of the water available for the replenishment described in Section (k) is presented in the 2023 ESR and any updates.

m) The estimated net costs of replenishing the groundwater supplies with the water so purchased is $39,651,941 (including Dominguez Gap Barrier water). The derivation of this amount is described in the 2023 ESR, the 2023 Cost of Service Report, and any updates to these documents, and on Board and BAC decisions at various public meetings. The estimated rate of the replenishment assessment required to fund these purchases based on the anticipated pumping in the ensuing year described in Section (h) is $193 per acre-foot of groundwater pumped.

The estimated additional costs to the District for its replenishment program costs, estimated capital costs, and other costs relating to the replenishment of the groundwater supplies, are $41,757,005 The estimated rate of the replenishment assessment required to fund these costs based on the anticipated pumping in the ensuing year described in Section (h) is $204 per acre-foot of groundwater pumped. A listing of the projects and programs and their intended objective – replenishment and/or clean water – is provided in the 2023 ESR and Cost of Service Reports, and any updates to these documents.

The anticipated pumping for the calculations above is 205,000 acre-feet or 5,000 acre-feet less than the 210,000 acre-feet of total ground water production shown in Section (h). The pumping variance between Sections (h) and (m) are due to lower pumping trends resulting from drought restrictions, contamination placing wells out of service and ensuing year pumping estimates from the top 20 pumpers. The pumping trends were based on the 4-year average (199,229 acre-feet) from FY 2018/19 through FY 2021/22. The top 20 pumpers account for approximately 80% of the total pumping and estimates for FY 2023/24 added 5,093 acre-feet to the pumping average, approximately 2.5 percent. An additional 678 acre-feet was added to the remaining pumpers to reach 205,000 acre-feet or 2 percent.

n) It is not anticipated that additional replenishment funds need to be raised in the ensuing year for future replenishment water that should be purchased in the ensuing year but cannot be purchased due to an anticipated unavailability of replenishment water in the ensuing year.

o) The estimated rate of the replenishment assessment required to be levied upon the production of groundwater from the groundwater supplies within the District during the ensuing fiscal year for the purposes of accomplishing replenishment activities (replenishment water plus replenishment projects and programs) is $397 per acre-foot.

p) Contaminants should be removed from groundwater supplies during the ensuing fiscal year pursuant to the District's projects and programs

described in the 2023 ESR and any updates, the District's capital improvement program, and the District's proposed annual budget document. The estimated costs to the District for the groundwater quality program for the FY 2023/24 fiscal year are estimated at $8,638,125 . The estimated additional rate of replenishment assessment required to be levied upon the production of groundwater from the groundwater supplies within the District during the ensuing fiscal year for those purposes is $42 per acre-foot.

q) The programs for the removal of contaminants or other actions under Water Code § 60224 are multi-year programs.

r) The estimated amount of reserves on hand at the end of the FY 2023/24 will not exceed the applicable limitations provided in Water Code Sections 60290.

2. The Board of Directors authorizes the use of up to $3,300,000 to reduce the impact of the Replenishment Assessment. This reserve fund contribution will be used to reduce the overall replenishment assessment by $16 per acre-foot. After accounting for other revenue, possible debt financing, or use of reserves , the estimated rate of the replenishment assessment required to be levied upon the production of groundwater from the groundwater supplies within the District during the ensuing FY 2023/24, for the purpose of accomplishing such replenishment and water quality programs by the District is $423 per acre-foot of yearly groundwater production, which has been "bought-down" from $439 through the use of reserve funds. After accounting for the use of an estimated $15,897,000 in other revenue, said replenishment assessment, along with the funds from the "buy down" will produce the approximate necessary funds to pay the following costs: $397 per acre-foot for the cost of purchasing water, financing capital improvement projects and other costs relating to accomplishing groundwater replenishment and $42 per acre-foot for clean water programs. Of the $397 per acre-foot allocated to accomplishing groundwater replenishment, $93 per acre-foot is allocated to capital projects. Of the $42 per acre-foot allocated to clean water programs, $6 per acre-foot may be allocated to capital projects. General and administrative expenses of the District will be met on a pro tanto basis given each function's (replenishment and clean water) load factor on operations. , netting a Replenishment Assessment of $423 per acre-foot.

3. Prior to accounting for other revenue, possible debt financing, or use of reserves, the entire cost of purchasing water for replenishment for the ensuing fiscal year shall be paid for by the assessment identified in Section 2 above. The cost of removing contaminants from groundwater supplies and taking other actions authorized under Water Code § 60224 shall be paid for by the assessment identified in Section 2 above, from possible debt financing for capital improvement projects, and from reserve funds as necessary maintained in accordance with

Water Code § 60290. The costs of those capital projects to be undertaken in the ensuing fiscal year, but for which no capital construction accounts have been established pursuant to Water Code § 60291, shall also be paid for by the reserve fund maintained in accordance with Water Code § 60290.

4. All of the estimated costs for the ensuing fiscal year for water replenishment programs and for groundwater quality programs by the District as found in Section 1 of this Resolution shall be paid for by a replenishment assessment levied pursuant to Water Code § 60317 and by the reserve fund maintained by the District. There is hereby levied on the production of groundwater from groundwater supplies within the District during the fiscal year commencing July 1, 2023 and ending June 30, 2024, a replenishment assessment in the amount of $423 per acre-foot produced during said fiscal year.

5. This Replenishment Assessment complies with the California Environmental Quality Act ("CEQA"), based on any one of the following grounds:

(a) That the District's groundwater replenishment program is exempt from CEQA pursuant to CEQA Guidelines §15261(a), in that it is an ongoing project commencing at a date such that an environmental impact report has not been required, and the FY 2023/24 program is part of that ongoing project.

(b) Funds generated by the RA will be used for (1) operating expenses, (2) financial reserve needs, (3) purchasing or leasing of, equipment, materials and supplies, and (4) funds for capital projects necessary to maintain service within existing service areas. That Finding is based on documents and information provided in the record of these proceedings, including but not limited to the annual ESR, the 2023 Cost of Service Report, the proposed 2023/24 budget, and the staff's written reports and PowerPoint presentations to the Board. Further, the funds raised by the RA will not be used to expand the area or territory in which the District provides services or to fund capital projects that would expand the District's service area or system. Accordingly, the District finds that its adoption of this resolution exempt from CEQA pursuant to, among other bases, CEQA Section 20180(b) (8) and CEQA Guidelines 15261 and 15273, and the Board directs staff to file an appropriate Notice of Exemption.

(c) Notwithstanding the exemptions cited above, an Environmental Impact Report ("EIR") for the District's groundwater replenishment program was previously prepared and that EIR and program have been approved by the District's Board. Subsequent to the preparation of that EIR, the District prepared and certified a number of Mitigated Negative Declarations and Negative Declarations for various water quality and water supply projects (collectively, the "NDs"). The District has examined the imposition of a water replenishment assessment for the FY 2023/24 to determine whether an

additional environmental document must be prepared. Based on this examination, the 2023 Engineering Survey and Report and all other evidence in the administrative record of the District's proceedings herein, the District concludes that: (1) the imposition of a water replenishment assessment for the FY 2023/24 would not have any effects that were not examined in the EIR and NDs; (2) pursuant to CEQA Guidelines §15162, no new effects would occur and no new mitigation measures would be required; and (3) the imposition of a water replenishment assessment for the FY 2023/24 fiscal year is within the scope of the groundwater replenishment program covered by the EIR and NDs and such activity is adequately described in said EIR, and no new environmental document is required.

6. The Replenishment Assessment will be imposed on persons and entities that extract groundwater from the Central Basin and West Coast Basin. Extraction of groundwater from those Basins is governed by court judgments entered in 1962 and 1965 pursuant to groundwater adjudication lawsuits. Those judgments granted certain parties an allocation to pump water based on prescriptive water rights and not based on any aspect of ownership of land overlying either Basin. Accordingly, since the pumping rights granted by the Judgments were based on prescriptive water rights, the parties do not pump the groundwater pursuant to any tenancy or fee interest in the overlying land or any rights that attach as a result of a tenancy or fee interest in overlying land. Further, neither of the Judgments for the Central and West Coast Basins included a determination of the amount or extent to which any party to said Judgment may extract groundwater from said basin without exceeding the natural safe yield of said basin.

7. The purpose of the Replenishment Assessment is to fund the District's water basin management services. These services are a package of services that make high quality water available to those exercising adjudicated pumping rights and consist of: monitoring the level and quality of groundwater in the basins; purchasing and producing water needed to replenish the basins; preventing seawater contamination of the groundwater supply; funding replenishment operations; and other activities that make the basins a reliable and low-cost source of safe, high-quality water. Every activity of the District is a part of the water basin management services.

   The water basin management services benefit those charged. All persons receiving the services or benefitting from the services by exercising pumping allocations are subject to the Replenishment Assessment. Services are not provided to those who are not charged the Replenishment Assessment and do not benefit those who are not charged the Replenishment Assessment. The amount of the Replenishment Assessment does not exceed the District's reasonable costs to provide services, confer benefits and/or grant privileges as described in this paragraph. Consequently, the Replenishment Assessment is not a "tax" within the meaning of Article XIII C, Section 1(e) of the California Constitution.

Pursuant to the California Supreme Court decision in *City of San Buenaventura v. United Water Conservation District*, the District does not believe that its replenishment assessment is a "property-related fee" subject to the requirements of Article XIII D, Section 6 of the California Constitution (Proposition 218). Notwithstanding this, in the interest of public participation, the District has conducted a noticed public hearing with respect to the replenishment assessment. The fact the District has done so should not be interpreted to mean that the District believes that the requirements of Article XIII D, Section 6 apply to the replenishment assessment.

The Board notes that, in addition to replenishment assessment proceeds, the District receives an allocation of ad valorem property tax revenues. It is the intent of the Board that the District's Grants and Sponsorship Program, memberships and dues, water education expenses, and other community programs, be funded from these property tax revenues.

[RECORD OF THE VOTE AND SIGNATURES ON FOLLOWING PAGE]

PASSED, APPROVED AND ADOPTED THIS 2nd day of May 2023 by the following vote:

AYES: 5
NOES: 0
ABSENT: 0
ABSTAIN: 0

WATER REPLENISHMENT DISTRICT OF SOUTHERN CALIFORNIA

Board President

ATTEST:

Board Secretary

May 2, 2023
DATE

APPROVED AS TO FORM:

Leal, Trejo APC, Attorneys for the Water Replenishment District of Southern California

Financial Highlights

Operations and Maintenance

O&M costs are projected to be $79.4 million in fiscal year 2024. This is a $5.2 million increase from fiscal year 2023. The increase from the prior year is primarily due to increases in Water Costs of $1.0 million and higher Water Treatment and Production costs of $3.0 million. The District has been able to keep most expenses at or below the prior year budget. However, the increases at the plants and for water purchases are primarily due to inflation in labor and materials.

Revenue

Revenue from the Replenishment Assessment is projected to increase 2% or $1.9 million from fiscal year 2023. The total increase required based on the Cost of Service was actually $5.2 million above the fiscal year 2023, however a large portion of the increase was offset by Board approved use of $3.3 million from the Rate Stabilization Fund. Income from the treatment plants is not expected to see a material change. Revenue from Carryover Conversion is estimated to increase $2.5 million in fiscal year 2024 and is becoming contributing factor to lower pumping output as Pumpers putting more water in storage in the current year and extracting in the ensuing year to take advantage of the incremental increase in the replenishment assessment between fiscal years. The $12 per AF assessment was approved and added to the Replenishment Assessment for PFAS Remediation.

Debt Service

Debt Service remains unchanged from the prior year. It is anticipated that no borrowing will be required in fiscal year 2024.

Capital Improvement Plan

The 5-Year Capital Improvement Plan (FY 2024 – FY 2028) shows planned expenditures of $49.1 million in FY 2024. This includes $13 million for Infrastructure Improvement projects, $4 million for WIN4ALL projects, and $32.1 million for Groundwater Quality Protections and Remediation projects.

Table 5 – Fiscal Year 2024

Proposed Statement of Revenues, Expenses & Changes in Net Assets

	FY 2022 Actual	FY 2023 Projection	FY 2024 Budget
Operating Revenues			
Replenishment Assessment	$76,677,572	$85,853,685	$84,287,071
Carryover Conversion	7,729,897	4,000,000	6,510,000
LJVWTF - Water Supply	2,911,592	4,540,291	4,632,000
Goldsworthy Desalter Sales	4,227,871	2,678,000	3,000,000
Albert Robles Center (ARC)	593,580	1,516,335	630,000
Total Operating Revenues	**$92,140,512**	**$98,588,311**	**$99,059,071**
Operating Expenses			
Water Purchases	$31,335,792	$34,628,433	$39,651,941
Water Conservation	470,081	641,171	704,557
LJVWTF - Water Supply	5,249,509	6,045,118	7,507,812
Albert Robles Center (ARC)	8,958,467	9,157,999	11,905,618
Projects/Programs	10,591,026	12,230,782	14,048,669
Administration	1,957,350	5,030,248	5,094,313
Board of Directors	386,306	445,284	453,303
Total Operating Expenses	**$58,948,531**	**$68,179,035**	**$79,366,213**
Operating Income (Loss)	**$33,191,981**	**$30,409,276**	**$19,692,858**
Non-Operating Revenues (Expenses)			
Debt Service and Other Non-Operating Costs	$(15,633,460)	$(20,346,830)	$(20,346,830)
Other Special Programs and Supportive Costs	(1,669,329)	(6,199,174)	(3,771,028)
Property Taxes, Interest and Other Revenues/Expenses	280,053	500,500	1,125,000
Total Other Revenues (Expenses)	**$(17,022,736)**	**$(26,045,504)**	**$(22,992,858)**
Rate Stabilization Reserves	**$-**	**$-**	**$3,300,000**
Change in Net Assets	**$16,169,245**	**$4,363,772**	**$(0)**

Fiscal Year 2024 Budget

Figure 2

Fiscal Year 2024 Budget Summary

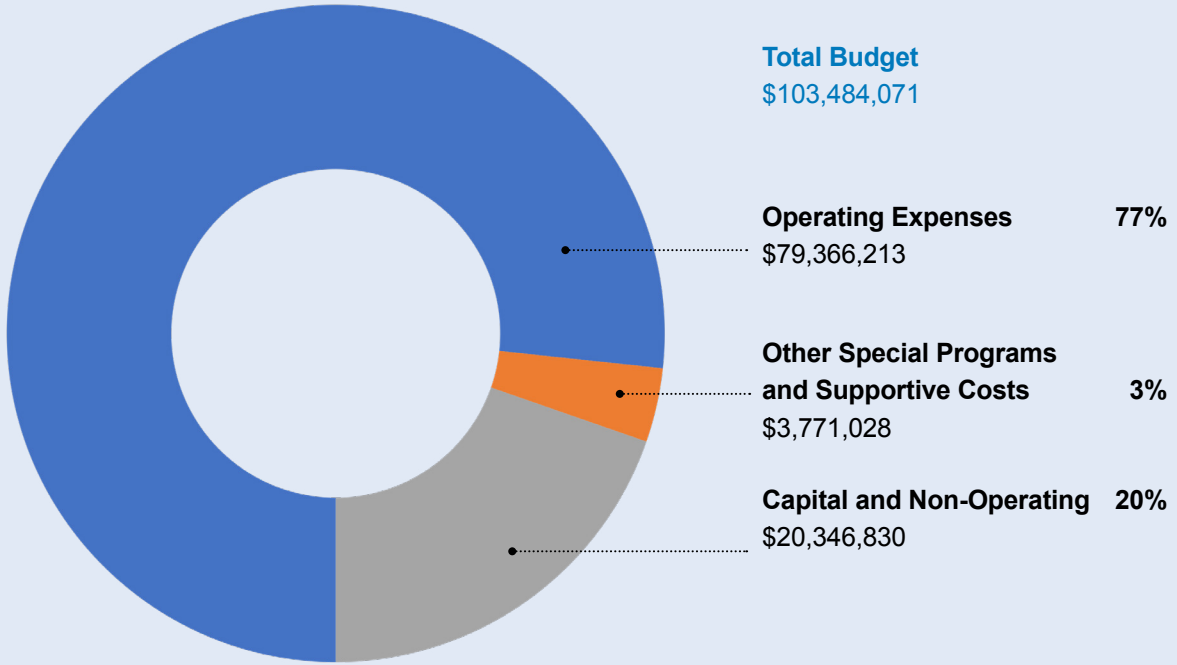


Table 6

Fiscal Year 2024 Budget

Description	FY 2023 Adopted Budget	FY 2024 Adopted Budget	FY 2024 Budget compared to FY 2023 Budget
OPERATING EXPENSES			
Water Purchases			
Water Costs	$38,617,406	$39,651,941	$1,034,535
Water Treatment and Production			
Albert Robles Center (ARC)	10,166,168	11,905,618	1,739,450
Leo J Vander Lans (LVL)	5,942,545	7,507,812	1,565,267
Goldsworthy Desalter	3,221,393	2,973,088	(248,305)
Water Resources			
Water Conservation	640,903	704,557	63,654
Montebello Forebay Recycled Water	442,702	362,003	(80,699)
Groundwater Resource Planning	1,839,911	1,985,500	145,589
Water Quality Programs			
Water Quality Improvement Program	722,842	831,833	108,991
Dominguez Gap Barrier Recycled Water	336,052	273,919	(62,133)
Groundwater Monitoring Program	1,502,568	1,455,227	(47,341)
Safe Drinking Water Program	928,305	962,084	33,779
Hydrogeology Program	600,845	1,102,111	501,266
Regional Brackish Water Program	150,000	-	(150,000)
Per- and Polyfluoroalkyl Substances (PFAS) Program	98,231	-	(98,231)
Well Construction and Rehabilitation Program	13,102	19,075	5,973
Water Replenishment Support			
Geographic Information Systems (GIS)	467,223	500,639	33,416
Data Technology Services	1,239,999	1,279,608	39,609
Replenishment Operations	258,698	296,796	38,098
Engineering Program	436,555	870,345	433,790
Asset Management	92,770	-	(92,770)
Water Education	1,090,834	1,136,441	45,607
General and Administration			
Board of Directors	529,868	453,303	(76,565)
Administration	4,840,494	5,094,313	253,819
SUB-TOTAL	**74,179,414**	**79,366,213**	**5,186,799**
OTHER SPECIAL PROGRAMS AND SUPPORTIVE COSTS			
GASB 45 (Required Retirement Funding)	1,658,384	1,300,000	(358,384)
WRD Facility Maintenance	455,140	656,028	200,888
Litigation	125,000	100,000	(25,000)
Cost of Services and Notices	15,000	15,000	-
Election Expense	1,500,000	1,700,000	200,000
SUB-TOTAL	**3,753,524**	**3,771,028**	**17,504**
DEBT SERVICE AND OTHER NON-OPERATING COSTS			
Revenue Bond Debt Service Payments	16,670,830	16,670,830	-
Additional Fund for DSC	3,250,000	3,250,000	-
Funding for PAYGO Capital Projects ($2 to fund CIP)	426,000	426,000	-
SUB-TOTAL	**20,346,830**	**20,346,830**	**-**
TOTAL BUDGET	**$98,279,768**	**$103,484,071**	**$5,204,303**
REVENUES			
Replenishment Assessment	$85,769,268	$84,287,071	$(1,482,197)
Vander Lans Income/OCWD/MWD Subsidy	4,480,000	4,632,000	152,000
Goldsworthy Desalter Income/MWD Subsidy	2,900,000	3,000,000	100,000
Albert Robles Center Income/MWD Subsidy	630,000	630,000	-
Other Income	500,500	1,125,000	624,500
Carryover Conversion	4,000,000	6,510,000	2,510,000
Rate Stabilization Reserves	-	3,300,000	3,300,000
TOTAL REVENUES	**$98,279,768**	**$103,484,071**	**$5,204,303**

Operations and Maintenance Budget

The District's Operations and Maintenance budget is divided into three major categories:

1. Operating Expenditures
2. Other Special Programs and Supportive Costs
3. Debt Service and Other Non-Operating Costs

Operating Expenditures include projects, programs and activities that enhance the replenishment operations, increase the reliability of groundwater resources, improve and protect groundwater quality and ensure that groundwater supplies are suitable for beneficial use. General and administration include the Board of Directors and Administrative related expenses.

Other special programs and supportive costs include expenses related to litigation, election expenses (which represent mandatory pass-through costs from the County Registrar-Recorder to manage the election of the District's elected officials) and WRD facility maintenance.

The District has debt service payments on its 2015 Replenishment Assessment Revenue Bonds, 2018 Replenishment Assessment Revenue Bonds and Clean Water Sate Revolving Fund Loan. Debt service is included in the third category of expenses: Capital and Other Non-Operating Expenses.

Basis for Fiscal Year 2024 Expense Estimate

The basis for the Fiscal Year 2024 operating budget is by using the Fiscal Year 2023 adopted budget and mid-year projection to establish a baseline. Adjustments are made based on changes in operations, pumping estimates and economic conditions. At the time we are preparing the budget, these are the best estimates available. Subsequent to approval of the budget and the end of the fiscal year, projected actuals are available to provide a more accurate comparison of the variances between the ensuing and prior fiscal years. Comparing the prior fiscal year adopted and projected with the FY 2024 adopted budget of $103.5 million, expenses have increased by $5.2 million and $8.8 million respectively. Water purchase cost is projected to increase by $1.0 million to $39.7 million in FY 2024.

The Albert Robles Center for Water Recycling & Environmental Learning (ARC) has been a cornerstone of the District's Water Independence Now (WIN) Initiative since 2021. The operating costs associated with the plant are projected to be $11.9 million for FY 2024, increase $1.7 million over the prior year. The budget is also reflective of added costs for a new long-term contract which will provide additional resources for the facility and its operations.

The budget for operations of the Leo J. Vander Lans Advanced Water Treatment Facility (LVL) is anticipated to increase in FY 2024 due to higher plant production costs

associated with supplying a larger percentage of advanced treated recycled water to the Alamitos Seawater Intrusion Barrier. The budget is also reflective of added costs tied to the new, long-term contract which will provide additional resources for the facility and its operations.

WRD's Safe Drinking Water Program has operated since 1991 and is intended to promote the cleanup of groundwater resources at specific well locations. Through the installation of wellhead treatment facilities at existing production wells, the District expects to remove contaminants from the underground supply and deliver the extracted water for potable purposes. Projects implemented through this program are accomplished through direct input and coordination with well owners. Expenses are projected to remain unchanged in FY 2024. The program expenses included planning and designing services for the Safe Drinking Water projects and on-call engineering service for the Disadvantage Community projects. These expenses are reimbursed through grant funding.

Other special programs and supportive costs have no significant changes in FY 2024. These cover the election expenses, the annual GASB 45 – Other Post Employment Benefits program and District's facility maintenance expenses. It should be noted that Election expenses occur every other year and the half the estimated expense is collected on an annual basis. Election expense increase significantly in Fiscal Year 2023 and the budget was increased accordingly.

The District has debt service covenants that require funds set aside to meet the District's debt service obligations. Currently, the District has three major debt instruments: Clean Water State Revolving Fund – Proposition 1 Funding, 2015 and 2018 Replenishment Assessment Revenue Bonds that are budgeted for $16.7 million in FY 2023 for the annual principal and interest payments.

The District cash funds a small portion of capital program through a PAYGO fund projected at $0.4 million in FY 2024. The districts collect $2 per AF in the Replenishment Fund assessment for PAYGO, Also, Grants received for various projects (if received after project is completed) are added to PAYGO or Operational Reserves.

The remaining projects, programs and administration are projected to increase by $1.1 million in FY 2024.

The following tables and figures provide the expense analysis which contains five-year operation and maintenance costs that are allocated by funds.

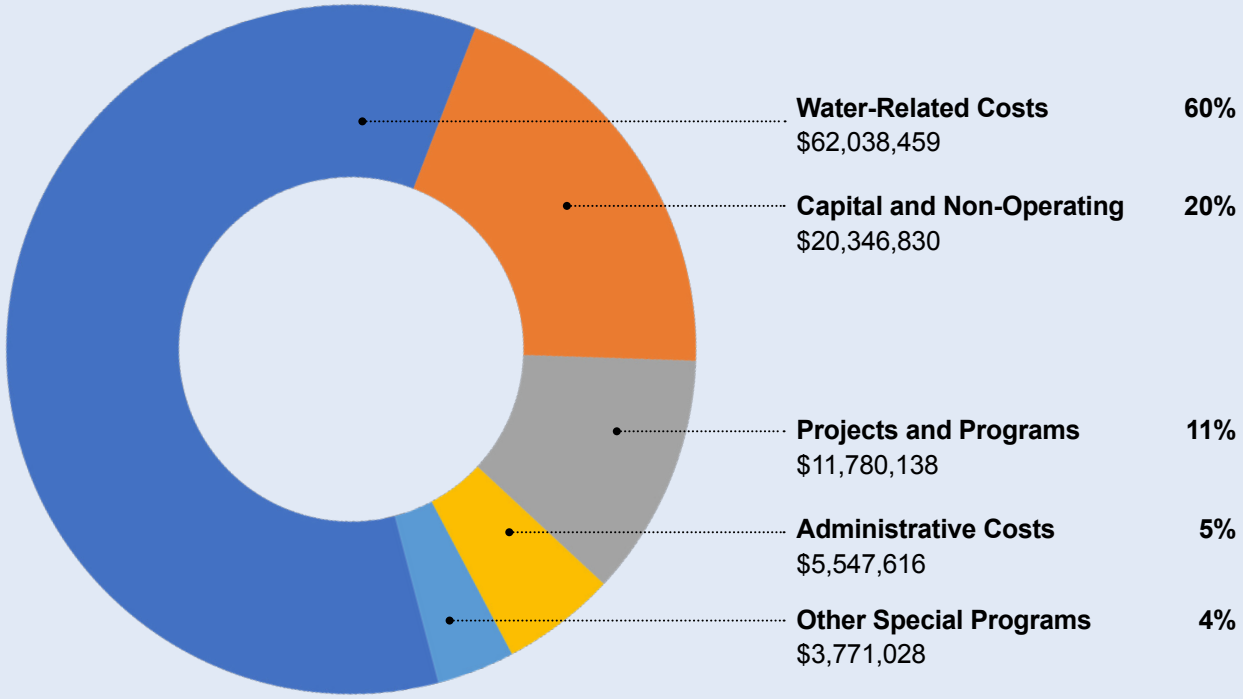
Operating Expense Detail

Water and water-related (water supply purchases, production of water or water conservation efforts) costs are the District's most significant budgetary expense approximately 60% or $62 million.

Figure 3

Total Operations & Maintenance Costs

Fiscal Year 2024 Total Operating Expenses $103,484,071



Capital and non-operating costs related to debt service are budgeted at $20.3 million or 20% of total expenses. Project and program expenses are projected at $11.8 million or 11% of total expenses. Administrative costs are projected at $5.5 million or 5% while other special programs, including Other Post-Employment Benefits (OPEB) payment and election expenses are projected at $3.8 million or 4% of total expenses

Comparison to Prior Fiscal Year 2023 Budget Expenses

Total budgeted expenses for the prior fiscal year were $98.3 million, while total budgeted expenses for fiscal year 2024 are expected to increase by $5.2 million or 5.3%t to total budget of $103.5 million. Water and water related costs increased by $4.1 million or 4.2% from $57.9 million to $62.0 million, respectively. Capital and non-operating costs

Table 6a

Fiscal Year 2024 Budget Expenses

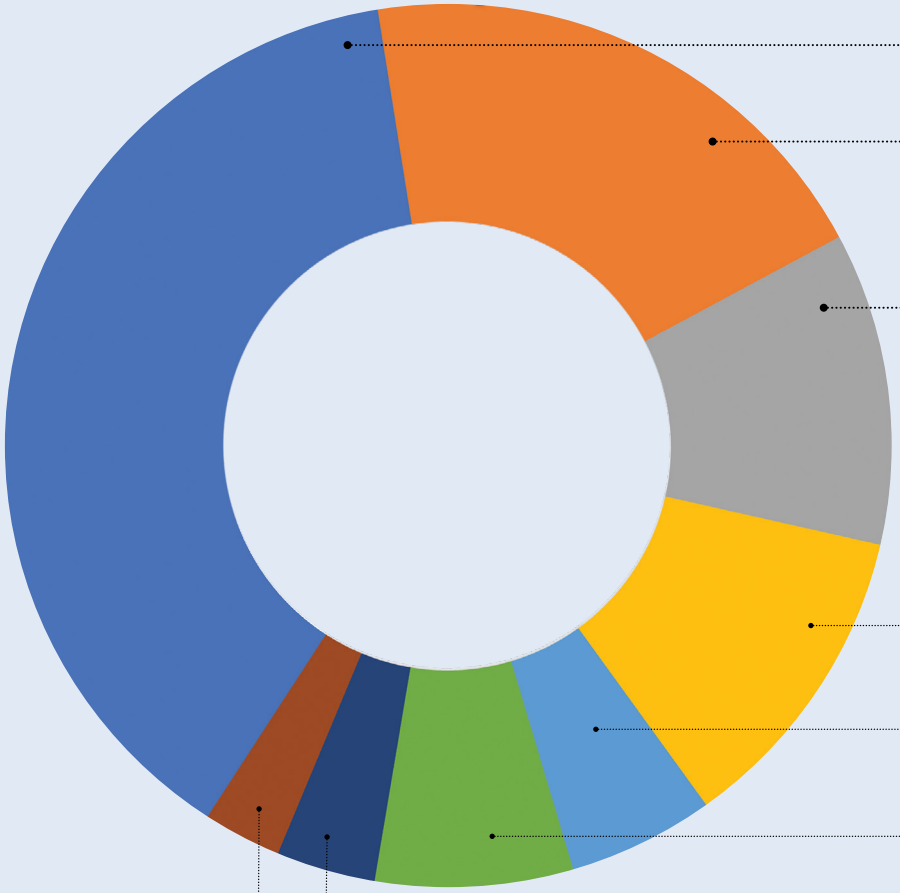
Description	FY 2023 Adopted Budget	FY 2024 Adopted Budget	FY 2024 Budget compared to FY 2023 Budget
OPERATING EXPENDITURES			
Water Purchases			
Water Costs	$38,617,406	$39,651,941	$1,034,535
Water Treatment and Production			
Albert Robles Center (ARC)	10,166,168	11,905,618	1,739,450
Leo J Vander Lans (LVL)	5,942,545	7,507,812	1,565,267
Goldsworthy Desatler	3,221,393	2,973,088	(248,305)
SUB-TOTAL	**57,947,512**	**62,038,459**	**4,090,947**
Water Resources			
Water Conservation	640,903	704,557	63,654
Montebello Forebay Recycled Water	442,702	362,003	(80,699)
Groundwater Resource Planning	1,839,911	1,985,500	145,589
Water Quality Programs			
Water Quality Improvement Program	722,842	831,833	108,991
Dominguez Gap Barrier Recycled Water	336,052	273,919	(62,133)
Groundwater Monitoring Program	1,502,568	1,455,227	(47,341)
Safe Drinking Water Program	928,305	962,084	33,779
Hydrogeology Program	600,845	1,102,111	501,266
Regional Brackish Water Program	150,000	-	(150,000)
Per- and polyfluoroalkyl substances (PFAS) Program	98,231	-	(98,231)
Well Construction & Rehabilitation Program	13,102	19,075	5,973
Water Replenishment Support			
Geographic Information Systems (GIS)	467,223	500,639	33,416
Data Technology Services	1,239,999	1,279,608	39,609
Replenishment Operations	258,698	296,796	38,098
Engineering Program	436,555	870,345	433,790
Asset Management	92,770	-	(92,770)
Water Education	1,090,834	1,136,441	45,607
SUB-TOTAL	**10,861,540**	**11,780,138**	**918,598**
General and Administration			
Board of Directors	529,868	453,303	(76,565)
Administration	4,840,494	5,094,313	253,819
SUB-TOTAL	**5,370,362**	**5,547,616**	**177,254**
OTHER SPECIAL PROGRAMS & SUPPORTIVE COSTS			
GASB 45 (Required Retirement Funding)	1,658,384	1,300,000	(358,384)
WRD Facility Maintenance	455,140	656,028	200,888
Litigation	125,000	100,000	(25,000)
Cost of Services and Notices	15,000	15,000	-
Election Expense	1,500,000	1,700,000	200,000
SUB-TOTAL	**3,753,524**	**3,771,028**	**17,504**
DEBT SERVICE & OTHER NON-OPERATING COSTS			
Revenue Bond Debt Service Payments	16,670,830	16,670,830	-
Additional Fund for DSC	3,250,000	3,250,000	-
Funding for PAYGO Capital Projects ($2 to fund CIP)	426,000	426,000	-
SUB-TOTAL	**20,346,830**	**20,346,830**	**-**
TOTAL BUDGET EXPENSES	**$98,279,768**	**$103,484,071**	**$5,204,303**

remained the same over the prior fiscal year, reflecting debt service payment associated with the 2015 and 2018 Replenishment Assessment Revenue Bonds and Clean Water State Revolving Fund Loan, and funding for PAYGO projects. Costs for projects and programs increased approximately $1.0 million or 0.9% from $10.8 million to $11.7 million, respectively. Administrative costs have no significant changes which are projected to increase approximately $0.2 million or 0.2% in fiscal year 2024.

Figure 4

Operating Expense Detail

Fiscal Year 2024 Total Operating Expenses $103,484,071



Water Purchases	$39,651,941	**38.3%**
Capital & Non-Operating	$20,346,830	**19.7%**
Projects & Programs	$11,780,138	**11.4%**
Albert Robles Center	$11,905,618	**11.5%**
Administrative Costs	5,547,616	**5.4%**
Vander Lans	$7,507,812	**7.3%**
Other Special Programs	$3,771,028	**3.6%**
Goldsworthy Desalter	$2,973,088	**2.9%**

Table 7

Water Replenishment District of Southern California

Schedule of Expenses: Trend Analysis

Description	FY 2020 Actual	FY 2021 Actual	FY 2022 Actual	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Water Purchases						
Water Costs	$35,844,159	$31,210,752	$31,335,792	$34,628,433	$39,651,941	$5,023,508
Water Treatment & Production						
Albert Robles Center (ARC)	8,412,804	9,726,250	8,958,467	9,157,999	11,905,618	2,747,619
LJVWTF - Water Supply	2,442,252	4,607,882	5,249,509	6,045,118	7,507,812	1,462,694
Goldsworthy Desalter	1,740,648	1,999,187	2,490,547	2,856,679	2,973,088	116,409
Water Resources						
Water Conservation	388,088	366,576	470,081	641,171	704,557	63,386
Montebello Forebay Recycled Water	229,720	360,834	226,206	436,607	362,003	(74,604)
Groundwater Resource Planning	305,326	1,294,512	1,294,684	1,837,117	1,985,500	148,383
Water Quality Programs						
Water Quality Improvement Program	589,344	432,460	448,517	559,663	831,833	272,170
Dominguez Gap Barrier Recycled Water	195,201	295,572	209,929	336,052	273,919	(62,133)
Groundwater Monitoring Program	1,369,793	1,388,250	1,307,448	1,499,948	1,455,227	(44,721)
Safe Drinking Water Program	712,626	451,475	429,674	594,802	962,084	367,282
Hydrogeology Program	954,923	794,125	474,855	598,595	1,102,111	503,516
Regional Brackish Water Program	6,993	117,291	38,799	-	-	-
Well Construction and Rehabilitation Program	7,487	8,521	2,665	13,102	19,075	5,973
Water Replenishment Support						
Geographic Information Systems (GIS)	241,219	214,188	271,487	453,597	500,639	47,042
Data Technology Services (DTS)	589,302	783,967	1,208,414	1,146,009	1,279,608	133,599
Replenishment Operations	328,342	185,691	228,033	258,698	296,796	38,098
Engineering Program	1,399,263	1,125,665	1,274,949	549,039	870,345	321,306
SCADA	18,435	28,598	24,950	-	-	-
Asset Management	12,671	97,982	64,745	-	-	-
Water Education	736,421	659,632	595,125	1,090,874	1,136,441	45,567
General & Administration						
Board of Directors	338,092	351,218	386,305	445,285	453,303	8,018
Administration	5,899,999	4,232,739	2,618,633	5,030,246	5,094,313	64,067
Other Special Programs & Supportive Costs						
GASB 45 (Required Retirement Funding)	1,093,417	1,630,018	1,429,519	1,658,384	1,300,000	(358,384)
WRD Facility Maintenance	25,822	105,119	55,218	500,790	656,028	155,238
Litigation	86,282	119,083	84,913	125,000	100,000	(25,000)
Cost of Services and Notices	-	-	-	15,000	15,000	-
Election Expense	-	2,568,655	-	3,900,000	1,700,000	(2,200,000)
Debt Service & Other Non-Operating Costs						
Debt Service & Other Non-Operating Costs	16,730,382	17,363,539	15,633,460	20,346,830	20,346,830	-
Total Expenses	**$80,699,014**	**82,519,780**	**76,812,924**	**94,725,038**	**103,484,071**	**$8,784,033**

Table 8

Water Replenishment District of Southern California

Schedule of Expenses by Fund Allocation: Replenishment Assessment Fund

Description	Replenishment Fund Allocation	FY 2020 Actual	FY 2021 Actual	FY 2022 Actual	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Water Purchases							
Water Costs	100%	$35,844,159	$31,210,752	$31,335,792	$34,628,433	$39,651,941	$5,023,508
Water Treatment & Production							
Albert Robles Center (ARC)	100%	8,412,804	9,726,250	8,958,467	9,157,999	11,905,618	$2,747,619
LJVWTF - Water Supply	100%	2,442,252	4,607,882	5,249,509	6,045,118	7,507,812	$1,462,694
Water Resources							
Water Conservation	50%	194,044	183,288	235,041	320,586	352,279	$31,693
Montebello Forebay Recycled Water	100%	229,720	360,834	226,206	436,607	362,003	$(74,604)
Groundwater Resource Planning	100%	305,326	1,294,512	1,294,684	1,837,117	1,985,500	$148,383
Water Quality Programs							
Dominguez Gap Barrier Recycled Water	100%	195,201	295,572	209,929	336,052	273,919	$(62,133)
Groundwater Monitoring Program	50%	684,897	694,125	653,724	749,974	727,614	$(22,361)
Hydrogeology Program	50%	477,462	397,063	237,428	299,298	551,056	$251,758
Regional Brackish Water Program	50%	3,497	58,646	19,400	-	-	-
Well Construction and Rehabilitation Program	100%	7,487	8,521	2,665	13,102	19,075	$5,973
Water Replenishment Support							
Geographic Information Systems (GIS)	50%	120,610	107,094	135,744	226,799	250,320	$23,521
Data Technology Services (DTS)	94%	553,944	736,929	1,135,909	1,077,248	1,202,832	$125,583
Replenishment Operations	100%	328,342	185,691	228,033	258,698	296,796	$38,098
Engineering Program	100%	1,399,263	1,125,665	1,274,949	549,039	870,345	$321,306
SCADA	100%	18,435	28,598	24,950	-	-	-
Asset Management	100%	12,671	97,982	64,745	-	-	-
Water Education	50%	368,211	329,816	297,563	545,437	568,221	$22,784
General & Administration							
Board of Directors	94%	317,806	330,145	363,127	418,568	426,105	$7,537
Administration	94%	5,545,999	3,978,775	2,461,515	4,728,431	4,788,654	$60,223
Other Special Programs & Supportive Costs							
GASB 45 (Required Retirement Funding)	94%	1,027,812	1,532,217	1,343,748	1,558,881	1,222,000	$(336,881)
WRD Facility Maintenance	94%	24,273	98,812	51,905	470,743	616,666	$145,924
Litigation	94%	81,105	111,938	79,818	117,500	94,000	$(23,500)
Cost of Services & Notices	94%	-	-	-	14,100	14,100	-
Election Expense	94%	-	2,414,536	-	3,666,000	1,598,000	(2,068,000)
Debt Service & Other Non-Operating Costs							
Debt Service & Other Non-Operating Costs	94%	15,726,559	16,321,727	14,695,452	19,126,020	19,126,020	-
Sub-Total Replenishment Assessment Fund		**$74,321,880**	**$76,237,367**	**$70,580,301**	**$86,581,749**	**$94,410,874**	**$7,852,625**

For **fiscal year 2024**, total budgeted operating expenses related to the Replenishment Fund are **$94.4 million** or **91% of the total budget.**

Table 9

Water Replenishment District of Southern California

Schedule of Expenses by Fund Allocation: Clean Water Fund

Description	Clean Water Fund	FY 2020 Actual	FY 2021 Actual	FY 2022 Actual	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Water Treatment & Production							
Goldsworthy Desalter	100%	$1,740,648	$1,999,187	$2,490,547	$2,856,679	$2,973,088	$116,409
Water Resources							
Water Conservation	50%	$194,044	$183,288	$235,041	$320,586	$352,279	31,693
Water Quality Programs							
Water Quality Improvement Program	100%	589,344	432,460	448,517	559,663	831,833	272,170
Groundwater Monitoring Program	50%	684,897	694,125	653,724	749,974	727,614	(22,361)
Safe Drinking Water Program	100%	751,656	451,475	429,674	594,803	962,084	367,282
Hydrogeology Program	50%	477,462	397,063	237,428	299,298	551,056	251,758
Regional Brackish Water Program	50%	3,497	58,646	19,400	-	-	-
Water Replenishment Support							
Geographic Information Systems (GIS)	50%	120,610	107,094	135,744	226,799	250,320	23,521
Data Technology Services (DTS)	6%	35,358	47,038	72,505	68,261	76,776	8,016
Water Education	50%	368,211	329,816	297,563	545,437	568,221	22,784
General & Administration							
Board of Directors	6%	20,386	21,073	23,178	26,717	27,198	481
Administration	6%	354,000	253,964	157,118	301,815	305,659	3,844
Other Special Programs & Supportive Costs							
GASB 45 (Required Retirement Funding)	6%	65,605	97,801	85,771	99,503	78,000	(21,503)
WRD Facility Maintenance	6%	1,549	6,307	3,313	30,047	39,362	9,314
Litigation	6%	5,177	7,145	5,095	7,500	6,000	-
Cost of Services & Notices	6%	-	-	-	900	900	-
Election Expense	6%	-	154,119	-	234,000	102,000	(132,000)
Debt Service & Other Non-Operating Costs							
Debt Service & Other Non-Operating Costs	6%	1,003,823	1,041,812	938,008	1,220,810	1,220,810	-
Sub-Total Clean Water Fund		**$6,377,137**	**$6,282,412**	**$6,232,624**	**$8,143,289**	**$9,073,197**	**$931,408**
Total Expenses		**$80,699,014**	**$82,519,779**	**$76,812,925**	**$94,725,038**	**$103,484,071**	**$8,784,033**

Total budgeted operating expenses related to the Clean Water Fund are **$9.1 million** or **9% of the total budget.**

Table 10

Fiscal Year 2024 Operations & Maintenance Budget

Five-Year Forecast

Description	FY 2024 Adopted Budget	FY 2025 Forecast Budget	FY 2026 Forecast Budget	FY 2027 Forecast Budget	FY 2028 Forecast Budget
OPERATING EXPENDITURES					
Water Purchases	39,651,941	40,048,460	40,448,945	40,853,434	41,261,969
Water Treatment and Production	22,386,518	22,610,383	22,836,487	23,064,852	23,295,500
Water Resources	3,052,060	3,082,581	3,113,406	3,144,540	3,175,986
Water Quality Programs	4,644,249	4,690,691	4,737,598	4,784,974	4,832,824
Water Replenishment Support	4,083,829	4,124,667	4,165,914	4,207,573	4,249,649
General and Administration	5,547,616	5,603,092	5,659,123	5,715,714	5,772,871
SUB-TOTAL	**79,366,213**	**80,159,875**	**80,961,474**	**81,771,089**	**82,588,800**
NON OPERATING EXPENDITURES					
Other Special Programs & Supportive Costs	3,771,028	3,808,738	3,846,826	3,885,294	3,924,147
Debt Service and Other Non-Operating Costs	20,346,830	20,346,830	22,223,911	25,287,136	25,287,999
SUB-TOTAL	**24,117,858**	**24,155,568**	**26,070,737**	**29,172,430**	**29,212,146**
TOTAL BUDGET	**103,484,071**	**104,315,443**	**107,032,211**	**110,943,519**	**111,800,945**

The District is forecasting an overall 4% or $3.2 million increase in operating expenditure over the next 5 years. The primary driver is Water Purchases that is increasing by 4% or $1.6 million. It is expected that Water Treatment and Production Costs will continue to rise as a result of inflation, supply chain issues and higher wages. The District is investigating ways to mitigate these costs through negotiations, partnerships and projects to secure water, and chemicals at a lower cost. This is in addition to more efficient operations at the facilities and in managing the administration costs of the District.

Inflation continues to rise since pandemic has become a part of our normal life, the business environment for the District is in constant change. This being the case, accurate forecasting will be an ever important factor in the operational decisions made to maintain our financial stability.


WRD
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WATER REPLENISHMENT DISTRICT
OF SOUTHERN CALIFORNIA

Revenue Budget

The District's primary source of revenue comes from the Replenishment Assessment (RA) which making up 81.4% or approximately $84.2 million of the District's revenue. RA is based on the amount of water pumped from the Central and West Coast basins and is applied to every acre-foot of water pumped.

Carryover Conversion to Groundwater Storage, aka "Carryover Conversion" is a mechanism that provides groundwater pumpers the option to transfer their unpumped rights each year into a storage account so that they can use those rights to pump water in a subsequent year or they will lose those rights permanently. Carryover conversion revenue is projected to increase from $4 million last year to $6.5 million or 6.3% in fiscal year 2024.

The District also expects to collect approximately $4.6 million or 4.5% of total revenue from recycled water sales to the Orange County Water District (OCWD) form the Leo J. Vander Lans Advanced Treatment Water Facility (LVL AWTF), along with incentives received from the Metropolitan Water District of Southern California (MWD) for every acre-foot produced by the plant. This facility provides advanced water treated water to the Alamitos Seawater Intrusion Barrier Project which would otherwise be supplied with more expensive imported water from MWD.

The Robert Goldsworthy Desalter is located in the West Coast basin and treats brackish groundwater for sale to the city of Torrance. The anticipated revenue is $3 million or 2.9% of total revenue.

The Albert Robles Center (ARC) purifies approximately 10,000-acre feet of tertiary treated (recycled) water annually to near-distilled levels through an advanced water treatment facility. Since ARC offsets the need for imported water from MWD, the District receives from the agency's Local Resources Program subsidy through the city of Torrance, a MWD's member agency. The estimated total revenue from this advanced water treatment facility is $0.6 million or 0.6% of total revenue.

Other income and expenses account for $1.1 million or 1.1% of total revenue and is the net of interest income, property tax revenue and other expenses that are not charged to the RA.

Figure 5

Fiscal Year 2024 Total Revenues
Total Operating Revenues $103,484,071

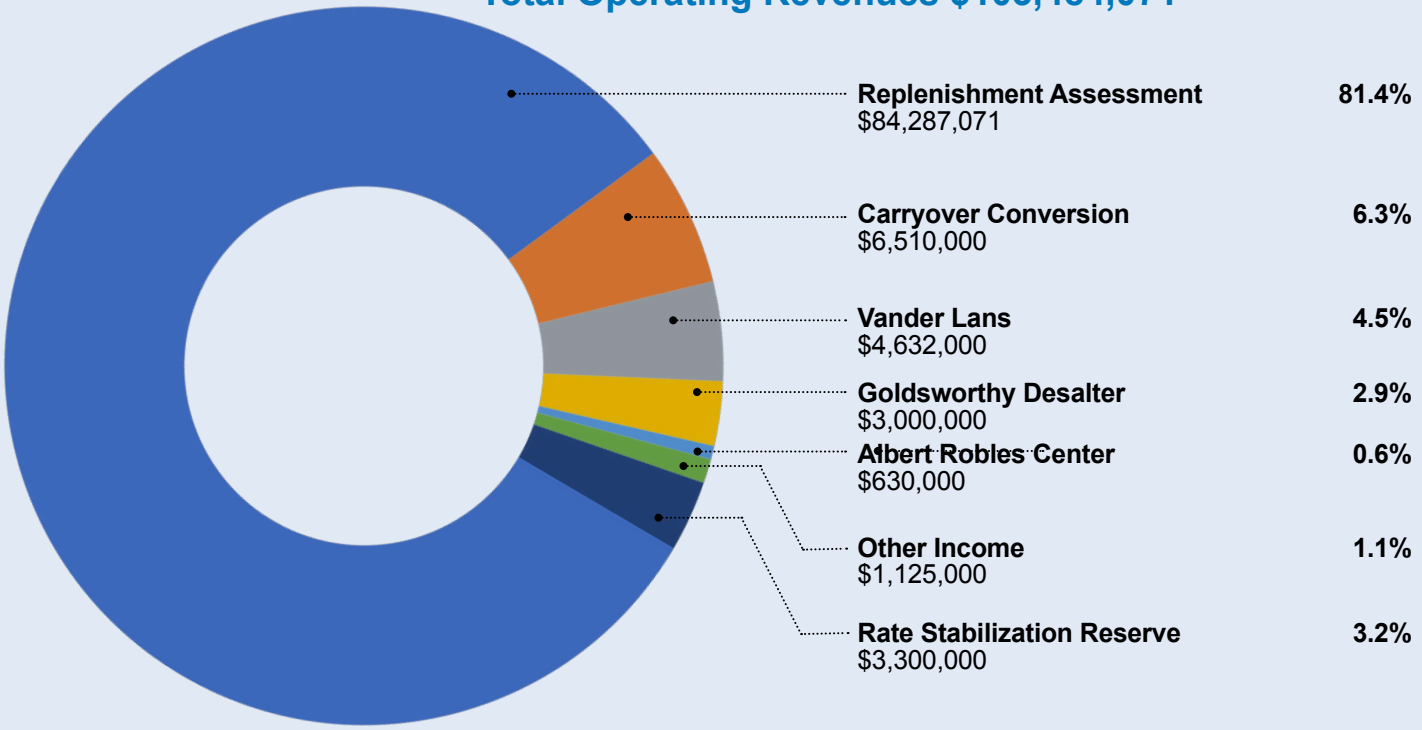


Table 11

Fiscal Year 2024 Revenues

Description	FY 2023 Adopted Budget	FY 2024 Adopted Budget	FY 2024 Budget compared to FY 2023 Budget
Replenishment Assessment	$85,769,268	$84,287,071	$(1,482,197)
Vander Lans Income/OCWD/MWD Subsidy	4,480,000	4,632,000	152,000
Goldsworthy Desalter Income/MWD Subsidy	2,900,000	3,000,000	100,000
Albert Robles Center Income/MWD Subsidy	630,000	630,000	-
Other Revenues	500,500	1,125,000	624,500
Carryover Conversion	4,000,000	6,510,000	2,510,000
Transfer from Reserve (Rate Stabilization)	-	3,300,000	3,300,000
Total Revenues	**$98,279,768**	**$103,484,071**	**$5,204,303**

Comparison to Prior Fiscal Year 2023 Budgeted Revenues

Total revenues for fiscal year 2024 are projected to be approximately $1.9 million or 2% higher than the budget in prior fiscal year. It should be noted the increase based on the cost of service was approximately $5.2 million. This increase was reduced as the Board of Directors authorized the use of up to $3.3 million (or $16 per acre-foot) from the Rate Stabilization Fund to reduce the impact of the Replenishment Assessment. As a result, RA revenue is projected to have a reduction of $1.5 million and an increase of $2.5 million or 3% higher than prior year's budget is primarily from the Carryover Conversion revenue.

Sources of Revenue

Replenishment Assessment Revenue Estimate

The District has statutory authority to set and collect a Replenishment Assessment (RA) from all entities that own or lease water rights on each acre-foot (AF) of groundwater that they pump from the basins.

For Fiscal Year 2024, the District estimates that it will collect $84,287,071 from the Replenishment Assessment (RA) based on the estimated groundwater pumping of 205,000 AF. From the adopted RA of $423 per AF, $12 per AF is funded for the per- and polyfluoroalkyl substances (PFAS) remediation program.

Pursuant to the Water Code and applicable regulations, the RA is established annually by the Board of Directors. Mathematically, the RA is calculated based on the cost allocation analysis which includes assessing the beneficiaries (i.e., pumpers) their proportional share of the cost to provide water replenishment service.

As required by the Water Code, the District annually prepares the Engineering Survey & Report (ESR) that provides the Board of Directors with the necessary information to justify the setting of an RA for the ensuing fiscal year to purchase replenishment water and to fund projects and programs related to groundwater replenishment and groundwater quality. The ESR contains the following key components:

- A discussion of groundwater production with the District;
- An evaluation of groundwater conditions with the District, including estimates of the annual overdraft, the accumulated overdraft, changes in water levels, and the effects of water level fluctuations on the groundwater resources;
- An appraisal of the quantity, availability, and cost of replenishment water required for the ensuing water year; and
- A description of current and proposed programs and projects to accomplish replenishment goals and to protect and preserve high quality groundwater supplies within the District.

Specifically, the ESR provides an estimate of the total groundwater pumping quantity for the ensuing water year, which is approximately 210,000 AF in the District's

service area. Furthermore, the ESR identifies the quantity of supplemental water required to replenish and protect the groundwater basins from pumping. However, District anticipates a reduction of pumping quantity based on conservation signals, record rainfall, groundwater pumping and the use of carryover conversion. Therefore, total groundwater pumping quantity is projected for 205,000 AF which correlates to an estimated cost of service for $103,484,071 in FY 2024.

The unit cost, or RA, per AF of water pumped is calculated as follows:

$$\frac{\text{Total Cost of Service \$}}{\text{Total Groundwater Pumped (AF)}} = \text{Unit Cost (\$/AF pumped)}$$

The FY 2023 pumping estimates were evaluated and refined throughout the budget process. Based on the series of budget presentations during the budget process, the Board of Directors arrived at the total groundwater AF pumped to determine the unit cost as follows:

$$\frac{\text{Total Cost of Service (\$84,287.071)}}{\text{Total Groundwater Pumped (205,000 AF)}} = \text{Unit Cost (\$411/AF)}$$

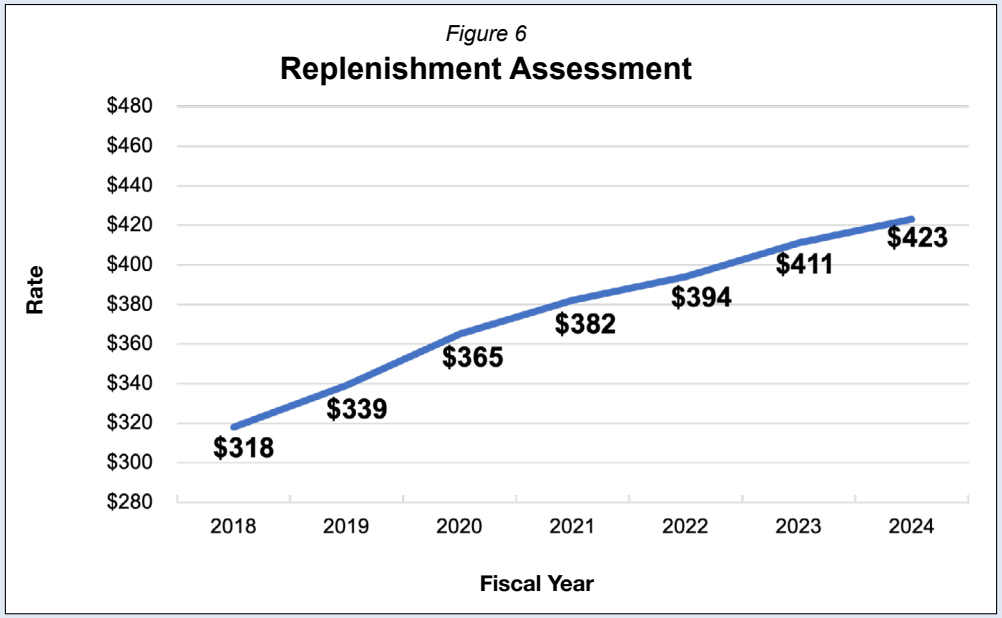
Unit Cost $411/AF and $12/AF to the PFAS program = $423/AF
The amount of RA charged to an individual operator is calculated based on the quantity of water they pump multiplied by the RA. For example, if an operator pumps a total of 1,000 AF, that operator will be charged a total of $423,000 (1,000 AF x $423/AF).

The RA consists of two components: funds for replenishment and funds for clean water. Most of the District's efforts are related to the replenishment of the Central and West Coast Groundwater Basins. The revenue collected through the RA is split 94% to the Replenishment Fund and 6% to the Clean Water Fund based on the anticipated use of the revenue.

The District's Replenishment Assessment rate have increased gradually over the years as shown in the chart below, for the District to meet the demands of maintenance and preservation of the Basins, and, thus, availability of water for pumpers to pump.

To estimate the ensuing year's Replenishment Assessment rate, WRD has made a forecast based on

Figure 6



the current year's anticipated pumping. The Finance/ Audit Committee's recommendation for the Fiscal Year 2024 Replenishment Assessment is $423 per acre-foot, which included $12 per acre-foot of the Replenishment Assessment to the per- and polyfluoroalkyl substances (PFAS) program. The recommendation was based on the following assumptions:

1. Ensuing year's pumping to be 205,000 acre-feet. It anticipates that pumpers will remove 205,000 acre-feet from the Basins;
2. Ensuing year's water purchases to be 93, 000 acre-feet to replenish the Basins; and
3. $6.5 million of revenue will come from the Water Purchase Carryover (water storage for future extraction by pumpers).

The District anticipates that the net cost of its operations for Fiscal Year 2024 will be $84,287,071; therefore, the cost of providing services including $12 per acre-foot of the Replenishment Assessment to the PFAS program will be $423 per acre-foot of water removed from the Basins.

Shown below are the basins top twenty pumpers in fiscal year 2023:

Table 12

Production Summary

Fiscal Year 2023 Top 20 Pumpers

Number	Name	Production (Acre Feet)
1	Long Beach, City of	27,687
2	Golden State Water Company	24,191
3	California Water Service Company	16,722
4	Downey, City of	13,228
5	Tesoro Refining & Marketing Company, LLC	10,607
6	South Gate, City of	8,097
7	Cerritos, City of	7,103
8	Compton, City of	6,754
9	Lakewood, City of Water Department	6,348
10	Vernon, City of	5,475
11	Whittier, City of	5,188
12	Phillips 66 Company	4,965
13	Bellflower-Somerset Mutual Water Company	4,668
14	Liberty Utilities Corporation	4,477
15	Lynwood, City of	4,412
16	Pico Rivera, City of	3,916
17	Water Replenishment District of Southern California	3,821
18	Los Angeles, City of Dept of Water and Power	3,298
19	Montebellow Land and Water Company	2,806
20	Paramount, City of	2,712
	Total	**166,479**

Production and Treatment Revenue Estimates

The District receives revenue from the Leo J. Vander Lans Advanced Water Treatment Facility, the Robert W. Goldsworthy Desalter and the Albert Robles Center for Water Recycling & Environmental Learning.

The Leo J. Vander Lans Advanced Water Treatment Facility provides advanced treated water to the Alamitos Seawater Barrier Project in order to keep seawater from intruding into the fresh groundwater supplies in the Central Basin. The revenue from the facility comes from the sale of water production to the Orange County Municipal Water District as well as a subsidy received from the Central Basin Municipal Water District through a Local Resource Program offered by the Metropolitan Water District of Southern California.

The District completed the Leo J. Vander Lans Expansion Project in FY 2016, which doubled the capacity of the treatment plant and completely replaced the need for imported water with highly treated recycled water at the Alamitos Seawater Intrusion Barrier. This is one of the key components in the District's Water Independence Now (WIN) Program. Projected revenues for FY 2024 is $4.6 million.

Fund Allocation – The primary purpose of this project is to provide a more reliable means of replenishing the basins through the use of advanced treated recycled water, 100% of this revenue is allocated to the Replenishment Fund.

The Robert W. Goldsworthy Desalter has been operating since 2002 to remove 18,000 acre-feet of brackish groundwater from a seawater intrusion plume in the Torrance area that was stranded inland of the West Coast Basin Seawater Intrusion Barrier after the barrier project was put into operation in the 1950s and 1960s. The production well and desalting facility are located within the City of Torrance and the product water that would otherwise be useless due to the Saline Plume located in the West Coast Basin is delivered for potable use to the City's distribution system. The treatment capacity is about 2,200 acre-feet per year.

The District expanded the Goldsworthy Desalter and completed the construction in 2017. The expansion project increased the treatment capacity to 4,800 acre-feet per year. The City of Torrance is responsible for the operation and maintenance of the treatment plant under contract with WRD. The revenue from the Desalter comes from the sale of water production to the City of Torrance as well as a subsidy received from the City of Torrance through a Local Resource Program offered by the Metropolitan Water District of Southern California. Projected revenues for FY 2024 is $3 million.

Fund Allocation – The purpose of the Desalter is directly related to remediating degraded groundwater quality and costs are thus attributed 100% to the Clean Water Fund.

The Albert Robles Center for Water Recycling & Environmental Learning is a 5.2 acre facility in the City of Pico Rivera, adjacent to the San Gabriel River, allowing for direct delivery of purified recycled water to an existing pipeline leading into the spreading grounds.

The Albert Robles Center purifies approximately 10,000 acre feet (3.25 billion gallons) of tertiary treated (recycled) water annually to near-distilled levels through an advanced

water treatment facility. The facility takes in tertiary treated recycled water as source water and subjects it to additional advanced treatment through ultrafiltration, reverse osmosis, and advanced oxidation to further purify the water for groundwater replenishment in the Montebello Forebay.

Since the Albert Robles Center offsets the need for imported water from Metropolitan Water District (MWD) of Southern California, the District receives MWD's Local Resources Program subsidy through the City of Torrance, a MWD member agency. Projected revenues for FY 2024 is $0.6 million.

Fund Allocation – The primary purpose of this project is to provide a more reliable means of replenishing the basins through the use of advanced treated recycled water, 100% of this revenue is allocated to the Replenishment Fund.

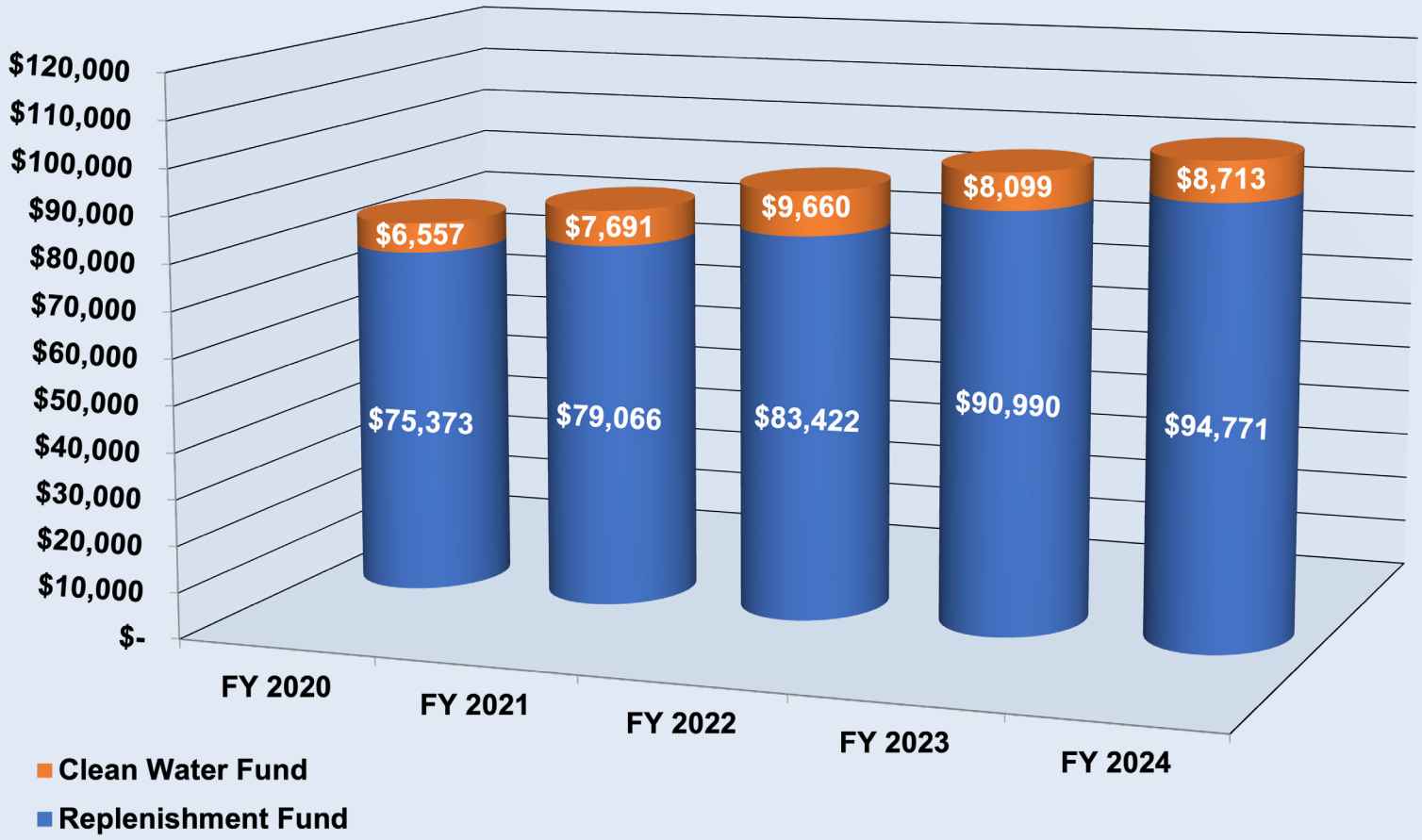
Table 13

Comparative Revenue by Fund

Description	Allocation % Replenishment Fund	Allocation % Clean Water Fund	FY 2020 Actual	FY 2021 Actual	FY 2022 Actual	FY 2023 Projection	FY 2024 Budget
Replenishment Fund							
Replenishment Assessment	94%		$66,691,894	$71,591,381	$72,076,918	$80,702,464	$79,229,847
Carryover Conversion	94%		6,581,417	3,967,457	7,266,103	3,760,000	6,119,400
LJVWTF - Water Supply	100%		488,860	2,156,938	2,911,592	4,540,291	4,632,000
Albert Robles Center	100%		239,432	692,773	593,580	1,516,335	630,000
Other Income	94%		1,371,230	657,786	574,137	470,470	1,057,500
Transfer from Reserve (Rate Stabilization)	94%		-	-	-	-	3,102,000
Sub-Total Replenishment Fund			**$75,372,832**	**$79,066,335**	**$83,422,330**	**$90,989,560**	**$94,770,747**
Clean Water Fund							
Replenishment Assessment		6%	$4,256,929	$4,569,663	$4,600,654	$5,151,221	$5,057,224
Carryover Conversion		6%	420,090	253,242	463,794	240,000	390,600
Goldsworthy Desalter Sales		100%	1,551,550	2,598,650	4,227,871	2,678,000	3,000,000
Other Income		6%	328,473	269,700	367,200	30,030	67,500
Transfer from Reserve (Rate Stabilization)		6%	-	-	-	-	198,000
Sub-Total Clean Water Fund			**$6,557,043**	**$7,691,255**	**$9,659,519**	**$8,099,251**	**$8,713,324**
Total All Funds			**$81,929,874**	**$86,757,589**	**$93,081,849**	**$99,088,811**	**$103,484,071**

Figure 7

Comparative Revenue by Fund ($ in Thousands)



Other Revenue Estimates

Other Income

The District is estimating revenue for FY 2024 from property tax to be $0.8 million and interest income to be $0.8 million. There are non-RA related expenses of $0.6 million which off-set the above and will bring the estimated revenue from this source to $1.1 million.

Fund Allocation – The revenue collected through other revenue (e.g. property taxes and interest income) is split 94% to the Replenishment Fund and 6% to the Clean Water Fund based on the anticipated use of the revenue.

Groundwater is an economical source of water. In FY 2024, the District's Replenishment Assessment is $423/AF. The additional cost to the water purveyors to operate their systems and serve the water could add up to $250/AF to the Replenishment Assessment rate. In contrast, the price of treated imported water, which is the alternative source to groundwater, is projected at $1,580AF. Therefore, groundwater is over 50% less than the cost of treated imported water.

Taking a longer view on the cost-benefit side, water imported from Northern California and the Colorado River cannot be relied on to meet the replenishment needs of WRD and the cost of imported water keeps increasing every year. The only way to stabilize groundwater rates is to become independent of imported water.

The District's primary responsibilities are to protect the basins by replenishing groundwater, deter seawater intrusion, and remove contaminants from the groundwater. Furthermore, with the recent drought and future uncertainty of imported water, the District is moving forward with the WIN program, a series of projects that will fully utilize stormwater and recycled water sources to protect the basins and to ensure sustainable, reliable local groundwater supply to WRD's stakeholders.

Five-Year Revenues Forecast

Table 14

Fiscal Year 2024 Revenues Budget

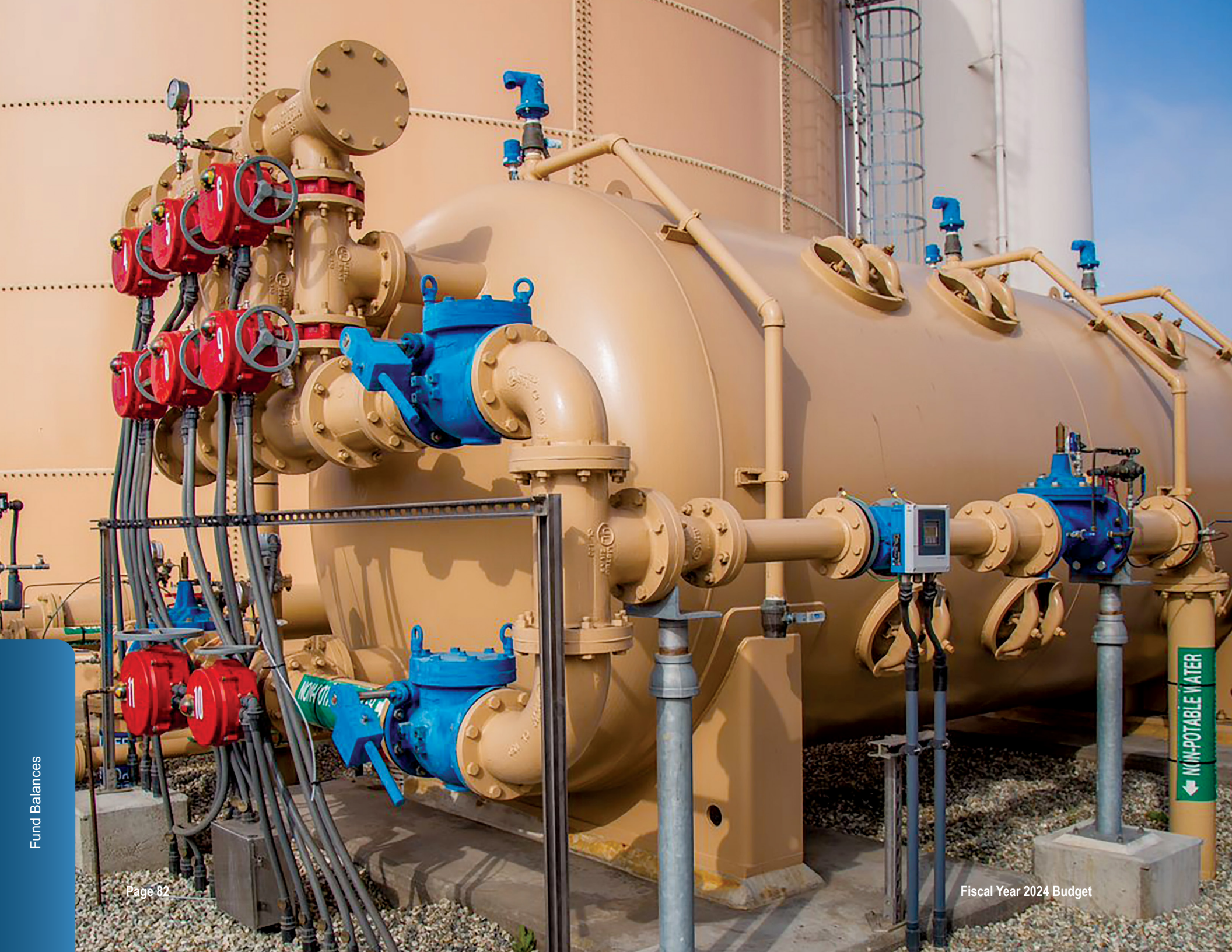
Five-Year Forecast

Description	FY 2024 Adopted Budget	FY 2025 Forecast Budget	FY 2026 Forecast Budget	FY 2027 Forecast Budget	FY 2028 Forecast Budget
Replenishment Assessment	$84,287,071	$88,501,425	$92,926,496	$96,643,556	$100,509,298
Carryover Conversion	6,510,000	10,200,000	10,404,000	10,612,080	10,824,322
Vander Lans Income/OCWD/MWD Subsidy	4,632,000	4,342,000	4,459,420	4,580,363	4,704,933
Goldsworthy Desalter Income	3,000,000	3,390,000	2,940,000	6,100,000	6,300,000
Albert Robles Center Income/MWD Subsidy	630,000	630,000	630,000	630,000	630,000
Other Income	1,125,000	3,080,120	2,988,321	2,896,604	2,804,970
Transfer from Reserve - Rate Stabilization	3,300,000	-	-	-	-
Total Revenues	**$103,484,071**	**$110,143,545**	**$114,348,237**	**$121,462,602**	**$125,773,524**

The forecast above shows the Replenishment Assessment increases by a total of approximately 19% or $16.2 million over the next five years. The Torrance Desalter Expansion project is projected to be completed in FY 2027 which will increase the production capacity; therefore, the Desalter Assessment revenue will have a significant increase in FY 2027 and FY 2028. Income at the other treatment facilities is expected to remain at the same level based on consistent operations and ongoing subsidies. Carryover conversion actuals were approximately $12 million in Fiscal Year 2023. This is double the Fiscal Year Adopted Budget estimate. However, District staff will need to rely on the pumpers to improve the accuracy of the forecast for this cost center. Currently, the forecast is significantly lower than the actual for FY 2023 as this amount was unknown when the budget was adopted. The budget for fiscal year 2025 is slightly lower than fiscal 2023 and increases by 2% annually in the following years. In addition, other income is expected to increase due to anticipation of higher interest income in the next five years.

Subsidy expiration dates are as follows:

- Leo Vander Lans (through Central Basin): 2025
- Leo Vander Lans Expansion (through Long Beach Water): 2043
- Albert Robles Center (through the City of Torrance): 2042


NON-POTABLE WATER

Fund Balances

Reserve Fund Policy

The level of reserves maintained by the District is an important component of short and long-term financial management, and is a key consideration in the rate-setting process. Furthermore, the level of reserves is one of the key financial metrics used by credit rating agencies when evaluating the financial strength of an organization. Prudent reserves are an important financial tool that benefits both WRD and the pumpers. A prudent level of reserves helps mitigate financial risks due to changes in pumping levels, unexpected cost increases, and emergencies.

WRD's reserve policy is to ensure that reserves meet WRD's financial and operational objectives. Among other things, the Reserve Policy includes:

- How these balances are established
- How funds are used
- How the adequacy of each respective reserve fund balance is determined
- How reserves are replenished when used

The District's reserve policy will be reviewed annually during the budgeting process to monitor current levels and evaluate compliance with the policy. Decisions can then be made to maintain, increase, or spend down reserve balances, as appropriate, with an understanding of the impact of such decisions to the upcoming budget period and the long-term financial plan. The annual analysis of funds is an important part of responsible financial planning, particularly as WRD transitions from an agency that produces water to one that produces water and operates and maintains three capital facilities.

As of June 30, 2023, the District has $92,427,000 in Cash and Reserve Funds. This includes $3,122,000 of restricted reserves and $89,305,000 in unrestricted reserves. The following pages provide a detailed breakdown of the District's reserve funds.

Table 15

Reserve Fund Balances

Reserve Funds:	
Debt Services (Restricted)	$3,200,000
Safe Drinking Water Program & Disadvantage Community	4.000,000
Well Rehabilitation & Construction	4,900,000
Water Purchase Carryover & Rate Stabilization	10,000,000
PAYGO Capital Reserve	23,000,000
PFAS Remediation Program	17,300,000
Operating Reserve	30,000,000
Total Reserve Balances as of June 30, 2023	**$92,400,000**

Restricted Reserve Fund

1. **Debt Service Reserve** – established pursuant to the covenants in WRD's State Revolving Fund (SRF) Loan. The District is required to maintain one year of debt service in reserve as security for the SRF loan.

   Source of Funds: Replenishment Assessment
   Use of Funds: Debt Service

Unrestricted Reserve Funds:

1. **Safe Drinking Water and Disadvantaged Community Reserve –** to account for, and fund loans and grants to help clean up the groundwater basin.

   Source of Funds: Replenishment Assessment
   Use of Funds: Safe Drinking Water and Disadvantaged Community Projects

2. **Well Rehabilitation & Construction Reserve**– to provide zero interest loans to help finance well construction and rehabilitation to increase pumping capacity in the basin.

   Source of Funds: Replenishment Assessment
   Use of Funds: Well Rehabilitation Program

3. **Water Purchase Carryover & Rate Stabilization Reserve** – to ensure WRD's ability to acquire or develop water supplies to replenish the Central and West Coast groundwater basins and to stabilize rates.

   Source of Funds: Replenishment Assessment
   Use of Funds: Acquire or Develop Water Supplies

4. **Pay-Go Capital Reserve** – to fund pay-go various capital projects

   Source of Funds: Replenishment Assessment
   Use of Funds: Miscellaneous Capital Projects

5. **PFAS Remediation Reserve** – to fund PFAS Remediation Program

   Source of Funds: Replenishment Assessment
   Use of Funds: PFAS Remediation Projects

6. **Operating Reserve** – to provide needed working capital and to help ensure against unforeseen events, including lower than expected sales, unbudgeted expenses, emergencies (e.g. earthquakes or other natural disasters), and other unforeseen events. The Operating Reserve is equal to three months of the cost of operations, including annual debt services, in the current year budget.

   Source of Funds: Replenishment Assessment
   Use of Funds: Non-Recurring Operating Expenses

The balance of trust funds as of June 30, 2023 is as follows:

Table 16

Water Replenishment District of Southern California

Trust Fund Report as of June 30, 2023

Fund Purpose	Beginning Balance	Interest Income	Disbursements	Addition	Ending Balance
2015 Revenue Bonds	$7,516	$29	$-	$-	$7,545
2018 Revenue Bonds	27,222,492	103,240	-	-	27,325,732
CalTrans Trust Fund (BancWest)	5,559,534	280	-	-	5,559,814
Total	**$32,789,542**	**$103,549**	**$-**	**$-**	**$32,893,091**

Trust Funds

A relationship whereby funds are legally held and managed by another party or organization for the benefit of specific purpose.

The Water Replenishment District has a number of trust funds related to District's Capital Improvement Plan. The District's Trustee, U.S. Bank, holds the majority of the funds which were received from the issuance of 2015 and 2018 Replenishment Assessment Revenue Bonds. The remaining amount relates to the funds received from the California Department of Transportation (CalTrans) settlement of $8.0 million which was received in June 2004. Since that time, the District has been reimbursed for costs associated with the project, as well as for charges tied to the amount of water pumped from the basin for dewatering the freeway.

Restricted for Capital Projects – Funds held in trust with U.S. Bank for use in accordance with the Official Statement and the Master Trust Agreement.

Proceeds from the 2018 Debt Issuances

Source of Funds: 2018 Revenue Bond
Use of Funds: Restricted for Capital Projects only

CalTrans Trust – These funds are held in trust by WRD as part of a settlement with the California Department of Transportation (CalTrans) for dewatering the 105 freeway.

Source of Funds: CalTrans Settlement
Use of Funds: Restricted for CalTrans Project and Replenishment Assessment

Originally, the CalTrans settlement of $8.0 million was received in June 2004. Since that time, the District has been reimbursed for costs associated with the project, as well as for charges tied to the amount of water pumped from the basin for dewatering the freeway.

Table 17

Projected Unreserved Fund Balance

as of June 30, 2023 and 2024

Description	Estimated Unreserved Fund Balance 6/30/23	Estimated Revenues	Estimated Expenses	Debt Service	Estimated Unreserved Fund Balance 6/30/24
Replenishment Fund	$7,621,166	$94,770,747	$(78,740,293)	$(15,670,580)	$7,981,040
Clean Water Fund	$486,457	$8,713,324	$(8,072,948)	$(1,000,250)	$126,583
Total All Funds	**$8,107,623**	**$103,484,071**	**$(86,813,241)**	**$(16,670,830)**	**$8,107,623**

Table 18

Projected Unreserved Fund Balance

5-Year Forecast

Description	FY 2024 Budget	FY 2025 Forecast	FY 2026 Forecast	FY 2027 Forecast	FY 2028 Forecast
Beginning Funds Balance	**$8,107,623**	**$8,107,623**	**$13,935,724**	**$21,251,750**	**$31,770,834**
Add: Estimated Revenues	103,484,071	110,143,545	114,348,237	121,462,602	125,773,524
Total Funds Available	**111,591,694**	**118,251,168**	**128,283,961**	**142,714,353**	**157,544,358**
Less: Estimated Expenditures	(86,813,241)	(87,644,613)	(88,484,300)	(89,332,383)	(90,188,946)
Annual Debt Service (current)	(16,670,830)	(16,670,830)	(16,670,830)	(16,670,830)	(16,670,830)
Annual Debt Service (future)	-	-	(1,877,081)	(4,940,306)	(4,941,169)
Ending Funds Balance	**$8,107,623**	**$13,935,724**	**$21,251,750**	**$31,770,834**	**$45,743,413**


OUR WATER FUTURE:
USING LOCAL WATER
STORMWATER CAPTURE
OUR WATER FUTURE:
WORKING IN WATER
POSITIONS AND REQUIRED EDUCATION:
HIGHSCHOOL OR 2 YEAR DEGREE
4 YEAR DEGREE OR MORE
Plant Operator
Utility Personnel
Mechanic
Meter Reader
Office Support
Cashier/Clerk
Customer Service Representative
Hydrogeologist
Engineer
Scientist
Lawyer
Education
Researcher
Communications
Information Technology (IT) Person
Safety & Safety Coordinator
ARC'S SOURCE WATER
The bacteria will rapidly increase
PROTECT YOUR WATER

Long-Term Debt

Currently, the District's financial plan does not require any long-term borrowing in fiscal year 2023. This is due to over 440 days of cash-on-hand, PAYGO, PFAS Assessment, Grants and 2018 Bond Funds. Going forward the issuance of any long-term debt would be based on an acceleration of the Regional Brackish program, additional commitments for PFAS remediation or refinancing opportunities.

In January 2021, Fitch ratings reviewed but took no action on the WRD AA+ with a Negative Outlook. The Negative Outlook was driven by the District's weaker financial performance in fiscal years 2019 and 2020 in combination with new debt related to system expansion, which elevated its net leverage. The district experienced a revenue decline in fiscal years 2019 and 2020 due to reduced pumping while in 2020 the system experienced higher operating costs associated with the new advance water treatment facility (ARCWTF) coming online.

The District's 'AA+' issue rating reflect strong financial profile in the context of very strong revenue defensibility and very low operating risks. In addition to benefiting from very low water pricing relative to competing supplies and strong purchaser credit quality.

Debt Management Policy

Pursuant to the requirements of SB-1029 California Debt and Investment Advisory Commission, the District adopted the Debt Management Policy that established guidelines for the issuance and the on-going administration process for debt securities and other forms of indebtedness issued by the District.

The District is committed to long-term financial planning, maintaining appropriate reserves levels and employing prudent practices in governance, management and budget administration. The District intends to issue debt for the purposes stated in these Debt Management Policies and to implement policy decisions incorporated in the District's Five-Year Financial Plan and its annual operating budget.

The District recognizes that a fiscally prudent debt policy is required to:

- Maintain the District's sound financial position.
- Ensure the District has the flexibility to respond to changes in future service priorities, revenue levels, and operating expenses.
- Protect the District's creditworthiness.
- Ensure that all debt is structured to protect both current and future taxpayers, ratepayers, and constituents of the District.
- Ensure that the District's debt is consistent with the District's planning, goals and objectives for capital improvements and operations, as applicable.

The District issued long-term debt to finance the construction, acquisition, and rehabilitation of facilities, equipment and land owned or to be owned and operated by the District. Long-term debt financings are not appropriate for current operating expenses and routine maintenance expenses. Details of the District's long-term debt are presented below.

Replenishment Assessment Revenue Bonds, Series 2015

On December 10, 2015 the District issued $148,345,000 Replenishment Assessment Revenue Bonds, Series 2015. Additionally, the District formed "The Authority", a joint exercise of powers agency organized under the laws of the State of California and formed pursuant to that certain Joint Exercise of Powers Agreement dated August 6, 2015 by the California Municipal Finance Authority, a joint exercise of powers authority organized and existing under and by virtue of the laws of the State of California. The bonds were issued by the Authority to: (i) finance the acquisition, construction and installation of certain capital improvement projects of the WRD, (ii) prepay the 2004, 2008 and 2011 Certificates of Participation, and (iii) to pay costs of issuance of the bonds.

Both Standard and Poor's and Fitch ratings affirmed the WRD's credit rating of AA+ with a stable outlook. This helped in the District obtaining AAA pricing, in line with the Metropolitan Water District pricing the day before WRD priced its bonds. The District will have level debt service payments of $9.25 million annually for 30 years. The result of the refunding resulted in a net present value (NPV) of $9.72 million and an all-in lowering of total interest cost of 3.49%, compared to the 2004 COP – 4.52%, 2008 COP – 6.15%, and 2011 COP – 4.70%. Due to the District's strong credit rating and aggressive pricing by the District's underwriting team, the demand for the bonds was four-times the offering amount.

The net proceeds of $69,500,000 was used to fund the following capital projects:

1. Albert Robles Center for Water Recycling and Environmental Learning
2. Goldsworthy Brackish Water Reclamation Program
3. Stormwater Conservation and Groundwater Storage Program
4. Groundwater Basin Management Program
5. Improvements related to the Safe Drinking Water Program
6. Improvements related to the Groundwater Infrastructure Management Program

Replenishment Assessment Revenue Bonds, Series 2018

As the District goes through the annual update of its Capital Improvement Plan, the District looks to the capital funding needs for the next three to five years. With the completion of the Albert Robles Center for Water Recycling and Environmental Learning and the Goldsworthy Desalter expansion, it is evident that additional funds will be needed to continue WRD's mission to supply clean and reliable water to the West Coast and Central Groundwater Basins.

In December 2018, the District issued $65,785,000 Replenishment Assessment Revenue Bonds, Series 2018. The 2018 Revenue Bond are being issued pursuant to an Indenture of Trust among the Water Replenishment District of Southern California Financing Authority ('the Authority'), WRD ('the District") and U.S. Bank as trustee. The Bonds were issued by the Authority to finance the acquisition, construction, and installation of the following capital improvement projects and pay costs of issuance of bonds.

1. Leo J. Vander Lans (LVL) Facility Improvement Projects
2. Regional Brackish Water Reclamation Project
3. Field Operations and Storage Annex Facility Project
4. Whittier Narrows Conservation Pool Feasibility Study
5. Dominguez Gap Seawater Intrusions Barrier – Second Connection/potable backup supply
6. Groundwater Basin Management Program
7. Safe Drinking Water Program

Clean Water State Revolving Fund

As the District moves towards independence from imported water from both the Colorado River and the California State Water Project, we continue to find ways to keep the costs as low as possible. As part of this effort, the District applied for and has been awarded a $15,000,000 million grant and an $80,000,000, 30-year one- percent loan to assist with the building of the Groundwater Reliability Improvement Project (Albert Robles Center) through the California Clean Water State Revolving Fund. The savings will amount to nearly $47,000,000 to the District's customers when compared to a 30-year Replenishment Assessment Revenue Bonds at the District's last borrowing interest rate of 3.49%.

Projected Budget Impact of Debt Service

The projected budget impact of principal and interest payments with the 2015 and 2018 Replenishment Assessment Revenue Bonds, and Clean Water State Revolving Fund is as follows:

Table 19

Annual Debt Service Payments *(in million $)*

	FY 2024	FY 2025	FY 2026	FY 2027	FY 2028
2015 Bonds	$9.3	$9.3	$9.3	$9.3	$9.3
2018 Bonds	4.3	4.3	4.3	4.3	4.3
State Revolving Fund Loan	3.0	3.0	3.0	3.0	3.0
Total	**$16.6**	**$16.6**	**$16.6**	**$16.6**	**$16.6**

The projects constructed with these borrowings will replace the need to purchase 21,000 acre-feet of imported water for replenishment purposes. The reduction in imported water costs mitigates the impact of the ongoing debt service payments shown above. In addition, the cost of imported water is expected to increase over time, while debt service will be essentially level for the next thirty years, providing a hedge against uncertainty regarding the future cost of imported water supplies.

Table 20

Debt Service Payment Schedule

Due Date	Fiscal Year	2015 Revenue Bond Payment Schedule			2018 Revenue Bond Payment Schedule			CWSRF Loan Payment Schedule			Debt Service
		Principal	Interest	Total	Principal	Interest	Total	Principal	Interest	Total	Total
08/01/2016	2017	1,655,000	4,118,895	**5,773,895**	-	-	**-**	-	-	**-**	
02/01/2017		-	3,472,350	**3,472,350**	-	-	**-**	-	-	**-**	**9,246,245**
08/01/2017	2018	2,350,000	3,472,350	**5,822,350**	-	-	**-**	-	-	**-**	
02/01/2018		-	3,425,350	**3,425,350**	-	-	**-**	-	-	**-**	**9,247,700**
08/01/2018	2019	2,445,000	3,425,350	**5,870,350**	-	-	**-**	-	-	**-**	
02/01/2019		-	3,376,450	**3,376,450**	-	392,883	**392,883**	-	-	**-**	**9,639,683**
08/01/2019	2020	2,560,000	3,376,450	**5,936,450**	-	1,644,625	**1,644,625**	-	-	**-**	
12/31/2019							**-**	2,295,672	628,866	**2,924,539**	
02/01/2020		-	3,312,450	**3,312,450**	-	1,644,625	**1,644,625**				**15,462,689**
08/01/2020	2021	2,690,000	3,312,450	**6,002,450**	1,035,000	1,644,625	**2,679,625**				
12/31/2020								2,212,332	738,265	**2,950,597**	
02/01/2021		-	3,245,200	**3,245,200**		1,618,750	**1,618,750**				**16,496,622**
08/01/2021	2022	2,830,000	3,245,200	**6,075,200**	1,085,000	1,618,750	**2,703,750**				
12/31/2021								2,397,093	724,224	**3,121,317**	
02/01/2022		-	3,174,450	**3,174,450**		1,591,625	**1,591,625**				**16,666,342**
08/01/2022	2023	2,975,000	3,174,450	**6,149,450**	1,145,000	1,591,625	**2,736,625**				
12/31/2022								2,385,947	735,370	**3,121,317**	
02/01/2023		-	3,100,075	**3,100,075**		1,563,000	**1,563,000**				**16,670,467**
08/01/2023	2024	3,125,000	3,100,075	**6,225,075**	1,200,000	1,563,000	**2,763,000**				
12/31/2023								2,409,807	711,511	**3,121,317**	
02/01/2024		-	3,021,950	**3,021,950**		1,533,000	**1,533,000**				**16,664,342**

Table 20

Debt Service Payment Schedule (cont.)

Due Date	Fiscal Year	2015 Revenue Bond Payment Schedule			2018 Revenue Bond Payment Schedule			CWSRF Loan Payment Schedule			Debt Service
		Principal	Interest	Total	Principal	Interest	Total	Principal	Interest	Total	Total
08/01/2024	2025	3,285,000	3,021,950	**6,306,950**	1,260,000	1,533,000	**2,793,000**				
12/31/2024								2,433,905	687,413	**3,121,317**	
02/01/2025			2,939,825	**2,939,825**		1,501,500	**1,501,500**				**16,662,592**
08/01/2025	2026	3,455,000	2,939,825	**6,394,825**	1,325,000	1,501,500	**2,826,500**				
12/31/2025								2,458,244	663,074	**3,121,317**	
02/01/2026			2,853,450	**2,853,450**		1,468,375	**1,468,375**				**16,664,467**
08/01/2026	2027	3,630,000	2,853,450	**6,483,450**	1,395,000	1,468,375	**2,863,375**				
12/31/2026								2,482,826	638,491	**3,121,317**	
02/01/2027			2,762,700	**2,762,700**		1,433,500	**1,433,500**				**16,664,342**
08/01/2027	2028	3,815,000	2,762,700	**6,577,700**	1,465,000	1,433,500	**2,898,500**				
12/31/2027								2,507,654	613,663	**3,121,317**	
02/01/2028			2,667,325	**2,667,325**		1,396,875	**1,396,875**				**16,661,717**
08/01/2028	2029	4,015,000	2,667,325	**6,682,325**	1,540,000	1,396,875	**2,936,875**				
12/31/2028								2,532,731	588,586	**3,121,317**	
02/01/2029			2,566,950	**2,566,950**		1,358,375	**1,358,375**				**16,665,842**
08/01/2029	2030	4,220,000	2,566,950	**6,786,950**	1,620,000	1,358,375	**2,978,375**				
12/31/2029								2,558,058	563,259	**3,121,317**	
02/01/2030			2,461,450	**2,461,450**		1,317,875	**1,317,875**				**16,665,967**
08/01/2030	2031	4,435,000	2,461,450	**6,896,450**	1,705,000	1,317,875	**3,022,875**				
12/31/2030								2,583,639	537,678	**3,121,317**	
02/01/2031			2,350,575	**2,350,575**		1,275,250	**1,275,250**				**16,666,467**
08/01/2031	2032	4,660,000	2,350,575	**7,010,575**	1,790,000	1,275,250	**3,065,250**				
12/31/2031								2,609,475	511,842	**3,121,317**	
02/01/2032			2,234,075	**2,234,075**		1,230,500	**1,230,500**				**16,661,717**
08/01/2032	2033	4,900,000	2,234,075	**7,134,075**	1,885,000	1,230,500	**3,115,500**				
12/31/2032								2,635,570	485,747	**3,121,317**	
02/01/2033			2,111,575	**2,111,575**		1,183,375	**1,183,375**				**16,665,842**

Table 20

Debt Service Payment Schedule (cont.)

Due Date	Fiscal Year	2015 Revenue Bond Payment Schedule			2018 Revenue Bond Payment Schedule			CWSRF Loan Payment Schedule			Debt Service
		Principal	Interest	Total	Principal	Interest	Total	Principal	Interest	Total	Total
08/01/2033	2034	5,155,000	2,111,575	**7,266,575**	1,980,000	1,183,375	**3,163,375**				
12/31/2033								2,661,926	459,392	**3,121,317**	
02/01/2034			1,982,700	**1,982,700**		1,133,875	**1,133,875**				**16,667,842**
08/01/2034	2035	5,415,000	1,982,700	**7,397,700**	2,080,000	1,133,875	**3,213,875**				
12/31/2034								2,688,545	432,772	**3,121,317**	
02/01/2035			1,847,325	**1,847,325**		1,081,875	**1,081,875**				**16,662,092**
08/01/2035	2036	5,695,000	1,847,325	**7,542,325**	2,190,000	1,081,875	**3,271,875**				
12/31/2035								2,715,430	405,887	**3,121,317**	
02/01/2036			1,704,950	**1,704,950**		1,027,125	**1,027,125**				**16,667,592**
08/01/2036	2037	5,985,000	1,704,950	**7,689,950**	2,300,000	1,027,125	**3,327,125**				
12/31/2036								2,742,585	378,733	**3,121,317**	
02/01/2037			1,555,325	**1,555,325**		969,625	**969,625**				**16,663,342**
08/01/2037	2038	6,295,000	1,555,325	**7,850,325**	2,420,000	969,625	**3,389,625**				
12/31/2037								2,770,011	351,307	**3,121,317**	
02/01/2038			1,397,950	**1,397,950**		909,125	**909,125**				**16,668,342**
08/01/2038	2039	6,615,000	1,397,950	**8,012,950**	2,540,000	909,125	**3,449,125**				
12/31/2038								2,797,711	323,607	**3,121,317**	
02/01/2039			1,232,575	**1,232,575**		845,625	**845,625**				**16,661,592**
08/01/2039	2040	6,955,000	1,232,575	**8,187,575**	2,675,000	845,625	**3,520,625**				
12/31/2039								2,825,688	295,629	**3,121,317**	
02/01/2040			1,058,700	**1,058,700**		778,750	**778,750**				**16,666,967**
08/01/2040	2041	7,315,000	1,058,700	**8,373,700**	2,810,000	778,750	**3,588,750**				
12/31/2040								2,853,945	267,373	**3,121,317**	
02/01/2041			875,825	**875,825**		708,500	**708,500**				**16,668,092**
08/01/2041	2042	7,685,000	875,825	**8,560,825**	2,955,000	708,500	**3,663,500**				
12/31/2041								2,882,484	238,833	**3,121,317**	
02/01/2042			683,700	**683,700**		634,625	**634,625**				**16,663,967**

Table 20

Debt Service Payment Schedule (cont.)

Due Date	Fiscal Year	2015 Revenue Bond Payment Schedule			2018 Revenue Bond Payment Schedule			CWSRF Loan Payment Schedule			Debt Service
		Principal	Interest	Total	Principal	Interest	Total	Principal	Interest	Total	Total
08/01/2042	2043	8,040,000	683,700	**8,723,700**	3,105,000	634,625	**3,739,625**				
12/31/2042								2,911,309	210,008	**3,121,317**	
02/01/2043			522,900	**522,900**		557,000	**557,000**				**16,664,542**
08/01/2043	2044	8,370,000	522,900	**8,892,900**	3,265,000	557,000	**3,822,000**				
12/31/2043								2,940,422	180,895	**3,121,317**	
02/01/2044			355,500	**355,500**		475,375	**475,375**				**16,667,092**
08/01/2044	2045	8,710,000	355,500	**9,065,500**	3,430,000	475,375	**3,905,375**				
12/31/2044								2,969,826	151,491	**3,121,317**	
02/01/2045			181,300	**181,300**		389,625	**389,625**				**16,663,117**
08/01/2045	2046	9,065,000	181,300	**9,246,300**	3,610,000	389,625	**3,999,625**				
12/31/2045								2,999,525	121,793	**3,121,317**	
02/01/2046		-	-	**-**		299,375	**299,375**				**16,666,617**
08/01/2046	2047	-	-	**-**	3,795,000	299,375	**4,094,375**				
12/31/2046		-	-	**-**				3,029,520	91,797	**3,121,317**	
02/01/2047		-	-	**-**		204,500	**204,500**				**7,420,192**
08/01/2047	2048	-	-	**-**	3,990,000	204,500	**4,194,500**				
12/31/2047		-	-	**-**				3,059,815	61,502	**3,121,317**	
02/01/2048		-	-	**-**		104,750	**104,750**				**7,420,567**
08/01/2048	2049	-	-	**-**	4,190,000	104,750	**4,294,750**				
12/31/2048		-	-	**-**				3,090,413	30,904	**3,121,317**	**7,416,067**
	Total	**148,345,000**	**129,068,795**	**277,413,795**	**65,785,000**	**62,510,258**	**128,295,258**	**80,442,108**	**12,829,913**	**93,272,021**	**498,981,073**

Debt Limit

There is currently no debt limit or ceiling in the California State Water Code for water districts such as WRD. The District has the authority to collect the cost of debt in its Replenishment Assessment (RA). The upper limit of the RA is set by the Board and is in effect a limiting factor in the issuance of debt by the District. Capital Improvement Program additions and betterments will be primarily funded through long-term debt.

Debt Service Coverage

Shown below is the projected Debt Service Coverage (DSC) for fiscal year 2024.

The planned DSC is 1.45x which is 0.25x higher than our bond covenant requirement of 1.2x.

Table 21
Debt Service Coverage

Description	2020 Actual	2021 Actual	2022 Actual	2023 Projection	2024 Budget
Operating Revenue					
Replenishment Assessment	$70,948,823	$76,161,044	$76,677,572	$85,853,685	$84,287,071
Carryover Conversion	7,001,507	4,220,699	7,729,897	4,000,000	6,510,000
LJVWTF - Water Supply	488,860	2,156,938	2,911,592	4,540,291	4,632,000
Goldsworthy Desalter Sales	1,551,550	2,598,650	4,227,871	2,678,000	3,000,000
Albert Robles Center	239,432	692,773	593,580	1,516,335	630,000
Other Income	1,699,703	927,486	941,337	500,500	1,125,000
Transfer from Reserve (Rate Stabilization)	-	-	-	-	3,300,000
Operating Revenue	**$81,929,875**	**$86,757,590**	**$93,081,849**	**$99,088,811**	**$103,484,071**
Revenues	$81,929,875	$86,757,590	$93,081,849	$99,088,811	$103,484,071
Less: Operations & Maintenance	26,918,949	29,522,615	28,274,022	33,550,601	39,714,272
Net Revenue	55,010,926	57,234,975	64,807,827	65,538,210	63,769,799
Debt Service					
CWSRF Loan	3,013,493	2,942,808	3,130,252	3,109,388	3,109,268
2015 Certificates	9,195,567	9,191,608	9,190,692	9,187,546	9,181,921
2018 Certificates	3,015,146	4,276,812	4,272,771	4,275,771	4,271,000
Debt Service	**$15,224,206**	**$16,411,228**	**$16,593,715**	**$16,572,705**	**$16,562,189**
Debt Service Coverage	**3.61**	**3.49**	**3.91**	**3.95**	**3.85**
Rate Covenant Calculation:					
Net Revenue	$55,010,926	$57,234,975	$64,807,827	$65,538,210	$63,769,799
Less: Water Purchase Payments	35,844,159	31,210,752	31,335,792	34,628,433	39,651,941
Revenue for Rate Covenant Calculation	**$19,166,767**	**$26,024,223**	**$33,472,035**	**$30,909,777**	**$24,117,858**
Rate Covenant Debt Service Coverage	**1.26**	**1.59**	**2.02**	**1.87**	**1.46**

Replenishment Projects and Programs

Water Purchases

Sources of Replenishment Water

The District currently has available to it recycled and imported water sources for use as artificial replenishment water. Starting in 2020, with the completion of WRD's ARC facility, the District can plan on using 100% recycled water for its replenishment needs. This was a major accomplishment from the WIN initiative started over a decade ago. Since recycled water availability is reliant upon source water supply from water reclamation plants, imported water connections are kept current to possibly utilize that source should temporary needs arise. These two replenishment sources are described below:

Recycled Water

Recycled water is wastewater from the sewer systems that is reclaimed and purified through extensive treatment at WRPs. The water is treated to high quality standards so that it can be reused safely and offsets the need to use more expensive and sometimes less available imported water. Some agencies and businesses use recycled water for non-potable purposes, such as for irrigation of parks, golf courses, and street medians, or for industrial purposes (known as "purple-pipe projects"). WRD has successfully used recycled water for groundwater recharge since 1962. In semi-arid areas such as Southern California where groundwater and imported water are in short supply, recycled water has proven to be a safe and reliable additional resource to supplement the water supply. Recycled water is used at the spreading grounds and the seawater barrier injection wells and is high quality, relatively low cost, and a reliable supply all year long. As of 2020, the District has all applicable permits and treatment plants completed to plan on 100% recycled water for replenishment at the spreading grounds and seawater barrier wells. Imported water connections are kept current in case shortages of recycled water should occur.

Imported Water

River water originating in northern California (State Water Project and Los Angeles Aqueduct) and from western states (the Colorado River) is imported into Southern California through canals and aqueducts by the MWD and the City of Los Angeles Department of Water and Power (LADWP). MWD sells this water as-is (untreated raw river water) or after it treats the water to potable standards to their member agencies for multiple uses, including municipal, industrial, and groundwater recharge. When needed, WRD purchases raw imported water from the State Water Project at the spreading grounds (Colorado River water is currently not available to WRD due to potential invasive Quagga Mussel issues) and uses treated potable water for injection at the seawater barrier wells and the In-Lieu program. Because of treatment and transportation costs, imported water is the most expensive type for groundwater replenishment. Prior to October 2011, MWD offered seasonally available discounted water that could be purchased for replenishment. In turn for the discount, it was considered by MWD to be interruptible

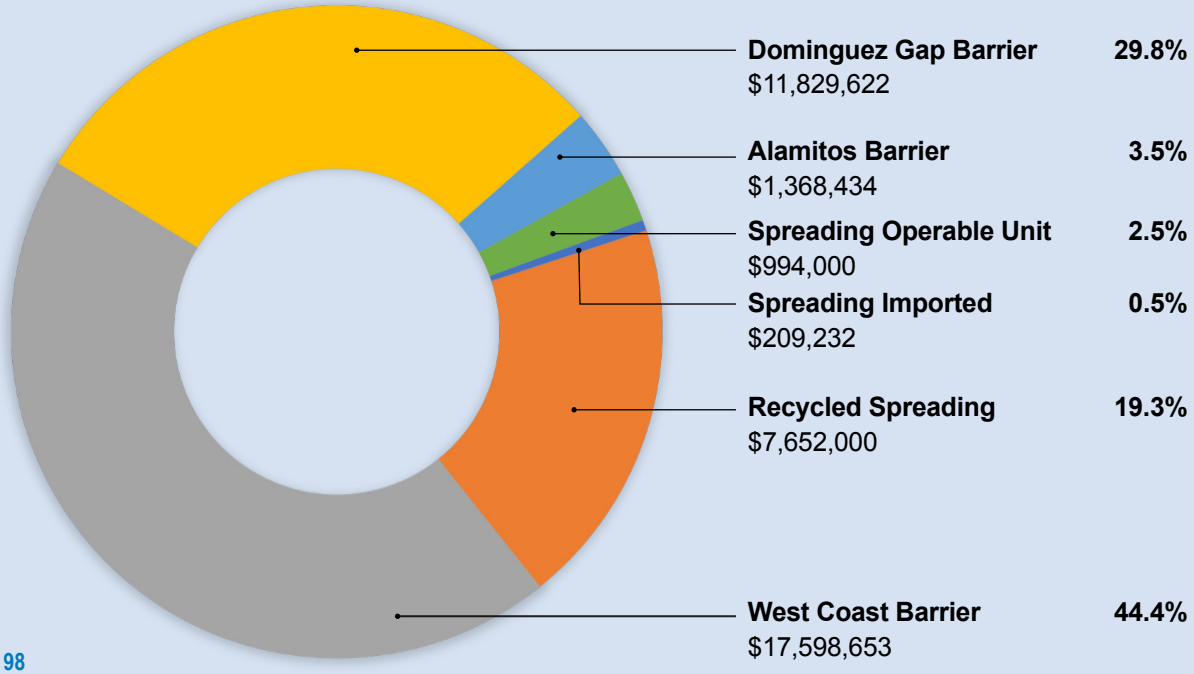
and they could stop deliveries at any time. But due to a lack of surplus supplies caused by drought and other factors, MWD has eliminated offering this type of discounted interruptible water. Instead, replenishment agencies such as WRD must now purchase what is known as “Tier 1” or “Tier 2” water from MWD member agencies for spreading and In-Lieu. This water is at a higher price and relies on available allocation from the member agency. But, this Tier 1 or Tier 2 water is supposed to be firm delivery (not interruptible), although during extreme droughts MWD can implement a water supply allocation to reduce sales of imported water. The seawater barrier injection water has been Tier 1 treated water for decades and has to date not been interrupted by MWD.

Recommended Quantity of Replenishment Water Required in the Ensuing Year

The District determines replenishment water needs based on averages from a long-term (30 year) hydrologic record and computer models, meaning extremely wet years and extremely dry years in addition to average precipitation years are accounted for in deriving the average replenishment needs. Other considerations by the Board are also incorporated into replenishment water needs. The District’s Water Independence Now (WIN) initiative has been successful to build and/or have permitted the recharge facilities it uses to replenish the groundwater basins with 100% recycled water instead of imported water. As these facilities secure the recycled water they need for full operations, the amount of imported water will approach near zero.

Figure 8

Fiscal Year 2024 Estimated Cost of Replenishment Water



Cost and quantity of water that WRD plans to purchase in the ensuing year are as follows:

Table 22

Cost of Replenishment Water for Fiscal Year 2024

Expense Category	FY 2023 Projection	FY 2024 Budget	Increase (Decrease) Over Prior Year
Imported Water			
Spreading - Tier 1 Untreated Imported			
MWD Untreated Tier 1 - Spreading	$-	$-	$-
CBMWD Water Service & Admin Surcharges	$209,232	$209,232	$-
Total Spreading - Tier 1 Untreated Imported	**$209,232**	**$209,232**	**$-**
Alamitos Barrier - Imported			
MWD Treated Tier 1 - Alamitos Barrier	$1,168,311	$1,183,000	$14,689
MWD Capacity Charges/LBWD RTS & Admin Surcharges	$170,587	$185,434	$14,847
Total Alamitos Barrier - Imported	**$1,338,898**	**$1,368,434**	**$29,536**
Dominguez & West Coast Barriers - Imported			
MWD Tier 1 - Dominguez Barrier	$3,048,130	$3,312,400	$264,270
MWD Tier 1 - West Coast Barrier	$4,153,112	$4,140,500	$(12,612)
MWD RTS Charge & WBMWD Capacity/Admin Service Charges	$1,221,644	$1,730,175	$508,531
Total Dominguez & West Coast Barriers - Imported	**$8,422,886**	**$9,183,075**	**$760,189**
In-lieu			
MWD Member Agency	No IL Program	No IL Program	$-
WBMWD Member Agency	No IL Program	No IL Program	$-
Total for In-lieu Payments	**$-**	**$-**	**$-**
Recycled Water			
Dominguez Barrier - Recycled			
LADWP Recycled Water	$6,328,413	$7,130,700	$802,287
Total Dominguez Barrier - Recycled	**$6,328,413**	**$7,130,700**	**$802,287**
Spreading - Recycled			
SDLAC - Tertiary Water (WN, SJC, Pomona)	$5,545,662	$7,652,000	$2,106,338
Recycled - ARC AWTF*	$-	$-	$-
Total Spreading - Recycled	**$5,545,662**	**$7,652,000**	**$2,106,338**
Spreading-Whittier Narrows Operable Unit			
MSGBWM	$1,014,200	$994,000	$(20,200)
Total Spreading - WN Operable Unit	**$1,014,200**	**$994,000**	**$(20,200)**
West Coast Barrier - Recycled			
WBMWD Recycled Water	$11,769,142	$13,114,500	$1,345,358
Total West Coast Barrier - Recycled	**$11,769,142**	**$13,114,500**	**$1,345,358**
Alamitos Recycled - WRD			
WRD Recycled Water - Vander Lans*	$-	$-	$-
Total Alamitos Recycled - WRD	**$-**	**$-**	**$-**
Groundwater Replenishment Reserve	**$-**	**$-**	**$-**
Total Water Purchases	**$34,628,433**	**$39,651,941**	**$5,023,508**

*Cost of source water for ARC AWTF and Vander Lans is covered under that project's separate operations budget.

Acronyms:

CBMWD Central Basin Municipal Water District

LBWD Long Beach Water Department

LADWP Los Angeles Department of Water & Power

MSGBWM Main San Gabriel Basin Watermaster

MWD Metropolitan Water District of Southern California

RTS Readiness-to-Serve

SDLAC Sanitation District of Los Angeles County

SJC San Jose Creek

WBMWD West Basin Municipal Water District

WN Whittier Narrows

WRD Water Replenishment District of Southern California

Table 23

Quantity of Replenishment Water for Fiscal Year 2024

Expense Category	FY 2023 Projection	FY 2024 Budget	Increase (Decrease) Over Prior Year
	By Acre Feet		
	Imported Water:		
Spreading Imported	-	-	-
West Coast Barrier Imported	3,682	2,800	(882)
Dominguez Gap Imported	2,650	3,500	850
Alamitos Imported	1,000	1,000	-
In Lieu - MWD Member Agency	-		-
In Lieu - West Basin Customer	-		-
	Recycled Water:		
Spreading Recycled (SJC & WN & Pomona)	51,417	53,000	1,583
Spreading Recycled (ARC AWTF)*	10,000	11,000	1,000
Spreading (Whittier Narrows Operable Unit)	1,100	1,000	(100)
West Coast Barrier Recycle	9,937	10,500	563
Dominguez Gap Recycled	5,532	5,700	168
Alamitos Recycled*	3,500	3,500	-
Total Water Purchases	**88,818**	**92,000**	**3,182**

*Cost of source water for ARC AWTF and Vander Lans is covered under that project's separate operations budget.

Program 001 -
Leo J. Vander Lans Advanced Water Treatment Facility – Water Supply

Background

The Leo J. Vander Lans (LVL) advanced water treatment facility (AWTF) supplies water to the Alamitos Gap Barrier (AGB). This AWTF utilizes a multitude of treatment technologies, including microfiltration (MF), reverse osmosis (RO) and advanced oxidation (AOP) using hydrogen peroxide and ultraviolet (UV) light. The overall goal of Program 001 is to ensure the health, reliability and sustainability of the groundwater supplies in Southern California and within the WRD service area, while reducing the region's reliance on imported water. This is supported through the unit goal of operating, and maximizing LVL treatment facility production, which provides advanced treated recycled water to the AGB to prevent seawater intrusion, protect the groundwater supplies of the Coastal Plain and reduce the use of imported water.

In July 2020, the transition of contract operations from the Long Beach Water Department to PERC Water was completed and PERC began as the dedicated operational team. At the same time, PERC Water was also the operator at the Albert Robles Center, which afforded the opportunity for operational standardizations and synergies across the two treatment facilities – LVL and the Albert Robles Center. One operational team overseeing both treatment facilities allows for common operational philosophies, procedures and reporting.

Costs for this budget year are primarily related to operations and maintenance expenses of the treatment facility. Typical expenses include fixed labor cost for operations and variable costs such as power, water treatment chemicals and analytical costs to ensure water quality meets all regulatory requirements. Additional routine costs include parts and materials for repairs and maintenance-related issues. As the facility, and especially the original facility commissioned in 2004, continues to age, additional capital investment through the District's refurbishment and replacement (R&R) program and Capital Improvement Program (CIP) have been employed. A condition assessment was completed which systematically evaluated the condition of the treatment plant infrastructure, systems and equipment and identified assets in need of corrective action. In conjunction with this effort, a project was initiated to refurbish the MF filtrate tank and add additional cartridge filtration for protection of downstream MF modules. A project was also initiated to re-design and ultimately upgrade the original, and obsolete plant Supervisory Control and Data Acquisition (SCADA) system, which will dramatically improve plant performance and reliability once completed. The District also broke ground on a construction project to expand the use of recycled water at LVL through operations of an on-site injection well. The LVL treatment plant is coupled to the AGB system and can disrupt steady-state operations of barrier injection wells due to flow variability resulting from plant starts, stops or changes in flow output from the

plant. A project was implemented to better understand the hydraulic impacts, concerns, and identification of measures to mitigate the impacts on the AGB system, which would allow for improved and expanded LVL plant operations.

Operations and maintenance costs are drawn from the Replenishment Fund, while capital investments will be paid through local, State and Federal grant opportunities or debt financing.

FY 2023 Accomplishments

- Achieved a record annual production total of 4,300AF of advanced treated recycled water that met all regulatory requirements for injection in the Alamitos Barrier. This was achieved through stable operations and an expansion of the daily baseline rate of production to 6.0 million gallons per day.
- Worked collaboratively with the Long Beach Water Department, Los Angeles County Sanitation District, and the Los Angeles County Department of Public Works to prioritize and maximize the use of recycled water to satisfy a greater percentage of barrier demand. For FY 2023, a record percentage of recycled water was delivered – 67% of the total barrier demand.
- Initiated the development of a field condition assessment tool (i.e., asset management planning (AMP) tool) for use by Operations and Engineering staff to streamline the process of conducting condition assessments of treatment facility assets. Early-phase information was used in conjunction with the revised District capitalization policy to develop a capitalization budget for the treatment facility.
- Completed construction of an on-site injection well and monitoring well, which will expand the use of advanced treated recycled water beyond supplying the Alamitos Barrier.
- Progress continued on the Supervisory Control and Data Acquisition (SCADA) system upgrade project. Design and documentation were completed, with the next phase of the project consisting of construction and implementation.
- All regulatory and compliance reports were filed in accordance with permit specifications and obligations.
- The solicitation, onboarding and transition to a new, long-term operations and maintenance contract was completed. PERC Water Corporation began operations in January 2023 of the LVL treatment facility.
- Solicitation was completed and multi-year contracts executed to supply bulk generic water treatment chemicals to the LVL treatment facility.

FY 2024 Objectives

- Achieve a targeted production of 4,600AF of advanced treated recycled water that meets all regulatory and permit requirements.
- Filing of reports to ensure adherence with all facility regulatory and compliance permits.
- Achieve regulatory approval and commencement of injection testing of the on-site LVL inland injection well project.

- Completion of a system-wide change-out of lamps in the UVAOP system to maintain compliance as specified in the LVL operations permits.
- Initiation of the 2nd phase of the SCADA system upgrade project, which includes finalization of LVL system-provider contracts, and commencement of system hardware replacement, programming, and integration.
- Complete the development and initiate the use of the asset management planning (AMP) tool to conduct condition assessments of LVL assets.

Basis for Changes from FY 2023 Projection to FY 2024 Budget

The treatment plant demonstrated consistent operations during FY 2023 and achieved record production for the second year in a row – producing 4,300AF of advanced treated recycled water. Achieving sustained operations provides for consistent expenditures, which in turn allows for continued monitoring of costing centers including source water, labor, power and water treatment chemicals – providing valuable information to continue refining the LVL operations budget. Stable operations come the need to account for additional maintenance costs as a result of equipment operating for extended periods of time. The FY 2024 budget is reflective of an increased production goal and support of treatment facility systems, operations, and equipment. This includes the new, long-term operations contract for operations and maintenance of the LVL facility.

Table 24

Program 001 - Leo J Vander Lans AWTF Water Supply

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Water Purchases	$1,231,125	$1,266,000	$34,875
Professional Services	2,056,252	2,925,108	868,856
R&M/Materials/Equipment	1,083,670	1,598,000	514,330
Other Expenses	1,100,584	1,353,300	252,716
Other General & Administration	573,487	365,404	(208,083)
TOTAL	**$6,045,118**	**$7,507,812**	**$1,462,694**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

Program 001 - Leo J Vander Lans AWTF Water Supply				
	FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goals
1 GOAL: Maximize the production of recycled water for delivery to the Alamitos Barrier to reduce imported water.				Expand Replenishment Opportunities
MEASURE: Production of Advanced Treated Water (AF)	4,000 Acre-Feet	4,300 Acre-Feet	4,600 (or 65% ABP supply) Acre-Feet	
2 GOAL: Comply with permit regulatory requirements for monitoring and compliance.				Expand Replenishment Opportunities
MEASURE: Submit compliance reports (monthly, semi-annual and annual) to the Los Angeles Regional Water Quality Control Board and Los Angeles County Sanitation District to satisfy permit compliance requirements. For FY2024, receive approved revised T22 and permit.	100%	100%	100 %	

Program 001 - Leo J Vander Lans AWTF Water Supply		FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goals
3	**GOAL:**				
	Conduct recycled water testing to ensure satisfaction of water quality criteria for the County of Los Angeles Department of Public Works.				Expand Replenishment Opportunities
	MEASURE:				
	Submit Alamitos Barrier Injection Water Quality Reports that satisfy LADPW's water quality standards. For FY2024, completion of the insourcing of water quality testing to reduce analytical costs and streamline dissemination of results.	100%	100%	100%	
4	**GOAL:**				
	Operation and maintenance sufficient to ensure and improve the reliability and sustainable operations of the treatment facility.				Expand Replenishment Opportunities
	MEASURE:				
	Treatment facility annual production, as impacted by shut-downs and interruptions in service.	100%	100%	100%	
5	**GOAL:**				
	Completion of a comprehensive asset management program that addresses asset operations, maintenance and repairs; development of a condition assessment program.				Expand Replenishment Opportunities
	MEASURE:				
	Utilization of the developed asset management tools to support the assembly of O&M budgets, capital R&R budgets and long-term facility planning.	N/A	50%	100%	

Program 004
Montebello Forebay Recycled Water

Background

Recycled water has been and continues to be a cost-effective, reliable source of water for surface spreading in the Montebello Forebay and injection at the seawater intrusion barriers. In light of exposure to prolonged drought like the region encounters quite frequently, with record-low rainfalls and increasing uncertainty in the winter snow pack and availability of imported supplies, recycled water has become increasingly attractive as a locally sustainable solution to improving the reliability of the local groundwater supply. WRD's Water Independence Now (WIN) for All, or WIN 4 ALL, program seeks to replace our imported water supplies with recycled water and stormwater to ensure reliable and high quality groundwater replenishment sources for the Central and West Coast Basins.

WRD participates in a variety of activities to ensure that the use of recycled water for groundwater recharge continues to remain safe and reliable. From an operational standpoint, the District will continue to fulfill groundwater monitoring duties as required by our various recycled water for recharge permits, and submit the results to the regulatory agencies to demonstrate that the current practices and operation of utilizing recycled water, along with other sources of water, remain safe.

In addition to providing regular monitoring and sampling associated with the Montebello Forebay spreading grounds, WRD, in conjunction with other agencies, periodically participates in research efforts to more fully investigate the effectiveness of soil aquifer treatment during infiltration of recycled water into the aquifers, and the travel time of recycled water once recharged to the nearest drinking water wells through tracer studies. The overall objectives are to characterize the percolation process and quantify the purifying properties of the underlying soil on constituents of concern such as nitrogen, total organic compounds (TOC), biodegradable dissolved organic carbon (BDOC), and emerging contaminants, such as pharmaceuticals, endocrine disruptors, personal care products, and per- and polyfluoroalkyl substances (PFAS).

Recycled water represents a significant portion of the source water portfolio for the three seawater intrusion barrier projects (Alamitos Gap, West Coast, and Dominguez Gap Barriers) as well as the Albert Robles Center for Water Recycling and Environmental Learning (ARC – formerly known as GRIP). Preparation for a new tertiary-quality recycled water permit to replace the 1991 permit for the Montebello Forebay will also be a major collaborative effort with the Los Angeles County Sanitation Districts (LACSD).

Projects under this program help to improve the reliability and utilization of an available local resource, i.e., recycled water, which is used to improve replenishment capabilities. This is a regular program with standard, recurring year to year activities. The projects under this program are funded entirely from the Replenishment Fund.

FY 2023 Accomplishments

- Continued working on a revised permit for spreading tertiary-treated recycled water into the Montebello Forebay.
- Continued preparing an updated draft of the Title 22 Engineering Reported for the Montebello Forebay Recycled Water Recharge Project.
- Continued to comply with water recycling permit requirements for the Montebello Forebay Spreading Grounds, including bi-monthly sampling of monitoring wells, semi-annual monitoring of production wells and quarterly monitoring of intakes to the spreading facilities.
- Continued to monitor recycled water use at seawater barrier wells, collecting hundreds of groundwater samples for analysis. Completed quarterly and annual permit compliance reports.

FY 2024 Objectives

- In collaboration with the LACSD, continue working on a revised tertiary-treated recycled water permit for the Montebello Forebay. Work will include data analysis, potential new monitoring well drilling, submitting drafts to and meeting with the regulatory agencies, and drafting a Title 22 Engineering Report.
- Continue to comply with water recycling permit requirements for the Montebello Forebay Spreading Grounds, including bi-monthly monitoring of monitoring wells, semi-annual monitoring of production wells and quarterly monitoring of intakes to the spreading facilities.
- Continue to comply with water recycling permit requirements for the seawater barrier injection wells, including monitoring well sampling and permit compliance reporting.
- Continue to facilitate the ongoing dialogue between the LACSD, Metropolitan Water District, and City of Los Angeles to increase the amount of recycled water available for groundwater recharge in the WRD service area.

Basis for Changes from FY 2023 Projection to FY 2024 Budget

FY 2023 planned budget for staff and professional services was moved forward due to agency delays and is anticipated to be spent in FY 2024.

Table 25

Program 004 – Montebello Forebay Recycled Water

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Professional Services	$230,000	$230,000	$-
R&M/Materials/Equipment	32,000	35,000	3,000
Other Expenses	38,775	38,250	(525)
Other General & Administration	135,832	58,753	(77,079)
TOTAL	**$436,607**	**$362,003**	**$(74,604)**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

	Program 004 – Montebello Forebay Recycled Water	FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goals
1	**GOAL:** Continue to comply with water recycling permit requirements for the Montebello Forebay Spreading Grounds.				Maximize Innovation and Environmental Resiliency
	MEASURE: % of regulatory permit requirements and deadlines met.	100%	100%	100%	
2	**GOAL:** Continue to facilitate the ongoing dialogue between agencies to provide more recycled water for groundwater recharge.				Expand Replenishment Opportunities
	MEASURE: Quarterly meetings with LACSD, LACDPW, etc.	4	4	4	
3	**GOAL:** Participate in the preparation of Title 22 Engineering Report.				Expand Replenishment Opportunities
	MEASURE: WRD portion of the report will be submitted to LACSD.	1	1	1	

Program 005
Groundwater Resource Planning

Background

The Groundwater Resources Planning Program was instituted to evaluate basin management issues and to provide a means of assessing potential projects and the associated impacts over the Central and West Coast Groundwater Basins. Prior to moving forward with a new project, an extensive evaluation is always undertaken. Within the Groundwater Resources Planning Program, new projects and programs are analyzed and evaluated based on benefits to overall basin management. Beyond technical feasibility, this analysis also includes performing an extensive economic evaluation to compare estimated costs with anticipated benefits. As part of this evaluation process, all new capital projects are brought to the District's Technical Advisory Committee (TAC) for review and recommendation. Projects deemed worthy by the TAC and District Board will then be recognized as independent projects and may be included within the District's Five-Year Capital Improvement Program.

WRD will continue to coordinate with basin stakeholders to develop projects that increase replenishment resiliency and utilize available groundwater storage. Meanwhile, the District will continue to determine the effects of such programs on the overall management of the basins and the specific impacts to aspects such as water levels, annual overdraft, accumulated overdraft, etc. The management of this program requires close review and administration by the District staff.

During the coming year, work under this program will focus on WRD's vision for the future under WIN4ALL, the 2040 plan for regional water independence. Under WIN4ALL, WRD looks to utilize available storage in both groundwater basins, secure new locally sustainable water supplies for replenishment and storage, review operational alternatives for the Central and West Coast basins, and full utilization for all existing groundwater pumping rights. In addition to moving forward with WIN4ALL, the Groundwater Resources Planning Program will look to identify and provide technical assistance to purveyors to ensure they have the ability to maximize their groundwater rights.

Additionally, the District will continue to evaluate projects identified in the CIP. Specifically, funds have been allocated within this program to perform an in-depth evaluation of projects with the goal of increasing the District's competitiveness for grant funding opportunities.

District staff will continue to monitor and participate in the Greater Los Angeles Integrated Regional Water Management Plan (GLAC IRWMP) and three Los Angeles County Safe Clean Water (Measure W) Steering Committees and the Scoring Committee. The District serves as the co-chair for the GLAC IRWM Lower Los Angeles River and San Gabriel River Subcommittee. The District also coordinates the subregion meetings and manages the outreach to subregion members. Participation in this process is necessary if the District wishes to secure grant funding under Proposition 1, and other state grant funding

opportunities. District staff will also continue to monitor State and Federal grant programs to determine applicability to the District's list of potential projects. WRD will continue to work with Federal agencies, such as the U.S. Bureau of Reclamation to identify potential opportunities for funding.

Projects under the Groundwater Resources Planning Program serve to improve replenishment operations and general basin management. Accordingly, this program is wholly funded through the Replenishment Assessment Fund.

FY 2023 Accomplishments

- Completed the WIN4ALL Strategic Plan
- Received $2 million grant for the Brewer Well Optimization Project at Goldsworthy Desalter from the Department of Water Resources.
- Selected as a Technical Assistance Provider to facilitate $3 million grant for O&M reimbursement for two purveyors under the State Water Resources Control Board's Prop 68 Groundwater Treatment and Remediation Program.
- Received a $2.5 million Federal Community Grant for PFAS treatment specifically for the benefit of water purveyors within the 38th Congressional District.
- Submitted two grant applications for PFAS treatment on behalf of two water purveyors for the State Water Resources Control Board's State Revolving Fund Program.

FY 2024 Objectives

- Initiate WIN4ALL Goal No.1 to encourage and assistance pumpers exercise all their unused groundwater rights.
- Complete and submit a Bureau of Reclamation Title XVI Feasibility Study for Per- and Polyfluoroalkyl Substances (PFAS) in the Central Basin.
- Submit a Hazard Mitigation Plan (HMP) for review to California Office of Emergency Services, for WRD to be eligible for future FEMA funding.
- Complete and submit grant and loan applications for the Brackish Groundwater Reclamation Program, specifically the State Water Resources Control Board's Clean Water State Revolving Fund, EPA's Water Infrastructure Finance and Innovation Act, and the Bureau of Reclamation Title XVI Desalination Construction Projects program.
- Execute an MOA with West Basin Municipal Water District to complete a Feasibility Study to evaluate joint projects for replenishment and extraction in the West Coast and Central Basins.
- Execute an MOU with Los Angeles Department of Water and Power for recycled water from their Operation Next Initiative for replenishment and storage purposes.
- Initiate preliminary agreement with Metropolitan Water District (MWD) for recycled water from their Pure Water Southern California Program for replenishment and storage purposes.

Basis for Changes from FY 2023 Projection to FY 2024 Budget

The change in FY 2024 budget is due to increase in professional services and labor allocation to the program.

Table 26

Program 005 – Groundwater Resources Planning

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Professional Services	$1,050,000	$1,200,000	$150,000
R&M/Materials/Equipment	-	-	-
Other Expenses	462,006	473,750	11,744
Other General & Administration	325,111	311,750	(13,361)
TOTAL	**$1,837,117**	**$1,985,500**	**$148,383**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

Program 005 – Groundwater Resources Planning					
		FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goal
1	**GOAL:** Draft WIN4ALL Strategic Plan.				Maximize Innovation and Environmental Resiliency
	MEASURE: Completed Plan.	N/A	100%	0%	
2	**GOAL:** Continue to facilitate agreements with partner agencies for recycled water access.				Maximize Innovation and Environmental Resiliency
	MEASURE: Executed MOU, JPA, or Agreements	N/A	50%	70%	
3	**GOAL:** Complete BOR Title XVI Feasibility Study for PFAS in Central Basin.				Maximize Innovation and Environmental Resiliency
	MEASURE: Submit completed Study to BOR for consideration	N/A	80%	20%	
4	**GOAL:** Identify outside funding opportunities for WRD's projects.				Maximize Innovation and Environmental Resiliency
	MEASURE: Submitted grant application.	N/A	50%	50%	

Program 018
Dominguez Gap Barrier Recycled Water Project

Background

This Project involves the delivery of recycled water from the City of Los Angeles Terminal Island Treatment Plant (TITP) to the Dominguez Gap Barrier (DGB). The portion of the TITP effluent destined for the Barrier first undergoes a set of advanced treatment, consisting of microfiltration, reverse osmosis, and chlorination, at the Advanced Water Treatment Facility. The plant has been recently expanded from 6.0 million gallons per day (mgd) to 12.0 mgd with the goal to eliminate the use of imported water at the DGB.

The City of Los Angeles Bureau of Sanitation (LABOS) and Los Angeles Department of Water and Power (LADWP) are responsible for the treatment and delivery of the recycled water and all the water quality sampling at the treatment plant associated the final recycled water. The District conducts groundwater monitoring, which is required to observe changes in aquifer water quality conditions and to anticipate potential problems before recycled water reaches drinking water wells. The District also performs groundwater modeling to simulate the fate and transport of the recycled water in the aquifers after injection. This monitoring commenced with the start of the recycled water deliveries in February 2006. Baseline monitoring was completed to establish preexisting groundwater quality conditions prior to the start of deliveries.

Recycled water use at the barriers improves the reliability of a water supply that is needed on a continuous basis, in order to prevent seawater intrusion. Traditionally, water purchases for the barriers have been viewed as a replenishment function. Therefore, this program is funded entirely through the Replenishment Fund.

FY 2023 Accomplishments

- Participated in regular meetings with LABOS and LADWP to discuss issues related to the continuous production of ATW and the TITP.
- Ongoing discussions associated with new water purchase agreement with LADWP.
- Continued groundwater monitoring in accordance with permit requirements.
- Continued to prepare groundwater compliance monitoring reports to provide to project permittees LADWP, LABOS, and LACDPW.
- Began construction activities associated with the Second Gap Connection.

FY 2024 Objectives

- Increase recycled water contribution to the DGB.
- Continue to conduct groundwater monitoring and modeling as necessary in accordance with permit requirements.

- Continue to provide groundwater compliance monitoring data to project permittees LADWP, LABOS and LACDPW.
- Complete construction of the Second Dominguez Gap RW Connection
- Work with LADWP to begin design of the Dominguez Gap Potable Backup project.

Basis for Changes from FY 2023 Projection to FY 2024 Budget

The change is primarily associated with a labor allocation evaluation and subsequent adjustment for FY 2024.

Table 27

Program 018 – Dominguez Gap Barrier Recycled Water Project

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Professional Services	$155,000	$155,000	$-
R&M/Materials/Equipment	24,000	25,000	1,000
Other Expenses	12,500	14,500	2,000
Other General & Administration	144,552	79,419	(65,133)
TOTAL	**$336,052**	**$273,919**	**$(62,133)**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

Program 018 – Dominguez Gap Barrier Recycled Water Project					
		FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goal
1	**GOAL:** Prepare compliance monitoring reports and coordinate reporting/compliance for submittal to permittees (LADWP, LABOS, & LACDPW) to ensure all regulatory permit requirements and deadlines are met.				Maximize Innovation and Environmental Resiliency
	MEASURE: % of regulatory permit requirements and deadlines met.	100%	100%	100%	
2	**GOAL:** Prepare and post RFBs for Second Gap Connection & Potable Backup Projects. Construction is anticipated to begin in FY2023.				Maximize Innovation and Environmental Resiliency
	MEASURE: Post RFBs and Start Construction.	1 (Award)	1 (Construct)	1 (Construct)	

Program 023
Replenishment Operations

Background

WRD actively monitors the operations and maintenance practices at the spreading grounds and seawater barrier wells owned and operated by the Los Angeles County Department of Public Works (LACDPW). Optimizing replenishment opportunities is fundamentally important to WRD, in part because imported and recycled water deliveries directly affect the District's annual budget. Consequently, the District seeks to ensure that the conservation of stormwater is maximized, and that imported and recycled water replenishment are optimized.

WRD coordinates regular meetings with LACDPW, Metropolitan Water District of Southern California, Sanitation Districts of Los Angeles County (LACSD), and other water interests to discuss replenishment water availability, spreading grounds operations, scheduling of replenishment deliveries, seawater barrier improvements, upcoming maintenance activities, and facility outages or shutdowns. The District tracks groundwater levels in the Montebello Forebay weekly to assess general basin conditions and to determine the level of artificial replenishment needed. Additionally, WRD monitors the amount of recycled water used at the spreading grounds and seawater barriers, to maximize its use while complying with regulatory limits.

As its name implies, this program deals primarily with replenishment issues, and its costs are borne completely by the Replenishment Fund.

FY 2023 Accomplishments

- Continued working cooperatively with the LACDPW, Orange County Water District (OCWD), LACSD, and Long Beach Water Department (LBWD) on the Leo Vander Lans (LVL) Plant Operations, OCWD Barrier Expansion, and Long Beach Waste Treatment Plant (LBWTP) Multi-year Maintenance Project to provide increased recycled water to the Alamitos Gap Barrier.
- Continued working cooperatively with the LACDPW and West Basin Municipal Water District (WBMWD) to maximize recycled water to the West Coast Basin Barrier.
- Continued working cooperatively with the Los Angeles Department of Water and Power (LADWP), Los Angeles Bureau of Sanitation (LABOS), and LACDPW on the Terminal Island Treatment Plant (TITP) to provide increased recycled water to the Dominguez Gap Barrier.
- Continued participating in bimonthly meetings with replenishment agencies to maximize groundwater recharge opportunities.
- Continued to evaluate new potential replenishment opportunities (e.g., replenishment water sources, spreading grounds improvements).
- Providing input/comments on technical memorandums prepared to evaluate new potential replenishment

opportunities (e.g., replenishment water sources, spreading grounds improvements, WRD/LADWP Joint L.A. Basin Replenishment and Extraction Master Plan, Regional Brackish Water, etc.).

- Presented monthly updates to the WRD Water Resources Committee and posted reports online at https://www.wrd.org/groundwater-basin-update.

FY 2024 Objectives

- Work with United States Geological Survey (USGS), United States Army, Corp of Engineers (USACOE), LACDPW, San Gabriel River Watermaster (SGRWM), and other applicable agencies/stakeholders on enhancement/upgrade of existing surface water gaging stations.
- Continue working with LACDPW on the West Coast Basin Barrier expansion project (Unit 13).
- Continue working cooperatively with the LACDPW on an operations plan for the Interconnection Pipeline to maximize its usage to move recycled water.
- Continue working cooperatively with the LACDPW on recommendations from the Enhanced-Montebello Forebay Recharge Enhancement Study (eMFRES).
- Working cooperatively with LACDPW, USACOE, LACDPW, San Gabriel River Watermaster (SGRWM), and other applicable agencies/stakeholders on evaluating the results and alternatives presented in the Zone 1 Condition Assessment Report.
- Continue working cooperatively with the LADWP, LABOS, and LACDPW on the expanded TITP to provide increased recycled water to the Dominguez Gap Barrier.
- Continue working cooperatively with the LACDPW, OCWD, LACSD, and LBWD on the LVL Plant Operations follow-up, OCWD Barrier Expansion follow-up, and LBWTP Multi-year Maintenance Project follow-up to provide increased recycled water to the Alamitos Gap Barrier.
- Continue working with Engineering staff to equip a newly installed Inland Injection well at LVL.
- Continue working cooperatively with the LACDPW and WBMWD to maximize recycled water to the West Coast Barrier.
- Continue participating in bimonthly meetings with replenishment agencies to maximize groundwater recharge opportunities.
- Continue to evaluate new potential replenishment opportunities (e.g., replenishment water sources, spreading grounds improvements, WRD/LADWP Joint L.A. Basin Replenishment and Extraction Master Plan, Regional Brackish Water, etc.).
- Continue to provide monthly updates to the WRD Water Resources Committee.

Basis for Changes from FY 2023 Projection to FY 2024 Budget

Budget added for agency correspondence associated with permit renewal for the Montebello Forebay.

Table 28

Program 023 – Replenishment Operations

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Professional Services	$51,000	$51,000	$-
R&M/Materials/Equipment	23,500	25,000	1,500
Other Expenses	3,150	4,150	1,000
Other General & Administration	181,048	216,646	35,598
TOTAL	**$258,698**	**$296,796**	**$38,098**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below

Program 023 – Replenishment Operations

		FY 2022 Actual	FY 2023 Budget	FY 2024 Actual	District's Strategic Goal
1	**GOAL:**				
	Continue working cooperatively with the LADWP, LABOS, and LACDPW on the Terminal Island Treatment Plant Expansion to provide increased recycled water to the Dominguez Gap Barrier.				Maximize Innovation and Environmental Resiliency
	MEASURE:				
	Recycled water increased to the Dominguez Gap Barrier (Assumes TITP delivering 6.0 MGD).	7,604 AF Total 2,897 AF RW	7,600 AF Total 5,100 AF RW	8,500 AF Total 5,700 AF RW	

Program 023 – Replenishment Operations (Cont.)

		FY 2022 Actual	FY 2023 Budget	FY 2024 Actual	District's Strategic Goal
2	**GOAL:**				
	Continue working cooperatively with the LACDPW and LACSD on the Montebello Forebay Spreading Grounds to provide increased RW. Goal is 63,000 including 56,000 tertiary and 7,000 GRIP water for its first year.				Maximize Innovation and Environmental Resiliency
	MEASURE:				
	Recycled water increased recycled water to the Spreading Grounds	50,013 AF 3° RW 11,817 AF ATW	41,000 AF 3° RW 3,500 AF ATW	53,000 AF 3° RW 11,000 AF ATW	
3	**GOAL:**				
	Continue working cooperatively with the LACD-PW, LBWD, and OCWD on the Alamitos Gap Barrier Project to provide increased recycled water to the Alamitos Gap Barrier.				Maximize Innovation and Environmental Resiliency
	MEASURE:				
	Recycled water increased to the Alamitos Gap Barrier (assumed full operation of LVL).	7,213 AF Total 2,947 AF RW WRD: 4,487 AF Total 2,688 AF RW	6,500 AF Total 4,400 AF RW WRD: 4,100 AF Total 2,800 AF RW	7,800 AF Total 6,000 AF RW WRD: 4,500 AF Total 3,500 AF RW	
4	**GOAL:**				
	Continue working cooperatively with the LACDPW and WBMWD on the West Coast Barrier Project to provide increased recycled water to the West Coast Barrier.				Maximize Innovation and Environmental Resiliency
	MEASURE:				
	Recycled water increased to the West Coast Barrier.	10,634 AF Total 2,922 AF RW	12,800 AF Total 7,900 AF RW	14,000 AF Total 10,500 AF RW	

Program 033
Albert Robles Center for Water Recycling and Environmental Learning (ARC)

Background

The Albert Robles Center (ARC) is a multiuse campus consisting of the treatment facility, Administration Learning Center (ALC), interpretive gardens and two, off-site turnout structures along the San Gabriel River. The advanced water treatment facility (AWTF) treats recycled water provided by the Los Angeles County Sanitation District's San Jose Creek Water Reclamation Plant using technologies including ultrafiltration (UF), reverse osmosis (RO) and advanced oxidation (AOP) using chlorine and ultraviolet (UV) light. The ALC and gardens provides office space for WRD staff, conference rooms and facilities to support WRD activities, public outreach and education. The overall goals of Program 033 are to ensure the health, reliability and sustainability of the ground water supplies in Southern California and within the WRD service area. Project 033 supports this through the unit goal of operating the AWTF, which supplies advanced treated recycled water to the San Gabriel Coastal Spreading Grounds to satisfy the water demand within the Central Basin and reduce the use of imported water. Project 033 also supports the District's outreach efforts to educate the public regarding the importance of water conservation, recycling and sustainability.

Operations of the ARC treatment facility are overseen by PERC Water Corporation, through a long-term contract which was initiated on January 1, 2023. As the original team under contract with J.F. Shea Construction (JFS), PERC Water possesses an established working knowledge of plant operations and continued to focus on maintaining steady-state operations while identifying areas for optimization and improved performance. For the fiscal year, the production goal continued to remain 10,000AF of advanced treated recycled water that met all regulatory requirements.

Expected costs for this budget year are reflective of anticipated expenses for facility operations. These include the treatment plant, administration learning center and grounds and turnout structures along the San Gabriel River. Major costing centers for the treatment facility include fixed labor for operations and variable costs, including source water, power and water treatment chemicals – all of which collectively make up a majority of the Program 033 budget. Additional costing centers include analytical costs for water quality regulatory compliance, site-wide security, landscaping and janitorial as well as maintenance of systems and equipment in both the treatment facility and administration learning center. ARC is a multiuse facility and therefore the Program 033 budget is reflective of this - structured to account for both treatment facility and non-treatment facility expenses. The Replenishment Fund will serve as the funding source for this program.

FY 2023 Accomplishments

- Produced 4,400AF of advanced treated recycled water that met all regulatory requirements for discharge to the San Gabriel Coastal Spreading Grounds.
- Maintained close coordination with the Los Angeles County Department of Public Works regarding ARC operations during the prolonged series of storm events which impacted the Los Angeles area. Significant storm water capture resulted in reduced ARC treatment facility operations due to limited recharge capacity in the coastal spreading grounds.
- All regulatory and compliance reports were filed in accordance with permit specifications and obligations.
- The solicitation, onboarding and transition to a new, long-term operations and maintenance contract was completed. PERC Water Corporation began operations in January 2023 of the ARC treatment facility.
- Completion of a comprehensive Operations and Maintenance (O&M) manual for operations and maintenance of the treatment facility.
- Solicitation was completed and multi-year contracts executed to supply bulk generic water treatment chemicals to the ARC treatment facility.
- Maintain ALC facilities and garden area(s) to ensure uninterrupted public access for tours and events.

FY 2024 Objectives

- Achieve the targeted production of 10,000AF of advanced treated recycled water that meets all regulatory and permit requirements.
- Filing of reports to ensure adherence with all facility regulatory and compliance permits.
- Coordinated with the Los Angeles Regional Water Quality Control Board for renewal of the National Pollutant Discharge Elimination System (NPDES) Permit – a requirement for discharge to the San Gabriel River.
- Complete the development and initiate the use of the asset management planning (AMP) tool to conduct condition assessments of ARC treatment facility assets.
- Completion of the upgrade to the solar PV system to maximize on-site generation and reduce power cost.
- Maintain ALC facilities and garden area(s) to ensure uninterrupted public access for tours and events.

Basis for Changes from FY 2023 Projection to FY 2024 Budget

The FY 2024 budget supports three distinct facilities – the treatment facility, administration learning center (ALC) and gardens, and the turnout structures along the San Gabriel River. As the ARC facility is now exhibiting consistent operations, expenditures continue to refine budgets. Year over year increases in the ARC operational budget are associated with rising costs of parts, supplies and utilities such as electricity and bulk chemicals. The reopening of the ALC and gardens for tours, events and other activities has warranted an increase in staff time and resources to provide the level of support necessary for facility operations.

Table 29

Program 033 – Albert Robles Center AWTF

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Water Purchases	$1,516,335	$3,090,000	$1,573,665
Professional Services	2,432,529	2,858,092	425,563
R&M/Materials/Equipment	1,874,220	2,300,000	425,780
Other Expenses	2,976,969	3,045,300	68,331
Other General & Administration	357,946	612,226	254,280
TOTAL	**$9,157,999**	**$11,905,618**	**$2,747,619**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

Program 033 – Albert Robles Center for Water Recycling & Environmental Learning (ARC)				
	FY 2022 Actual	FY 2023 Budget	FY 2024 Budget	District's Strategic Goal
1 **GOAL:** Consistent and stable operations of the treatment facility to produce 10,000AF of advanced treated recycled water that meets all regulatory specifications.				Expand Replenishment Opportunities
MEASURE: Production of Advanced Treated Water (AF)	10,600 Acre-Feet	4,430 Acre-Feet	10,000 Acre-Feet	
2 **GOAL:** Operations optimization of the AWTF to maintain steady and/ or reduced variable costs including power, chemicals and brine disposal.				Expand Replenishment Opportunities
MEASURE: Reduced bulk chemical usage, brine disposal and improved product water quality; establish new bulk chemical contracts for plant operations.	100%	100%	100%	
3 **GOAL:** Completion of transition operations with J.F. Shea Construction and implement a long-term contract for facility operations and maintenance.				Expand Replenishment Opportunities
MEASURE: Close-out of any/all remaining contracts with JFS and execution of a new, long-term contract with a third-party operational team.	100%	100%	NA: Completed	

Program 033 – Albert Robles Center for Water Recycling & Environmental Learning (ARC)				
	FY 2022 Actual	FY 2023 Budget	FY 2024 Budget	District's Strategic Goal
4 **GOAL:**				
Support ARC campus operations and maintenance activities for both treatment and non-treatment activities such as tours, seminars and community outreach events.				Promote Organizational Excellence
MEASURE:				
Scheduling and hosting of tours, events and activities - conducted in accordance with all safety procedures, protocols and practices.	100%	100%	100%	
5 **GOAL:**				
Completion of a comprehensive asset management program that addresses asset operations, maintenance and repairs; development of a condition assessment program and an on-site storeroom for parts and supplies.				Expand Replenishment Opportunities
MEASURE:				
Utilization of the developed asset management tools to support the assembly of O&M budgets, capital R&R budgets and long-term facility planning; completion of a functional, on-site storeroom.	N/A	50%	100%	


RO INTERSTAGE
RO INTERSTAGE
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RO CONCENTRATE

Project 038
Engineering Program

Background

The Engineering Department provides technical, engineering, program management, and hands on support on capital improvement projects ranging from concept development through engineering design, project management and construction inspections. The Engin-eering Department is also responsible for developing, updating, and managing the capital improvement program (CIP) and its related projects. The Engineering Department prepares and/or oversees the preparation plans, specifications and engineer's estimates of probable construction costs (PS&E's), or creates request for proposals/qualifications (RFPs/ RFQs) for professional engineering consultation and construction management services depending on the size and specific needs of the project.

This Engineering Department receives and reviews public bids and provides recommendations to various committees and the Board of Directors to award contracts; applies, secures, and administers/manages grants from various Federal, State and Local organizations to supplement funds allocated by WRD.

The Engineering Department provides (oversees) project planning and environmental review/entitlement services for its Capital Improvement Program (CIP); monitors construction work in progress, reviews/approves progress pay estimates; and provides quality assurance/control oversight services on approved development projects to ensure compliance with Board goals and objectives.

The Engineering Program is intended to provide a mechanism for engineering staff to plan and further develop alternatives for potential capital improvement projects. Not all CIP project concepts develop into multi-year capital improvement program projects, and more often than not require many months of advanced planning and concept development before being capitalized. The Engineering Program deals primarily with replenishment issues and therefore its costs are borne by the Replenishment Fund until such time as alternative capital improvement program funding is identified.

FY 2023 Accomplishments

- Updated the 5-year CIP Plan in June 2023
- Managed and monitored the CIP Budget throughout the fiscal year.
- Began review and update Construction Project Front-end Documents

FY 2024 Objectives

- Update the 5-year CIP Plan
- Manage and monitor the CIP Budget throughout the fiscal year.
- Complete the update to Construction Project Front-end Documents

Basis for Changes from FY 2023 Projection to FY 2024 Budget

The increase in FY 2024 is due to reallocation of staff time to support the engineering program.

Table 30

Program 038 – Engineering

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Professional Services	$114,274	$30,000	$(84,274)
R&M/Materials/Equipment	-	-	-
Other Expenses	20,910	38,200	17,290
Other General & Administration	413,855	802,145	388,290
TOTAL	**$549,039**	**$870,345**	**$321,306**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

Program 038 – Engineering					
		FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District Goals
1	**GOAL:** Update the 5-year CIP Plan. **MEASURE:**				- Expand Replenishment Opportunities - Expand Extraction Capacity - Promote Organizational Excellence
	Release of updated 5-year CIP plan	November 2022	November 2023	October 2024	
2	**GOAL:** Manage and monitor the CIP Budget throughout the fiscal year. **MEASURE:**				Promote Organizational Excellence
	Ensure individual projects adhere to the CIP Budget and make adjustments as needed	June 2022	June 2023	June 2024	
3	**GOAL:** Review and update Construction Project Front-end Documents **MEASURE:**				Promote Organizational Excellence
	Adopt new documents for incorporation into CIP procurement process	N/A	N/A	June 2024	

Program 046
Well Construction & Rehabilitation Program

Background

The District developed a Well Construction and Rehabilitation Loan Program in Fiscal Year 2019 to assist groundwater producers within its service area to increase their groundwater pumping capabilities. This Program will improve the producers' ability to utilize their full groundwater extraction rights and reduce their need for imported water. The Program provides 10-year, zero percent interest loans, up-front capital, and expert assistance with the design, construction, and implementation of new production wells and well rehabilitation projects. Program recipients are required to maintain or increase their most recent 5-year total extraction average.

FY 2023 Accomplishments

- Continued loan repayment by the City of Vernon and the City of Signal Hill.
- Continued offering loan program to interested and qualified groundwater producers.

FY 2024 Objectives

- Continue offering loan program to interested and qualified groundwater producers and encourage at least one additional pumper to submit an application for consideration.
- Continue receiving quarterly payments from the City of Vernon and City of Signal Hill for their completed projects.

Basis for Changes FY 2023 Projection to FY 2024 Budget

We did not receive any applications for consideration in FY2023, thus we do not expect any new loan disbursement in FY2024

Table 31

Program 046 - Well Construction & Rehabilitation			
Expense Category	**FY 2023 Projection**	**FY 2024 Budget**	**FY 2024 Budget compared to FY 2023 Projection**
Professional Services	$-	$-	$-
R&M/Materials/Equipment	-	-	-
Other Expenses	-	-	-
Other General & Administration	13,102	19,075	5,973
TOTAL	**$13,102**	**$19,075**	**$5,973**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

Program 046 - Well Construction & Rehabilitation				
	FY 2022 Actual	**FY 2023 Actual**	**FY 2024 Budget**	**District's Strategic Goal**
1 GOAL:				
Provide well construction and rehabilitation loans to assist pumpers maximize their groundwater rights by maintaining or increasing groundwater pumping.				Expand Extraction Capacity
MEASURE:				
Loan recipient ability to maintain or increase pumping.	N/A	50%	50%	

Clean Water Projects and Programs

Program 002 – Robert W. Goldsworthy Desalter

Background

The Robert W. Goldsworthy Desalter (Desalter), located in the City of Torrance, began operating in 2002, and utilizes reverse osmosis (RO) as the main treatment technology for salinity removal before water can be conveyed to the City of Torrance potable distribution system. Source water to the Desalter is provided by two production wells – the City Yard Well, located in the City of Torrance property and the Delthorne Park Well, located adjacent to the City of Torrance property in Delthorne Park. The Desalter and both wells are operated under contract by the City of Torrance Water Department. In FY 2018, the Desalter was expanded to a design capacity of 5mgd, utilizing the same treatment processes and the two production wells. The overall goal of Program 002 is cleanup of the brackish groundwater plume created inland of the West Coast Basin Barrier after the barrier was put into operation. This is supported by the unit goal of operating the Desalter, which also provides a local, sustainable source water for the City of Torrance, thus reducing the reliance on imported water.

The project's cost for this budget year centers primarily on operations and maintenance of the treatment facility. Typical expenses include fixed labor cost for operations and variable costs such as power, water treatment chemicals and analytical costs to ensure water quality meets all regulatory requirements. Since the expansion project was completed, the treatment facility has faced operational challenges due to elevated fouling of the RO system, as well as utilization of only two source water wells. With assistance from a WRD engineering and hydrogeology staff, efforts continue to focus on increasing Desalter production through minimizing the impact of RO fouling and optimization of well operations. In the coming fiscal year, a series of capital improvement projects are planned, and will consist of expanding the Desalter, while concurrently addressing the fouling issues through the addition of an autostrainer system and nanofiltration. Efforts will also include a new source of groundwater supply from the Brewer Well. Since the overall purpose of the project is to remediate degraded groundwater quality, costs are attributed to the Clean Water Fund.

FY 2023 Accomplishments

- Achieved an annual production total of 2,900AF of treated groundwater that met all regulatory requirements for distribution to the City of Torrance water system.
- Continued to optimize Desalter performance to achieve steady operations through working closely with WRD staff and the City of Torrance Operations team to review performance data, identify and implement corrective actions.
- Completed the redevelopment of the City Yard Well through the District's on-call well redevelopment program. This work also included an overhaul of the City Yard Well pump motor.

- A pilot project was completed to evaluate three pretreatment technologies, including nanofiltration, granular activated carbon, and ion exchange for removal of organic material(s) which have continued to challenge performance of the Desalter RO system. Nanofiltration was selected as the optimal technology.
- Solicitation was completed and multi-year contracts executed to supply bulk generic water treatment chemicals to the treatment facility.

FY 2024 Objectives

- Achieve the targeted production of 3,000AF of advanced treated recycled water that meets all regulatory and permit requirements.
- Redevelopment of the Delthorne Park Well utilizing the WRD on-call well redevelopment program.
- Initiation of construction activities associated with expansion of the Desalter, which also includes installation of the autostrainers and tie-in of the Brewer Well.
- Coordination with contractor(s) to minimize or otherwise limit interruptions in routine operations to the greatest extent possible.

Basis for Changes from FY 2023 Projection to FY 2024 Budget

Operational costs for FY 2024 are consistent with expected expenditures including labor, power and water treatment chemicals – all major costing centers associated with treatment facility operations. A modest increase in the FY 2024 budget is associated with general inflationary pressures and a continued need to support efforts to minimize RO fouling and optimize production.

Table 32

Program 002 – Robert W. Goldsworthy Desalter

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Professional Services	$743,656	$774,500	$30,844
R&M/Materials/Equipment	661,393	750,000	88,607
Other Expenses	1,307,637	1,244,300	(63,337)
Other General & Administration	143,993	204,288	60,295
TOTAL	**$2,856,679**	**$2,973,088**	**$116,409**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

Program 002 – Robert W. Goldsworthy Desalter		FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goals
1	**GOAL:** Maximize the production of treated groundwater for delivery to the City of Torrance distribution system. For FY 2024, reduced production anticipated due to capital improvement projects.				Expand Extraction Capacity
	MEASURE: Production of Potable Water (AF).	3,400 AF	2,900 AF	2,800 AF	
2	**GOAL:** Rehabilitation of source water well(s) to maintain sustainable Desalter operations.				Expand Extraction Capacity
	MEASURE: Completion of redevelopment utilizing on-call well program.	N/A	100%	100%	
3	**GOAL:** Enhancement of Desalter systems and equipment, including RO flowmeters, chemical safety shields, etc.				Expand Extraction Capacity
	MEASURE: Completion of identified system modifications and enhancements.	0	25%	50%	
4	**GOAL:** Completion of Brewer Groundwater Well connection and pretreatment project.				Expand Extraction Capacity
	MEASURE: Commissioning and operations of the Brewer Groundwater Well and pretreatment system.	N/A	15%	50%	
5	**GOAL:** Completion of a comprehensive asset management program that addresses asset operations, maintenance and repairs; development of a condition assessment program.				Expand Replenishment Opportunities
	MEASURE: Utilization of the developed asset management tools to support the assembly of O&M budgets, capital R&R budgets and long-term facility planning.	N/A	50%	100%	


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Program 006

Water Quality Improvement Program

Background

This comprehensive program represents the District's ongoing efforts to address water quality issues that affect its projects and the pumpers' facilities. The District monitors and evaluates potential impacts of pending water quality regulations and proposed legislations. WRD reviews the justifications and the rationale accompanying the proposed requirements and, if warranted, joins in coordinated efforts with other interested agencies to resolve significant issues of concerns during the early phases of the regulatory and/or legislative processes.

The District continues to evaluate and project water quality compliance in production wells, monitoring wells, and recharge/injection waters of the basins. And where potential issues are identified, appropriate remedial actions are developed along with the associated cost estimates to achieve compliance.

The WRD service area includes a large and diverse industrial base. Consequently, many potential groundwater contamination sources exist within the District boundaries, including but not limited to leaking underground storage tanks, refineries and petrochemical plants, dry cleaning facilities, auto repair shops, metal works facilities, and others. Such potential contamination sources may pose a threat to the drinking water aquifers. WRD, therefore, established the Groundwater Contamination Prevention Program as a key component of the Groundwater Quality Program, in an effort to minimize or eliminate existing and potential threats to groundwater supplies.

WRD is also participating in the *Water Augmentation Study,* a multi-year investigation by the Council for Watershed Health for the purpose of evaluating the feasibility and impact of using low impact development strategy to capture storm runoff that would have otherwise been discharged to the surface water.

Much of the work for the coming year will involve additional investigations at well sites known to have contaminated water, continued tracking of water quality regulations and proposed legislation affecting production and replenishment operations, further characterization of contaminant migration into the deeper aquifers, and evaluating the need to initiate cleanup activities at contaminated sites. All work under this program is related to water quality and cleanup efforts and therefore, is funded entirely by the Clean Water Fund.

The District continues to administer the Title 22 Groundwater Monitoring Program in the Central Basin and one system in the West Basin, which provides source water monitoring of 84 active wells owned and operated by 22 pumpers. In addition to performing the required compliance monitoring, the District prepares the annual Consumer Confidence Reports for these pumpers.

FY 2023 Accomplishments

- Coordinated and administered meetings of the Groundwater Contamination Forum as a means for key stakeholders to share data and provide updates on major groundwater contaminated sites in the Central Basin and West Coast Basin.
- Continued to work in close consultation with project managers of the United States Environmental Protection Agency (USEPA), California Department of Toxic Substances Control (DTSC), and Los Angeles Regional Water Quality Control Board (LARWQCB) to provide data and technical support to expedite the investigation and cleanup of high-priority groundwater contaminated sites in the Central Basin and West Coast Basin.
- Continued to administer meetings of the Los Angeles Forebay Groundwater Task Force and work with regulatory agencies and water purveyors to implement a groundwater cleanup project using grant funds received from the State Water Resources Control Board (SWRCB). The grant funds will be used to investigate and remediate a perchlorate "hot spot" and other comingled contaminant including 1,4-Dioxane and volatile organic compounds (VOCs) in the Los Angeles Forebay. The State is covering a majority of the costs with Proposition 1 grant funding in the amount of $12,423,085 (or ~80%). WRD will be providing matching funds in the amount of $3,190,339 (or ~20%).
- Participated in the multi-agency Los Angeles Basin Groundwater Restoration Convening meetings to expedite the investigation, identification, and eventual remediation of potential sources associated with contaminated drinking water wells in the Central Basin and West Coast Basin.
- Attended public meetings for various groundwater cleanup projects in the basin including those associated with the Del Amo / Montrose Superfund Sites.
- Coordinated the sampling of three deep nested groundwater monitoring wells installed by WRD. The wells were installed to characterize the vertical extent of groundwater contamination associated with the Omega Chemical Superfund Site. The data resulted in the regulatory agency requiring additional groundwater delineation in 2018. WRD continues to work closely with the responsible parties and EPA.
- WRD staff continue to provide technical support to multiple pumpers in the basin regarding the installation of water supply wells in proximity of existing groundwater plumes and concerns raised by the Division of Drinking Water (DDW).
- Monitored potential impacts of pending legislation and regulations on drinking water quality by participating in the California WateReuse Legislative / Regulatory Committee, Association of California Water Agencies' Clean Water and Safe Drinking Water Committees, and subscribing to listserv of various regulatory agencies.

- WRD staff have been participating in various activities related to the Sustainable Groundwater Management Act (SGMA):
  - Continue to participate in a group discussion for two fringe areas in the unadjudicated northern portion of the Central Basin. The main stakeholders include the City of Beverly Hills, City of Culver City, Golden State Water Company, and Los Angeles Department of Water and Power (LADWP).
  - Central basin was reclassified as a "very low" priority basin by the Department of Water Resources (DWR). This action allowed the stakeholder group to withdraw an "alternative analysis" previously submitted to the DWR. Thus, no action is currently required to comply with SGMA.
  - Annual Watermaster reports will continue to be submitted as required by SGMA.
- Conduct status update meetings with our on-call water quality laboratory. The meetings provide an opportunity for staff to communicate directly with our vendor partners ensuring the highest quality work for the District.
- Provided groundwater contamination and current drought conditions update at the board of director meeting of the Southeast Water Coalition (SEWC).
- Continue to participate in various environmental justice events including the 2023 Los Angeles Environmental Justice Network Workshops.
- WRD staff continue to track the progress of and provide periodic updates regarding various perfluorinated compounds (an emerging chemical of concern) including perfluorooctanesulfonic acid (PFOS) and perfluorooctanoic acid (PFOA), collectively per-and polyfluoroalkyl substances (PFAS).
- WRD and the LARWQCB signed an MOU to work collaboratively on mutually selected sites and/or areas to evaluate groundwater contamination or threat of contamination to the Basin. The MOU may help to identify other "high priority" sites and possible identification of groundwater remediation projects that could be partially funded by a grant program such as Proposition 1 or Site Cleanup Subaccount Program (SCAP). Quarterly meetings are held between the WRD and LARWQCB.

FY 2024 Objectives

- Maintain a high level understanding of the highest priority contamination sites within the basin and work collaboratively with project managers at the USEPA, DTSC, and LARWQCB. Coordinate regular status update meetings for key sites via the Groundwater Contamination Forum.
- Work collaboratively with various regulatory agencies to identify responsible parties and address groundwater contamination in the Los Angeles Forebay. WRD will continue to build upon the work initiated under the Groundwater Task Force.
- Participate in the multi-agency Los Angeles Basin Groundwater Restoration Convening.

- Monitor potential impacts of pending legislation and regulations on drinking water quality by subscribing to the listserv of various regulatory agencies and participating in the California WateReuse Legislative/ Regulatory Committee, Association of California Water Agencies' Clean Water, and Safe Drinking Water Committees.
- Provide technical support to our pumping community and continued communication via the Annual Groundwater Quality Workshop.
- Partner with and evaluate additional stormwater recharge opportunities through the Council for Watershed Health on the Water Augmentation Study and the Southern California Water Committee.
- Participate in the technical advisory committee of the Los Angeles Basin Stormwater Conservation Study undertaken by the Los Angeles County Public Works and United States Bureau of Reclamation.
- Administer the Title 22 Groundwater Monitoring Program.
- Continue groundwater remediation efforts with grant funds being administered by Prop 1. Pursue additional groundwater cleanup projects with available grant funds related to Prop 1.
- Continue working group to provide timely information to the pumpers and provide updates on a pilot testing program developed to evaluate treatment technologies and well profiling being conducted in the Montebello Forebay.

Basis for Changes from FY 2023 Projection to FY 2024 Budget

Budget adjustments were made to complete previously budgeted investigation work (temporarily on hold due to access delays) and accommodate laboratory testing associated with the Title 22 Monitoring Program.

Table 33

Program 006 – Water Quality Improvement Program

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Professional Services	$288,821	$529,000	$240,179
R&M/Materials/Equipment	31,500	31,500	-
Other Expenses	15,300	15,300	-
Other General & Administration	224,042	256,033	31,991
TOTAL	**$559,663**	**$831,833**	**$272,170**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

Program 006 – Water Quality Improvement Program				
	FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goals
1 GOAL: Coordinate and administer meetings of the Groundwater Contamination Forum as a means for key stakeholders to share data and provide updates on major groundwater contaminated sites in the Central Basin and West Coast Basin.				Maximize Innovation and Environmental Resiliency Promote Organizational Excellence
MEASURE: Successful coordination and hosting of two meetings each Fiscal Year.	2	2	2	
2 GOAL: Conduct groundwater quality workshop for local water purveyors to promote professional learning and networking.				Maximize Innovation and Environmental Resiliency Promote Organizational Excellence
MEASURE: Hold one workshop each Fiscal Year.	0 (COVID-19)	1	1	

Program 006 – Water Quality Improvement Program (cont.)

		FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goals
3	**GOAL:**				
	Title 22 Monitoring Program.				Maximize Innovation and Environmental Resiliency Promote Organizational Excellence
	MEASURE:				
	Administer program for various pumpers within the District.	22	22	22	
4	**GOAL:**				
	Prop 1 grant funding to remediate "hot spot" in the Los Angeles Forebay and identify responsible party in coordination with DTSC and LARWQCB.				Maximize Innovation and Environmental Resiliency Expand Extraction Capacity
	MEASURE:				
	Provide public updates at Committee Meetings.	4	4	2	
5	**GOAL:**				
	Continue gathering additional data and sharing information related to PFAS.				Maximize Innovation and Environmental Resiliency
	MEASURE:				
	Provide updates to pumpers via Committee Meetings, Board Meetings, Water Rights Association, and BAC/TAC.	12	12	4	

Program 012
Safe Drinking Water

Background

WRD's Safe Drinking Water Program ("SDWP") has operated since 1991 and is intended to promote the cleanup of groundwater resources at specific well locations. Through the installation of wellhead treatment facilities at existing production wells, the District expects to remove contaminants from the underground supply and deliver the extracted water for potable purposes. Projects implemented through this program are accomplished through direct input and coordination with well owners.

The grant program focuses on the removal of Volatile Organic Compounds (VOCs) and offers financial assistance for the design and equipment of the selected treatment facility. The program is designed to help groundwater pumpers remove VOCs from affected wells to enable the well to meet public drinking water standards. This increases groundwater pumping capacity and reduces dependence on limited and expensive imported water supplies. In addition, removal of VOCs from the groundwater supply helps prevent the contaminants from spreading to other areas.

Another component of the program offers no-interest loans for secondary constituents of concern that affect a specific production well. The capital costs of wellhead treatment facilities range from $1,500,000 to over $3,000,000. Due to financial constraints, this initial cost is generally prohibitive to most pumpers. Financial assistance through the District's SDWP makes project implementation much more feasible. The program places a greater priority on projects involving VOC contamination or other anthropogenic (man-made) constituents, classified as Priority A Projects. Any treatment projects for naturally-occurring constituents would be classified as Priority B Projects and funded on a secondary priority, on a case-by-case basis, and only if program monies are still available during the fiscal year.

As an extension of the District's Safe Drinking Water Program, the District also offers the Safe Drinking Water Disadvantage Communities (DAC) Program. The goal of this program is to assist water systems located in disadvantaged communities within the District's service area with state and federal funding application efforts to address the issues related to their drinking water wells. The focus of the program is to provide technical assistance and extensive outreach to help the systems secure funding that is set aside specifically for disadvantaged communities. Currently there are eleven (11) water systems participating in the program and receiving assistance with funding applications. Five of these systems have already received state funding, one project is under construction and one project is currently completed and in operation.

Projects under the SDWP involve the treatment of contaminated groundwater for subsequent beneficial use. This water quality improvement assists in meeting the

District's groundwater cleanup objectives. Thus, funding for the costs of the program is drawn entirely from the Clean Water Fund.

FY 2023 Accomplishments

- Completed construction on GAC treatment system for City of Lynwood Well 11 to treat VOCs.
- Began construction on Iron & Manganese treatment system for Sativa Well 5.

FY 2024 Objectives

- Complete construction on Granular Activated Carbon (GAC) treatment system for Huntington Park Well 15 to treat VOCs.
- Complete construction for Walnut Park Water Meter Replacement Project.
- Execute SDWP Grant agreement with City of Norwalk.
- Pursue DAC grant funding for the current water system DAC participants.
- Begin design phase for at least one DAC project.

Basis for Changes from FY 2023 Projection to FY 2024 Budget

Increase to this program is based on increased interest in the Disadvantage Community (DAC) projects. Design and construction expenses are reimbursed through grant funding at the completion of the phase. Any expenses for the traditional SDWP requiring a loan or grant will be considered from WRD's reserve funds.

Table 34

Program 012 – Safe Drinking Water

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Professional Services	$551,979	$880,000	$328,021
R&M/Materials/Equipment	-	-	-
Other Expenses	9,498	14,905	5,407
Other General & Administration	33,325	67,179	33,854
TOTAL	**$594,802**	**$962,084**	**$367,282**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

Program 012 – Safe Drinking Water Program				
	FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goal
1 GOAL: Identify projects and fund up to $2M from a WRD Grant to assist candidates with primary priority contamination removal through the Safe Drinking Water Program.				Expand Extraction Capacity
MEASURE: # of projects funded to provide assistance to candidates with primary priority contamination removal.	0 (Grant)	0 (Grant)	1 (Grant)	
2 GOAL: Identify projects and fund up to $2M from a WRD loan to assist candidates with secondary priority contamination removal through the Safe Drinking Water Program.				Expand Extraction Capacity
MEASURE: # of projects funded to provide assistance to candidates with secondary priority contamination removal.	0 (Loan)	0 (Loan)	1 (Loan)	
3 GOAL: Execute projects and funding from local, state, and federal grant programs to assist candidates with primary or secondary priority contamination removal through the Safe Drinking Water Disadvantaged Community (DAC) Program.				Expand Extraction Capacity
MEASURE: # of DAC projects funded to provide assistance to candidates with primary or secondary priority contamination removal.	1 (DAC)	2 (DAC)	2 (DAC)	


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Dual Purpose Projects and Programs

Program 010 Geographic Information System (GIS) Background

The District maintains an extensive database and Geographic Information System (GIS) in-house. The database includes water level, water quality, and groundwater production data throughout the entire WRD service area with information drawn not only from the District's Regional Groundwater Monitoring Program, but also from water quality data received from various state and partner agencies and the District's administration of the Title 22 Monitoring Program in the Central Basin. The system requires continuous update and maintenance but serves as a powerful tool for understanding basin characteristics and overall basin health.

GIS, in conjunction with the regional groundwater model, is used to provide better planning and basin management. The system is used to organize, store, and access spatial information and accompanying datasets, including well locations, water level data, water quality information, well construction data, production data, aquifer locations, and computer model files. Staff use the system daily for project support and database management. Specific information is available to any District pumper or stakeholder upon request and can be delivered through the preparation of maps, tables, reports, or other compatible format. Additionally, the District's web-based Interactive Well Search tool is available to the public; this website provides users with access to WRD's data on wells in its service area, including water levels, water quality, and groundwater production. The web-based application is continually updated to expand functionality for WRD staff and outside users.

District staff will continue to streamline and refine the existing data management system and website as well as satisfy both internal and external data requests. Continued use, upkeep, and maintenance of the GIS are planned for the coming year. In addition, District staff work closely with our consultants to develop new geospatial applications and add features to existing ones. The use of the system supports District functions such as replenishment activities, groundwater quality efforts, and the Computerized Maintenance Management System (CMMS) used at operations facilities. Accordingly, the cost for this program is equally split between the Replenishment and Clean Water Funds.

FY 2023 Accomplishments

- Launched updated version of the District's publicly accessible Interactive Well Search Tool with new features to improve functionality of the application.
- Updated the publicly accessible WRD GIS Hub, including links to WRD-developed Story Maps, static stock maps, and authoritative WRD spatial data.

- Worked with WRD staff to design and develop new Esri Story Maps for use in educational, promotional, and presentation materials.
- Continued comprehensive review of existing datasets and quality assurance measures to ensure continued data integrity.
- Released the completed GIS Roadmap that helps set the direction of GIS services in coming years.

FY 2024 Objectives

- Launch an internal Enterprise GIS Portal, which will act as an online resource for staff to access WRD's entire spatial library of data and the ability to perform spatial analysis.
- Create a new internal web application for staff to use for planning projects and fieldwork and providing situational awareness.
- Continue developing new GIS applications and adding new features to improve existing applications.
- Continue working with Operations staff on CMMS usage for operating facilities.
- Continue developing maps and layers for Esri Story Maps development for use in educational, promotional, and presentation materials.
- Continue comprehensive review of existing datasets and quality assurance measures to ensure continued data integrity, including documentation and data dictionaries.
- Implement the next phase of the GIS Roadmap, including establishments of internal GIS Steering and Technical Committees.

Basis for Changes from FY 2023 Projection to FY 2024 Budget

Minor increases in generic expenses reflect increases for software, conference fees, and travel, including the support of more staff involvement in GIS activities to build out internal capacity.

Table 35

Program 010 – Geographic Information System (GIS)

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Professional Services	$200,000	$200,000	$-
R&M/Materials/Equipment	-	-	-
Other Expenses	27,074	61,700	34,626
Other General & Administration	226,523	238,939	12,416
TOTAL	**$453,597**	**$500,639**	**$47,042**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

Program 010 – Geographic Information System (GIS)					
		FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District Goals
1	**GOAL:** Develop applications to access GIS layers (e.g., well/ water data).				Promote Organizational Excellence
	MEASURE: Applications produced or updated	2	2	2	
2	**GOAL:** Develop map presentations (e.g., Story Maps) for use in educational, promotional, and informational materials.				Promote Organizational Excellence
	MEASURE: New map presentations produced.	3	2	3	
3	**GOAL:** Maintain comprehensive GIS data catalog for the District.				Promote Organizational Excellence
	MEASURE: Review catalog with data team at least twice per year.	2	2	2	

Program 011
Regional Groundwater Monitoring

Background

The Regional Groundwater Monitoring Program continues to be very successful and currently consists of a network of 354 WRD and the United States Geological Survey (USGS)-installed monitoring wells at nearly 63 locations throughout the District. Monitoring well data is supplemented with information from production wells to capture the most accurate information available. WRD staff, comprised of hydrogeologists and engineers, provides the in-house capability to collect, analyze and report groundwater data. This information is stored in the District's Geographic Information System (GIS) and provides the basis to better understand the characteristics of the Central and West Coast Basins (CBWCB).

Water quality samples from the monitoring wells are collected periodically. Automatic dataloggers record water level daily in most monitoring wells. Dataloggers are downloaded and water levels measured by WRD field staff a minimum of four times per year. The water quality data is available online at https://gis.wrd.org/ and water level data are available online at https://hydrographs.wrd.org/. On an annual basis, staff prepares a report that documents groundwater production, groundwater level, and groundwater quality conditions throughout the District. The annual reports are available online at https://www.wrd.org/regional-groundwater-monitoring-report.

Most of the work during the coming year will involve continued bi-monthly, quarterly, and semiannual monitoring and reporting activities. The program will also work cooperatively with the USGS to address specific water quality issues and update the hydrogeologic conceptual model. Work associated with the Regional Groundwater Monitoring Program also supports activities relating to both replenishment and water quality projects. The program, therefore, is funded 50% each from the Replenishment and Clean Water Funds.

In November 2009, the State Legislature amended the Water Code mandating a statewide groundwater elevation monitoring program to track seasonal and long-term trends in California's groundwater basins. In October 2011, WRD was designated the agency responsible for collecting and reporting CBWCB groundwater level data to the California Statewide Groundwater Elevation Monitoring (CASGEM) program and continues in this role. WRD also provides water level data to a National Groundwater Monitoring Program as overseen by the USGS.

FY 2023 Accomplishments

- Completed spring and fall groundwater quality sampling at WRD monitoring wells including analysis of over 100 chemical constituents and contaminants. In March 2021, WRD also documented the results of a two year sampling effort to evaluate the presence of per- and polyfluoroalkyl substances (PFAS).
- Collected quarterly groundwater levels at WRD monitoring wells and compiled daily datalogger data to prepare historical water level hydrographs.
- Published the annual Regional Groundwater Monitoring Report summarizing groundwater data from monitoring wells and production wells in the CBWCB for Water Year 2021/22.
- Continued to collect and report CBWCB groundwater level data to the CASGEM program.
- Performed extensive data logger testing, maintenance and repairs.

FY 2024 Objectives

- Collect spring and fall groundwater quality samples at WRD monitoring wells. Analyze samples for over 100 chemical constituents and contaminants.
- Collect quarterly groundwater levels at WRD monitoring wells and compile daily data logger data and prepare historical water level hydrographs.
- Identify emerging contaminants of concern to the water supply community and groundwater basin managers to assess the need for a basin-wide screening to determine whether long-term monitoring is warranted in the CBWCB.
- Continue to report Regional Groundwater Monitoring Program data in accordance with the State-mandated Salt and Nutrient Management Plan.
- Continue to collect and report CBWCB groundwater level data to the CASGEM program.

Basis for Changes from FY 2023 Projection to FY 2024 Budget

The change is primarily associated with a labor allocation evaluation and subsequent adjustment for FY 2024.

Table 36

Program 011 – Regional Groundwater Monitoring

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Professional Services	$606,000	$606,000	$-
R&M/Materials/Equipment	127,271	108,000	(19,271)
Other Expenses	107,609	111,000	3,391
Other General & Administration	659,068	630,227	(28,841)
TOTAL	**$1,499,948**	**$1,455,227**	**$(44,721)**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

Program 011 – Regional Groundwater Monitoring				
	FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goal
1 GOAL: Collect semiannual groundwater quality samples and quarterly water levels at monitoring wells installed by WRD. Place results on Interactive Well Search Tool maintained by WRD. Report results to NGWMN and CASGEM.				Maximize Innovation and Environmental Resiliency
MEASURE: Compile results and release annual report by April.	1	1	1	
2 GOAL: Drill and install nested monitoring wells in data gap areas with USGS.				Maximize Innovation and Environmental Resiliency
MEASURE: Installation of wells with USGS.	1	0	0	
3 GOAL: Integrate Regional Groundwater Monitoring Program data into a salt and nutrient groundwater monitoring program.				Maximize Innovation and Environmental Resiliency
MEASURE: % of completion for the integration of Regional Groundwater Monitoring Program data into a salt and nutrient groundwater monitoring program.	100%	100%	100%	

Program 025
Hydrogeology Program

Background

This recurring program accounts for hydrogeologic analysis of the Central, West Coast, and surrounding groundwater basins. These scientific efforts are necessary for specific issues, projects, programs and basin management issues that face the District. The program includes evaluation of replenishment needs and forecasting at the spreading grounds and barrier wells, computer modeling, 3D aquifer imaging, and assessing the overall health of the basins by analyzing water levels and water quality data, including salt and nutrient loading.

Staff work performed under this program includes the preparation of the annual Engineering Survey and Report, including the calculation and determination of important hydrogeologic factors such as annual overdraft, accumulated overdraft, change in storage, and replenishment needs. Extensive amounts of data are compiled and analyzed by internal State-certified hydrogeologists and registered engineers to determine these values. Maps are created showing water levels in the basins and production patterns and amounts. The updates, maintenance, and use of the Regional Groundwater Flow Model developed by the USGS and WRD are part of this program. This model is a significant analytical tool utilized by WRD to determine basin benefits and impacts of changes proposed in the management of the Central and West Coast Basins.

A focused effort to better characterize the hydrogeologic conditions in the District is also underway and will continue into the ensuing year. This long-term project involves compiling and interpreting extensive data which were generated during the drilling and logging of the WRD/USGS monitoring wells and collected from historical information for production wells and oil wells within the District, and from seismic reflection data. The ultimate goal of this project is to incorporate these data in WRD's GIS and models, and use the system to generate aquifer depths, extents, and thicknesses throughout the District to assist staff, pumpers, and stakeholders better plan for groundwater resource projects such as new well drilling, storage opportunities, or modeling. The data will also be made available on WRD's website to be used as a reference source for hydrogeologic interpretations and fulfilling project- related data requests.

Hydrogeological analysis is also needed for projects associated with groundwater quality concerns and specific cleanup projects. Work by in-house staff may include investigative surveys, data research, oversight of specific project studies, etc. Such efforts are used to relate water quality concerns with potential impact to basin resources.

Special projects arise occasionally under this program such as well profiling of production wells to define areas of poor water quality entering the well with an emphasis on gather more data related per- and polyfluoroalkyl substances (PFAS). Other special projects include preparation of

the Cost of Service Report, saline plume evaluation and modeling, analysis of optimum and minimum groundwater quantities, groundwater tracer investigations, and updates to the Salt Nutrient Management Plan (Recycled Water Policy indicates an update is required by April 8, 2024). An evaluation will also be conducted to evaluate existing groundwater models used across the county line jointly funded by WRD and the Orange County Water District (OCWD).

The Hydrogeology Program addresses both groundwater replenishment objectives and groundwater quality matters. This dual service warrants that the cost of the program be split evenly between the Replenishment and Clean Water Funds.

FY 2023 Accomplishments

- Preparation of the 2023 Engineering Survey and Report leading to the adoption of the 2023/2024 Replenishment Assessment.
- Preparation of the 2023 Cost of Service Report, including an in-depth analysis of the geology of the WRD Service area. This report, along with the ESR, led to the adoption of the 2023/2024 Replenishment Assessment.
- Published the updated groundwater basin models (unstructured grid and conversion to MODFLOW 6) with USGS. The reports are publicly available at:
  - https://pubs.er.usgs.gov/publication/sir20215088
  - https://www.sciencebase.gov/catalog/item/630692fad34e3b967a8bd952
- Conducted annual adjudicated basin reporting as required under the Sustainable Groundwater Management Act (SGMA).
- Completed county line groundwater modeling evaluation with OCWD.
- Presented at conferences or professional organizations:
  - "Per- and Polyfluoroalkyl Substances" at Water Education Seminar for American Water Works Association (AWWA), August 2022.
  - "WRD Project Review and Current Groundwater Basin Conditions in Southern Los Angeles County", Groundwater Resource Association of California (GRAC), August 2022.
  - "Inland Injection Well Installation for Excess Recycled Water Produced at Leo J. Vander Lans AWTF", American Groundwater Trust, February 2023.
  - "Water Cycle and Beneficial Recharge in the Montebello Forebay", Los Angeles Environmental Justice Network, April 2023.
  - "Simulation-Optimization Approach for Siting Injection Wells in Urban Area with Complex Hydrogeology" article published in National Groundwater Association (NGWA), April 2023.
  - "Stormwater and Beneficial Recharge in the Montebello Forebay", Women in Water, Energy, & Environment, June 2023.

- "Water Monitoring in Southern Los Angeles County", Aquapod podcast interview hosted by In-Situ, June 2023.
  - https://in-situ.com/us/aquapod-podcast?wchannelid=jjjtn43ls8&wmediaid=z8i7h3kp4p
  - https://in-situ.com/us/aquapod-podcast?wchannelid=jjjtn43ls8&wmediaid=ttqozi3mwv
- "PFAS Working Group Update for the Central Basin and West Coast Basin", Update to Pumping Community, June 2023.

- Continue to provide modeling support to water resource department for the Master Plan and Regional Brackish Water.

FY 2024 Objectives

- Completion of 2024 Engineering Survey and Report.
- Completion of 2024 Cost of Service Report.
- Present technical materials and papers at groundwater conferences and various organizations related to the District.
- Complete annual adjudicated basin reporting as required under SGMA.
- Assist groundwater purveyors on data needs for new production wells.
- Continue to provide modeling support to water resource department for the Master Plan and Regional Brackish Water.

Basis for Changes from FY 2023 Projection to FY 2024 Budget

The change is primarily associated with augmentation modeling and other agency required compliance documents anticipated in FY 2024.

Table 37

Program 025 – Hydrogeology

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Professional Services	$151,000	$653,000	$502,000
R&M/Materials/Equipment	14,500	17,000	2,500
Other Expenses	35,000	61,500	26,500
Other General & Administration	398,095	370,611	(27,484)
TOTAL	**$598,595**	**$1,102,111**	**$503,516**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

Program 025 – Hydrogeology					
		FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goal
1	**GOAL:**				
	Prepare ESR leading to the adoption of the RA.				Maximize Innovation and Environmental Resiliency
	MEASURE:				
	Prepared ESR which led to the adoption of the RA.	1	1	1	
2	**GOAL:**				
	Prepare annual Cost of Service report including an in-depth analysis of the geology of the WRD service area.				Maximize Innovation and Environmental Resiliency
	MEASURE:				
	Prepared annual Cost of Service report which included an in-depth analysis of the WRD service area geology.	1	1	1	
3	**GOAL:**				
	Provide modeling support for Master Plan and Regional Brackish Water.				Expand Replenishment Opportunities Expand Extraction Capacity
	MEASURE:				
	Participate in at least six stakeholder meetings each Fiscal Year.	12	12	6	
4	**GOAL:**				
	Complete county line groundwater modeling evaluation with OCWD (funded jointly by WRD/OCWD).				Maximize Innovation and Environmental Resiliency
	MEASURE:				
	Provide feedback on groundwater modeling evaluation and once completed report results to Board.	1	1	1	

Program EAC
Water Conservation

Background

Water Conservation outreach activities provide tangible and proven strategies to successfully engage constituents, pumpers, and cities to continue to conserve water throughout the service area. Even with a record-breaking year for stormwater capture, the public is eager to keep up with conservation because they know the next drought is around the corner. The WRD conservation program has maintained its outreach to proactively educate the public about making conservation a way of life. Outreach is also geared towards educating the public about WRD's innovative planning to address this and future droughts.

In FY2023 the External Affairs Department attended dozens of in-person events, conferences and workshops to highlight WRD's projects and programs.

The External Affairs Department expanded the number of Eco Gardener classes for the public. WRD hosted over 30 Eco Gardener courses in both virtual and in-person settings. Outreach for these classes included social media posts, direct email contact, newspaper advertisements, and placement in the WRD Newsletter. Advertising serves two main purposes. In addition to advertising the Eco Gardener classes, they highlight WRD and our function in the service area.

The Water Awareness Calendar profiles 23 local student artists who use their artwork to encourage water literacy and conservation. The department was able to continue utilizing the digital submission process which helps increase participation. The outreach for the Student Art Contest was shared with hundreds of thousands of students from hundreds of schools and over two dozen school districts. This large effort resulted in 550 contest submissions from 12 school districts, 72 schools, and 129 teachers. WRD attended awards presentations at the schools to recognize 16 of the contest winners in-person and 4 winners attended the Groundwater Festival.

WRD also administered the Teacher Mini-Grant Program for the second year in a row, where the teachers with the most participation in the contest receive mini-grants to spend on water education materials. In FY23, twenty-one teachers were awarded mini grants.

The department also initiated a mass social media campaign to celebrate 60 years of using recycled water for groundwater replenishment. The campaign included newspaper ads, newsletter distribution, social media posts, an informative video production, and a culminating event at the WRD Albert Robles Center. The campaign is estimated to have reached 708,800 people.

External Affairs staff developed updated collateral for its projects and programs to share with stakeholders and the public.

FY 2023 Accomplishments

- Hosted over 30 Eco Gardener classes and re-established in-person classes
- Distributed 5,000 Water Awareness Calendars to stakeholders and constituents
- Reached over 700,000 people with the 60 Years of Recycled Water campaign
- Mailed 270,000 newsletters to service area residents
- Led 10 water stakeholder tours of the Albert Robles Center

FY 2024 Objectives

- Host targeted Eco Gardener classes that provide something unique for each class venue. Host Eco Gardener classes in all divisions of the District
- Expand targeted outreach to our stakeholders to increase participation in the Student Art Contest
- Increase the publication of water conservation social media posts to encourage behavior change at home and in the garden
- Develop a communication campaign celebrating the record-breaking stormwater capture of 2022-23
- Pursue a communications survey or study that informs WRD on the best language and messaging for groundwater replenishment, brackish water desalination, and recycled water

Basis for Changes from FY 2023 Projection to FY 2024 Budget

Changes reflect the return to pre-pandemic outreach activities.

Table 38

Program EAC – Water Conservation

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Professional Services	$65,310	$70,000	$4,690
R&M/Materials/Equipment	-	-	-
Other Expenses	299,958	323,000	23,042
Other General & Administration	275,903	311,577	35,674
TOTAL	**$641,171**	**$704,577**	**$63,406**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

Program EAC – Water Conservation					
		FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goal
1	**GOAL:**				
	Conservation Partnerships with stakeholders including groundwater pumpers.				Promote Organization Excellence
	MEASURE:				
	Participation in commercial, institutional, residential and educational partnerships with stakeholders through the service area.	20	30	40	
2	**GOAL:**				
	Broaden Eco Gardener education opportunities for the public.				Maximize Innovation and Environmental Resiliency
	MEASURE:				
	Number of Eco Gardening classes hosted	25	37	40	
	Identify and coordinate with new host venues	N/A (Covid)	8	5	
	Develop new classes for participants to attend	3	4	3	
	Use of social media for Eco-Gardening Education	40	40	50	
3	**GOAL:**				
	Increase participation at community events promoting WRD projects and programs				Maximize Innovation and Environmental Resiliency
	MEASURE:				
	Number of Schools Participating in Student Art Calendar Contest	63	72	80	
	Number of industry conferences the district participates in (budgeted in EAC)	3	3	3	

Program EAE
Water Education & Outreach

Background

Water Education and Outreach activities aim to provide direct informative communication between WRD and a broad range of constituents including:

- Groundwater purveyors (pumpers)
- Elected officials and policymakers
- Federal and state regulators
- Members of the public
- Children and Youth (schools)
- Members of the water industry
- News reporters, bloggers, other media.

Water Education and Outreach activities engage constituents on a variety of important policy and project development areas pertaining to groundwater management and practices, as well as recycled water production and use. These activities include tours; participation in community events and forums; development of printed and digital educational materials; involvement in industry and organizational conferences; and promotion of education through annual public events, such as the WRD Groundwater Festival. These avenues of communication enable WRD to successfully advance discussions around critical policies and programs that promote public interest in, and awareness of, water.

The External Affairs department is tasked with the mission of leading the education and outreach programs for the District - with attention to the Water Independence Now (WIN) Program and the WIN4ALL Program through presentations at conferences, conventions, and regional community events. These programs encapsulate WRD's core projects that are helping the region by creating a completely locally sustainable source of water for groundwater replenishment.

Conference and convention outreach participation includes participation at conferences and workshops that average approximately 1,500 attendees. Water and education outreach at conferences and conventions alone have reached over 25,000 industry leaders and elected officials and policymakers. This year, these conferences were held in both virtual and in-person settings which allowed the district to engage the audience using multimedia presentations including virtual tours and videos.

The department is also tasked with supporting the agency's legislative affairs strategies. This year the agency held meetings with our entire Congressional and State Legislative delegation.

FY 2023 Accomplishments

- Increased number of social media followers, engagements, and posts.
- Broadened the public tour program for WRD's Albert Robles Center
- Partnered with GRA to host a Careers in the Water Industry Skills Workshop
- Increased number of education presentations
- Created collateral for new projects.
- Distributed over 400 Drought Tool Kits
- Conducted 40 presentations at conferences and workshops
- Broadened outreach to schools for virtual field trips and activities
- Completed the ARC 360 Virtual Tour Project
- Presented on WRD's Education Programming at the National Science Teaching Association Conference
- Presented on WRD's Education Programming at the National Marine Educator's Association
- Presented on WRD's Education Outreach Program to California Water Education Association (CWEA) members
- Conducted several WRD and ARC presentations for local education, industry, and government groups
- Careers in the Water Industry program featured twice in the CWEA online and printed version of the magazine
- Created ARC Field trip worksheets for all grade levels
- Hosted a successful Groundwater Festival with over 3,000 attendees

FY 2024 Objectives

- Continue and expand ARC Field Trip Program
  - Virtual and In-person
- Host three Educator's Open House events to promote WRD's Education Program
- Engage more schools in the ARC field trips. on STEM/STEAM schools for partnerships
- Host Groundwater Festival
- Partner with other water agencies to develop regional water education programs
- Host English and/or Spanish Public Tours
- Finalize ARC Exhibits Maintenance Instruction Sheet
- Continue updates through Education Update Newsletters
- Continue to create more Careers in Water Industry videos.
- Broaden outreach to key groups
- Continue to host a Careers in the Water Industry Skills Workshop in partnership with another water agency
- Present at 2 Education Conferences

Basis for Changes from FY 2023 Projection to FY 2024 Budget

Changes in the budget are adjusted to reflect the return to pre-pandemic outreach activities.

Table 39

Program EAE – Water Education & Outreach

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Professional Services	$75,000	$95,000	$20,000
R&M/Materials/Equipment	50,000	-	(50,000)
Other Expenses	631,540	686,600	55,060
Other General & Administration	334,334	354,841	20,507
TOTAL	**$1,090,874**	**$1,136,441**	**$45,567**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

Program EAE – Water Education & Outreach

		FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goal
1	**GOAL:** Host annual groundwater festival as an on-going groundwater awareness effort				Maximize Innovation and Environmental Resiliency
	MEASURE: Number of Groundwater Festivals hosted	Postponed due to COVID-19	Completed	14th	

Program EAE – Water Education & Outreach (cont.)				
	FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goal
2 GOAL:				
Social Media Outreach Efforts				Maximize Innovation and Environmental Resiliency.
MEASURE:				
Number of social media platforms	6	6	7	
Number of followers	10,100	11,000	12,000	
Number of social media posts	650	800	900	
3 GOAL:				
Lead outreach on upcoming WRD projects and programs				Expand Replenishment Opportunities
MEASURE:				
Release WRD E-Newsletter	4	7	12	
Release WRD Printed Newsletter	3	2	2	
4 GOAL:				
Assist with ARC-related outreach				Expand Replenishment Opportunities
MEASURE:				
Number of times ARC was marketed at public events	150	50	200	

Program EAE – Water Education & Outreach (cont.)				
	FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goal
5 GOAL:				
Expand WRD Groundwater Education programs highlighting WIN and WIN4ALL				Expand Replenishment Opportunities
MEASURE:				
Number of presentations at conferences	40	50	50	
Multimedia presentations created	20	30	30	
Participate in industry conferences (budgeted in EAE)	6	6	7	
6 GOAL:				
Increase participation at community events promoting WRD projects and programs				Maximize Innovation and Environmental Resiliency
MEASURE:				
Number of School events	70	100	100	
Number of field trips of WRD facilities	50	100	150	
Number of tours led at WRD facilities	40	50	70	
Number of Earth Day events	15	20	23	
7 GOAL:				
Advocate for effective groundwater policy.				Expand Replenishment Opportunities
MEASURE:				
Number of State Government Advocacy Meetings	20	25	25	
Number of Federal Government Advocacy Meetings	25	30	30	

Data & Technology Services (DTS)

Background

Prior to this fiscal year (FY 2023-24), the Data and Technology Services (DTS) Department was described in the Administration section of this document. As the technological backbone of the Water Replenishment District, DTS oversees a broad array of responsibilities and is tasked with implementing and managing systems to optimize the District's operational efficiency, data integrity, and cybersecurity. DTS is dedicated to advancing technological innovation and empowering the District to meet its mission and achieve excellence, paving the way for a future marked by efficiency, transparency, and progress. By taking a multi-faceted approach to technology management, DTS is positioned to meet the current and future needs of the District in a rapidly evolving digital environment.

DTS is home to a diverse set of responsibilities and products that include traditional information technology (IT) infrastructure and extend into operational technology (OT), data management, and web application development, making it central to both day-to-day functions and long-term strategy. Through the incorporation of specialized functions like geographic information systems (GIS) and asset management, DTS ensures comprehensive seamless operation and future-proofing, harnessing the power of the District's data to drive innovation and strategic decision-making. The department plays a critical role in the District's mission, aligning its core functions with a commitment to modernizing administrative processes and enhancing service delivery through technological solutions.

Core Functions:

1. Service Infrastructure Planning, Architecture, and Operations
2. Cybersecurity and Information Security (InfoSec)
3. IT Compliance
4. Operational Technology (OT)
5. Enterprise Systems, Applications, and Software Integrations
6. Data Management, Analytics, and Business Intelligence
7. Database, Data Service, and Web Application Development
8. Office Systems and Building Technology

9. Business Process Management, Project Management, and Training
10. Strategy and Governance (Policies, Planning, and Business Continuity)

FY 2023 Accomplishments

- Ensured appropriate information technology and architecture support to all WRD administrative office and off-site facilities.
- Engaged a third party to complete a substantive Cybersecurity Assessment to identify actionable recommendations to bolster the District's security posture.
- Ensured secure access to data systems for staff and facility operators.
- Enabled the District to provide transparent data to the public and the District's pumpers and partners.

FY 2024 Objectives

- Review and assess the technological needs of the District to effectively meet its mission.
- Continue building capacity for our cybersecurity and disaster recovery needs related to our information systems.
- Assist in the development of data services and business intelligence tools for data-driven decision-making.
- Continue building data services to increase data availability to our partners and the public.

Basis for Changes from FY 2023 Projection to FY 2024 Budget

The budgeting of an additional $20,000 for professional services is in support of increased third-party support for Cybersecurity needs. A slight decrease in equipment expenses reflects our ability to use existing equipment throughout their expected lifespans. Increases in other expenses reflect evolving software and service needs to assist staff in keeping their digital assets secure and improving efficiency in accessing and processing information.

Table 40

Data Technology Services

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Professional Services	$100,000	$120,000	$20,000
R&M/Materials/Equipment	55,000	50,000	(5,000)
Other Expenses	389,210	434,000	44,790
Other General & Administration	601,799	675,608	73,809
TOTAL	**$1,146,009**	**$1,279,608**	**$133,599**

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

Data & Technology Services

	FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goal
GOAL:				
Ensure information technology services and support to all WRD facilities and the public.				Promote Organizational Excellence
MEASURE:				
a. Maintain publicly accessible websites and applications	5 public websites	5 public websites	8 public websites and portals	
b. Maintain the Computerized Maintenance Management System (CMMS) for operating facilities	3 facilities	3 facilities	3 facilities	
c. Collect and report groundwater data every month	12 months	12 months	12 months	
d. Maintain data services to increase data availability to our partners and the public.	100%	100%	100%	

General Administration

Board of Directors

Background

The Board of Directors is the policy-making and governing body of the District. It represents the highest authority within the management structure of the District. Certain portions of its authority are delegated to staff in the interest of efficiency, stability, and prudent management.

The Board of Directors develops the District's vision and strategic plan and sets policy to assist the General Manager and staff with implementing the vision and strategic plan. The various responsibilities of the board members include directing District activities, outreach, and cooperation with legislators, regulators, cities, pumpers, consultants, water agencies and other government agencies.

There are five members of the Board of Directors; each is elected from one of five divisions within the District service area, within which such Director resides.

The Board officers include the President, Vice President, Secretary, and Treasurer. Officers are elected by the Board at its first meeting in January of at least every odd-numbered year but may do so more frequently if desired.

The President of the Board presides over all meetings of the Board and has all authority afforded the presiding officer, including the power to constitute Standing and Ad Hoc Committees and to assign Board members to serve on such committees.

The Vice President of the Board presides over any meeting at which the President is not present and performs such other services as may be requested by the President.

The Secretary of the Board records and certifies the minutes of all Board meetings and is responsible for the maintenance of District records. In the absence of the Secretary, the Vice President may sign in his/her place when necessary.

The Treasurer of the Board is responsible for the financial affairs of the District, including financial reporting and investment activities. The Treasurer must also serve on the Finance / Audit Committee of the Board.

FY 2023 Accomplishments

See Board President's Report.

FY 2024 Objectives

See Board President's Report.

Basis for Changes from FY 2023 projection to FY 2024 budget

There are no significant changes to FY 2024 budget.

Table 41

Board of Directors

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Professional Services	$-	$-	$-
R&M/Materials/Equipment	-	-	-
Other Expenses	121,665	145,110	23,445
Other General & Administration	323,620	308,193	(15,427)
TOTAL	**$445,285**	**$453,303**	**$8,018**

Administration Background

The Administration of the District includes the Administration/ Human Resources Department and the Finance Department. These departments are responsible for ensuring the delivery of core District administrative functions through innovative technology-driven solutions.

Core functions of the Administration and Human Resources Department include general office administration, Board support for public meetings, human resources (HR), and risk management. The department is also responsible for talent management, entailing recruitment, onboarding, training, development and implementing the District's Diversity, Equity, and Inclusivity Initiative. Administrative and HR policies are maintained and updated within this department's functions.

Core functions of the Finance Department include facilitating the planning, organization and implementation of financial policies and programs of the District. The department provides financial planning, monitors financial activities of the District, manages the development of annual budget, and prepares the Comprehensive Annual Financial Report.

Basis for Changes from FY 2023 projection to FY 2024 budget

The changes are mainly due to completion of hiring process in FY 2023 and reallocation of staff time to various projects and programs in FY 2024. In addition, the cost of general liability insurance is projected to increase, and District's training programs are more active in FY 2024.

Table 42
Administration

Expense Category	FY 2023 Projection	FY 2024 Budget	FY 2024 Budget compared to FY 2023 Projection
Professional Services	$1,058,996	$1,237,000	$178,004
R&M/Materials/Equipment	19,430	28,000	8,570
Other Expenses	648,527	1,082,510	433,983
Other General & Administration	3,303,295	2,746,803	(556,492)
TOTAL	**$5,030,248**	**$5,094,313**	**$64,065**

Administration/Human Resources and Administration

FY 2023 Accomplishments

- Furthered the implementation of WRD's 2-year Strategic Plan.
- Established a Diversity, Equity and Inclusivity Initiative based on the recommendations presented by the Gender and Equity Assessment.
- Continued implementation of the employee training initiatives including Diversity, Equity and Inclusivity Training and Leadership Training for all employees.
- Ensured District coordination with the Los Angeles County Registrar-Recorder's office for three Board election seats in the November 2022 General Election.
- Provided outstanding customer service to District's Board of Directors, management, staff, and the public through increased communications and responsiveness.
- Established the District's COVID Prevention Plan.
- Negotiated a new MOU with AFSCME Local 1902.

FY 2024 Objectives

- Development and implementation of the District's 2024-2025 Two-Year Strategic Plan.
- Continue implementation of the District's Diversity, Equity, and Inclusion (DEI) Initiative.
- Ensure District coordination with the Los Angeles County Registrar-Recorder's office for three Board election seats in the November 2024 General Election.
- Implementation of NEOGOV Human Resources Information System for Performance Management, Applicant Tracking, and Onboarding.

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below.

Human Resources & Administration				
	FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goals
1 GOAL:				
Promote a safe, healthy and supportive work environment for all employees.				Promote Organizational Excellence
MEASURE:				
a. Development and ongoing implementation of procedures to ensure safety of staff in compliance with local and state public health officials and implementation of COVID-19 Workforce Transition Plan and the COVID Prevention Plan	100%	100%	100%	
b. Continue coordination of WRD safety program at all WRD worksites.	100%	100%	100%	
2 GOAL:				
Hire, retain and develop a highly qualified, professional, diverse and responsive workforce.				Promote Organizational Excellence
MEASURE:				
a. Development and implementation of the District's performance management system.	100%	100%	100%	
b. Ensure completion of training for Board and employee workforce.	100%	100%	100%	
c. Development and continuation of formal Employee Recognition Program.	100%	100%	100%	
d. Develop and implement 360 Degree Feedback Program for Management Team	N/A	100%	100%	
e. Implement a Human Resources Information System for applicant tracking, onboarding, and performance management.	N/A	100%	100%	

Human Resources & Administration (cont.)				
	FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goals
3 GOAL:				
Increased dissemination of information and communications with staff.				Promote Organizational Excellence
MEASURE:				
a. Hold regularly scheduled all-hands meetings.	N/A (not previously measured)	12 meetings	12 meetings	
b. Maximize utilization of WRD Portal and increase information access to all staff.	40%	60%	80%	
4 GOAL:				
Continued compliance with current local, state and federal laws governing the regulations of Water Districts.				Promote Organizational Excellence
MEASURE:				
a. Ensure Board actions, documents, resolutions and ordinances are appropriately recorded for future reference.	100%	100%	100%	
b. Develop and implement Diversity, Equity, and Inclusivity Program.	N/A	100%	100%	

Finance Department

FY 2023 Accomplishments

- Worked collaboratively with project managers to develop Fiscal Year 2024 budget and Replenishment Assessment and received Board adoption.
- Completed Fiscal Year 2022 financial audit and received unmodified or "clean" audit opinion.
- Prepared Fiscal Year 2022 Annual Comprehensive Financial Report.
- Received Distinguished Budget Presentation Award for FY 2023 and Certificate of Achievement for Excellence in Financial Reporting from the Government Finance Officers Association for FY 2022.
- Implemented new Budget module to interface with the MIP accounting system.

FY 2024 Objectives

- Work collaboratively with project managers to develop Fiscal Year 2025 budget and Replenishment Assessment and received Board adoption.
- Complete Fiscal Year 2023 financial audit and received unmodified or "clean" audit opinion.
- Prepare Fiscal Year 2023 Annual Comprehensive Financial Report.
- Receive Distinguished Budget Presentation Award for FY 2024 and Certificate of Achievement for Excellence in Financial Reporting from the Government Finance Officers Association for FY 2023.
- Streamline the new Budget module and provide full training to staff.

Performance Measures

Performance measures for the past two fiscal years in addition to goals for FY 2024 are presented below:

Finance Department				
	FY 2022 Actual	FY 2023 Actual	FY 2024 Budget	District's Strategic Goal
1 **GOAL:** Continued compliance with the California Water Code on financial reporting and budget adoption.				Promote Organizational Excellence
MEASURE:				
a. Complete audit financial statement no later than 180 days from the conclusion of the District's fiscal year on June 30th.	100%	100%	100%	
b. Adopt Replenishment Assessment and ensuing year budget no later than the second Tuesday in May.	100%	100%	100%	

Capital Improvement Program

Executive Summary

Background:

The Water Replenishment District (WRD) is dedicated to ensuring the sustainability and enhancement of the region's groundwater supply. Our Capital Improvement Program (CIP) for the fiscal year 2024 aims to detail the strategies, initiatives, and projects to achieve our mission, emphasizing infrastructure development, water quality protection, and public engagement.

Special Initiatives:

WRD is committed to safeguarding water resources, investing in future ready infrastructure, and ensuring the delivery of clean and safe water. As part of this commitment, all of WRD's CIP projects can be categorized under three main pillars that form the backbone of its strategic vision for the future. These are:

- **Infrastructure Improvements:** WRD places significant importance on upgrading its facilities to meet the growing demands for groundwater management. Key among these is the improvement of its two recycled water plants, which both play key roles in leveraging recycled water for protection and recharge of the groundwater basin. Additionally, the Goldsworthy Desalter continues to be instrumental in remediating the saline plume trapped in the West Coast Basin, while ensuring potable water supply to the City of Torrance. Through strategic infrastructure investments in these facilities, WRD underscores its unwavering commitment to safeguarding regional water resources. Projects at WRD's headquarters, such as the Solar Car Port and HVAC replacement, underline the importance of a sustainable and efficient operational environment.

- **Regional Water Independence Program (WIN4ALL):** Building on the foundational success of WRD's Water Independence Now (WIN) Program, the WIN 4 ALL initiative aims to optimize the use of groundwater aquifers, transforming them into reliable and locally sustainable water sources for the expansive Los Angeles Basin Region. The projects listed under WRD's CIP for WIN4ALL, such as the LVL Inland Injection and the Dominguez Gap Barrier 2nd Recycled Water Connection, serve as pivotal investments towards this cause. These strategic projects, aligned with the mission of WIN4ALL, underscore the District's commitment to harnessing local recycled water and captured stormwater, further solidifying WRD's dedication to sustainably managing the vital groundwater supplies of Southern Los Angeles County.

- **Groundwater Quality Protection and Remediation:** WRD has taken measures to safeguard and revitalize the groundwater basins of Southern Los Angeles County through its dedicated Groundwater Quality

Protection and Remediation initiative. The projects delineated in the CIP highlight WRD's holistic approach to groundwater management. From the Safe Drinking Water Program to the expansive BGPR - Torrance Desalter Expansion, these initiatives target specific contaminants threatening the groundwater's quality. WRD is not only ensuring the delivery of safe and clean water but is also fortifying the region's resilience against future water quality challenges.

Partnerships & Funding:

WRD has secured substantial funding through state and federal grants, coupled with strategic partnerships. Notably, the United States Bureau of Reclamation and the State Water Resources Control Board have been instrumental in this regard, providing funding for various key projects. WRD has a diversified financial framework to support its CIP. Significant funding is derived from bond proceeds, including anticipated bonding in 2026 for critical projects. The District maintains both restricted and unrestricted funds, ensuring a stable financial foundation for ongoing and future initiatives. Encumbered capital funds are earmarked for essential groundwater quality and infrastructure projects. The Replenishment Assessment serves as a reliable revenue stream. Together, these varied funding avenues underscore WRD's commitment to ensuring sustainable groundwater management in the Los Angeles Basin Region.

Budget Overview:

WRD's CIP showcases an extensive list of projects aimed at enhancing groundwater management and infrastructure. For FY2024, the forecasted expenditure stands at $49,703,065. When looking at a broader horizon spanning five years, the total projected expenditure approaches $209,060,769. These numbers reflect WRD's commitment to long-term planning and investment in safeguarding the region's water resources.

Risk Management:

We adopt a comprehensive approach, compliant with the California Environmental Quality Act (CEQA) and public works regulations. Our proactive strategy involves identifying potential risks early, categorizing, and mitigating them, emphasizing transparency and consistent stakeholder engagement.

Performance Metrics:

The Project Management Triangle forms the foundation of our project evaluation, emphasizing the balance between scope, cost, and time. Regular reviews are in place, focusing on both quantitative and qualitative metrics, ensuring continuous improvement and adherence to our commitment to excellence.

Conclusion:

The WRD's Capital Improvement Program for FY2024 showcases our unwavering dedication to sustainable groundwater management, infrastructure development, and community engagement. By leveraging strategic

partnerships, prioritizing projects that reflect WRD's mission, and securing diversified funding sources, WRD is poised to meet the challenges ahead and ensure a resilient water future for our region.

Introduction

WRD was formed by a vote of the people in 1959 for the purpose of protecting the groundwater resources of the Central and West Coast Groundwater Basins. Prior to the formation of the District in 1959, unregulated and unmanaged over-pumping caused severe overdraft and many water wells to go dry. Along the coastline, groundwater levels dropped below sea level, allowing the salty ocean water to seep into and contaminate the freshwater aquifers.

As a groundwater management agency, WRD provides supplemental replenishment water delivery to two Los Angeles County Public Works infrastructure systems: the Montebello Forebay spreading grounds located inland atop the Central Basin, and seawater barrier injection wells located along the coast. Traditionally, imported water was used to supplement these systems. Through technological and regulatory advancements, recycled water can now be used for 100% supplemental replenishment purposes.

Building on our commitment to sustainability and technological advancement, WRD's capital plan encompasses a holistic vision for all of its facilities and infrastructure. Central to this plan are our state-of-the-art recycled water plants: the LVL (Leo J. Vander Lans) and ARC (Albert Robles Center) facilities. These plants play a pivotal role in ensuring a consistent supply of high-quality recycled water for replenishment purposes, reducing our dependency on imported water sources.

Additionally, the Goldsworthy Groundwater Desalter stands as a testament to our dedication to tackling the challenges posed by seawater intrusion. By actively removing salt and contaminants, the desalter ensures that the groundwater remains a reliable and safe source for the communities we serve.

As we move forward, our capital plan is focused on continuously enhancing these facilities, embracing innovative technologies, and expanding our infrastructure to meet the ever-evolving needs of our district and the communities that rely on us.

Methodology

To achieve WRD's mission of providing, protecting, and preserving safe and sustainable high-quality groundwater, it's vital that we employ a strategic methodology to prioritize our projects. Our approach is rooted in the four strategic goals adopted by the WRD Board of Directors:

1. Expand Replenishment Opportunities

Projects are given priority if they align with identifying and securing new replenishment sources. The goal is to diversify our replenishment sources, ensuring a reliable recharge water supply and making the most of available storage space for increased local water supply.

2. Expand Extraction Capacity

We prioritize projects that look into expanding groundwater

extraction capacity. This involves a systematic evaluation of potential sites for groundwater extraction and remediation. Additionally, we work on designing incentive programs to encourage groundwater pumpers to increase their extraction capacities, ensuring optimal utilization of our groundwater resources.

3. Maximize Innovation and Environmental Resiliency

Innovations in technology and practices are at the forefront of our project assessment criteria. We prioritize projects that incorporate cutting-edge technologies, offering increased efficiency in treatment and recharge operations. Moreover, adaptability is a key metric; projects that can be easily adjusted to changing environmental or technological landscapes receive higher priority.

4. Promote Organizational Excellence

For a project to be greenlit, it must not only achieve technical and environmental objectives but also contribute to the organization's overall excellence. We evaluate projects based on their potential to enhance internal operations, foster public engagement, and ensure regulatory compliance. Financial feasibility is also a critical factor; projects are assessed for accurate budget projections and the potential to secure external funding sources.

In summary, our project prioritization methodology is a harmonized blend of technical, environmental, organizational, and financial considerations. Each project is assessed against our strategic goals, ensuring that every initiative we undertake is a step forward in fulfilling our mission for the community.

Current Fiscal Year Budget: FY2024

WRD's dedication to its mission of safeguarding the region's groundwater resources is evident in the FY2024 budget allocations. These funds have been strategically distributed among key projects, underscoring WRD's commitment to excellence and sustainability.

Table 43
CIP Forecast

Project Code	Project Title	2024	2025	2026	2027	2028	Total
Facility/Program	001 - Leo J. VanderLans Advanced Water Treatment Facility	$7,995,113	$5,485,745	$5,615,587	$280,428	$280,428	$19,657,301
Facility/Program	002 - Goldsworty Groundwater Desalter	2,297,062	2,716,562	536,947	558,258	580,540	6,689,369
Facility/Program	006 -Perchlorate Remediation in the Los Angeles Forebay	-	-	-	-	-	-
Facility/Program	012 - Safe Drinking Water Program	-	-	-	-	-	-
Facility/Program	018 - Dominguez Gap Infrastructure	-	-	-	-	-	-
Facility/Program	023 - Montebello Forebay Replenishment	-	450,000	-	-	-	450,000
Facility/Program	032 - Building Improvements	3,371,442	1,875,721	282,500	92,500	101,500	5,723,663
Facility/Program	033 - ARC (formerly GRIP) Advanced Water Treatment Facility	1,678,988	501,588	501,588	501,588	501,588	3,685,340
Facility/Program	041 - Annex Building	3,231,000	1,110,000	-	-	-	4,341,000
Facility/Program	043 - Brackish Groundwater Reclamation Program	20,500,000	30,500,000	50,000,000	10,000,000	9,514,096	120,514,096
	Total CIP 5-Year Forecast	**$39,073,605**	**$42,639,616**	**$56,936,621**	**$11,432,775**	**$10,978,153**	**$161,060,769**
Facility/Program	048 - PFAS Remediation Program	10,000,000	10,000,000	10,000,000	9,000,000	9,000,000	48,000,000
	Total PFAS 5-Year Forecast	**$10,000,000**	**$10,000,000**	**$10,000,000**	**$9,000,000**	**$9,000,000**	**$48,000,000**
	Total 5-Year Forecast	**$49,073,605**	**$52,639,616**	**$66,936,621**	**$20,432,775**	**$19,978,153**	**$209,060,769**

Leo J. Vander Lans Advanced Water Treatment Facility (001): The FY2024 budget allocation for LVL AWTF stands at approximately $8 million. The projects under this program, such as the LVL Scada Upgrade and LVL Source Water Supply, are aimed at expanding the plant's production, upgrading aging infrastructure, and ensuring operational efficiency.

Goldsworthy Groundwater Desalter (002): With a budget nearing $2.3 million, this program encompasses the purchase of the Brewer Well from West Basin Municipal Water District and its subsequent connection to the plant via a new pipeline. A considerable portion of the budget also underlines a rehabilitation program for the facility feed wells.

Perchlorate Remediation in the Los Angeles Forebay (006): Because this project is fully reimbursed by grant funding and there is no specific allocation for FY2024. For fiscal year 2024, Program 006 is dedicated to the maintenance and ongoing operations of the perchlorate remediation project in the Los Angeles Forebay. Given the initial success of the initiative, the allocated budget is set at around $137,000. This budget will ensure the continued efficacy of the groundwater extraction and treatment system, manage any emergent issues around the contamination hotspot, and ensure sustainable groundwater quality.

Safe Drinking Water Program (012): This program, allocated with no specific funds for FY2024, aims to support WRD pumper agencies, encouraging them to pump and utilize the basins. The primary focus is on funding well-head treatment projects owned by the pumpers and aiding Disadvantaged Communities in procuring external funding.

Dominguez Gap Infrastructure (018): Being executed in partnership with LADWP, this project emphasizes enhancing the use of recycled water in the Dominguez Gap Barrier, optimizing water resource management. While WRD is delivering the construction of these facilities, the project is fully reimbursed by our project partner.

Montebello Forebay Replenishment: There are no costs allocated for this budget year.

Building Improvements (032): With an approximate budget of $3.4 million, projects under this program target improvements at WRD's HQ facility. Key initiatives include HVAC replacement, the installation of a solar carport, and essential office renovations.

ARC (formerly GRIP) Advanced Water Treatment Facility (033): Allocated nearly $1.7 million, this program prioritizes the repair and rehabilitation needs of the ARC recycled water facility and its affiliated learning center, ensuring its operational longevity and efficacy.

Annex Building (041): With an allocation of about $2.3 million, this project is set to establish a warehouse for equipment storage as well as housing WRD's fleet vehicles and enhancing operational logistics.

Brackish Groundwater Reclamation Program (043): Allocated a significant $20.5 million, this project represents a significant increase in groundwater de-salting for WRD and its project partner, the City of Torrance. It encompasses the addition of new wells, further RO treatment capabilities, new nanofiltration treatment, and a dedicated brine line for efficient discharge.

PFAS Remediation Program (048): With a dedicated budget of $10 million for FY2024, similar to the Safe Drinking Water Program, this initiative provides support and funding for pumpers who've encountered PFAS contamination, ensuring safe and clean groundwater extraction.

In total, WRD's allocation for FY2024 stands at approximately $49.1 million, signifying WRD's unwavering dedication to groundwater management and the communities it serves.

Five-Year Forecast Overview

WRD's vision for groundwater sustainability extends beyond immediate requirements, with a strategic plan that charts the course for the next five years. The five-year forecast presents a detailed projection of WRD's focus on maintaining groundwater sustainability and quality, highlighting both overarching program allocations and their associated key projects.

Table 44

CIP 5-Year Forecast Overview

Project Code	Project Title	2024	2025	2026	2027	2028	Total
Facility/Program	001 - Leo J. VanderLans Advanced Water Treatment Facility	$7,995,113	$5,485,745	$5,615,587	$280,428	$280,428	$19,657,301
Facility/Program	002 - Goldsworty Groundwater Desalter	2,297,062	2,716,562	536,947	558,258	580,540	6,689,369
Facility/Program	006 -Perchlorate Remediation in the Los Angeles Forebay	-	-	-	-	-	-
Facility/Program	012 - Safe Drinking Water Program	-	-	-	-	-	-
Facility/Program	018 - Dominguez Gap Infrastructure	-	-	-	-	-	-
Facility/Program	023 - Montebello Forebay Replenishment	-	450,000	-	-	-	450,000
Facility/Program	032 - Building Improvements	3,371,442	1,875,721	282,500	92,500	101,500	5,723,663
Facility/Program	033 - ARC (formerly GRIP) Advanced Water Treatment Facility	1,678,988	501,588	501,588	501,588	501,588	3,685,340
Facility/Program	041 - Annex Building	3,231,000	1,110,000	-	-	-	4,341,000
Facility/Program	043 - Brackish Groundwater Reclamation Program	20,500,000	30,500,000	50,000,000	10,000,000	9,514,096	120,514,096
	Total CIP 5-Year Forecast	**$39,073,605**	**$42,639,616**	**$56,936,621**	**$11,432,775**	**$10,978,153**	**$161,060,769**
Facility/Program	048 - PFAS Remediation Program	10,000,000	10,000,000	10,000,000	9,000,000	9,000,000	48,000,000
	Total PFAS 5-Year Forecast	**$10,000,000**	**$10,000,000**	**$10,000,000**	**$9,000,000**	**$9,000,000**	**$48,000,000**
	Total 5-Year Forecast	**$49,073,605**	**$52,639,616**	**$66,936,621**	**$20,432,775**	**$19,978,153**	**$209,060,769**

Leo J. Vander Lans Advanced Water Treatment (001): With an allocation nearing $20 million over five years, the projects under this program are primarily dedicated to the LVL plant. This includes investments in LVL Scada Upgrade, LVL R&R Program, MF System Upgrades, and LVL Source Water Supply, all aimed at boosting production, upgrading aging infrastructure, and ensuring operational efficiency.

Goldsworthy Groundwater Desalter (002): Allocated approximately $6.9 million, this program underscores the importance of desalination and groundwater quality. The Brewer Well Connection Project stands out, emphasizing WRD's strategic collaborations to streamline water treatment processes.

Perchlorate Remediation in the Los Angeles Forebay (006): WRD's commitment to the Perchlorate Remediation project remains strong for the five-year period. The emphasis will continue to be on maintaining the system, monitoring groundwater quality, and ensuring that the contamination levels remain controlled. The relatively modest financial allocation in the forecast reflects the project's transition from a heavy capital expenditure phase to a maintenance phase.

Safe Drinking Water Program (012): Over the five years, this program remains a beacon of support for WRD pumping agencies, primarily focusing on well-head treatment projects and external funding acquisition for DAC pumpers. The projects under this program are funded by outside grants.

Dominguez Gap Infrastructure (018): This project, in collaboration with LADWP, continues to prioritize the efficient use of recycled water in the Dominguez Gap Barrier.

Montebello Forebay Replenishment (023): Installation of new wells and rehabilitation of existing wells will be studied as part of the renewal of the replenishment permit.

Building Improvements (032): An investment of nearly $5.8 million underscores the significance of projects like the Office Renovation Project, HQ HVAC Replacement, and HQ Solar Carport. These initiatives aim to enhance the work environment, promote energy efficiency, and elevate WRD's operational facilities.

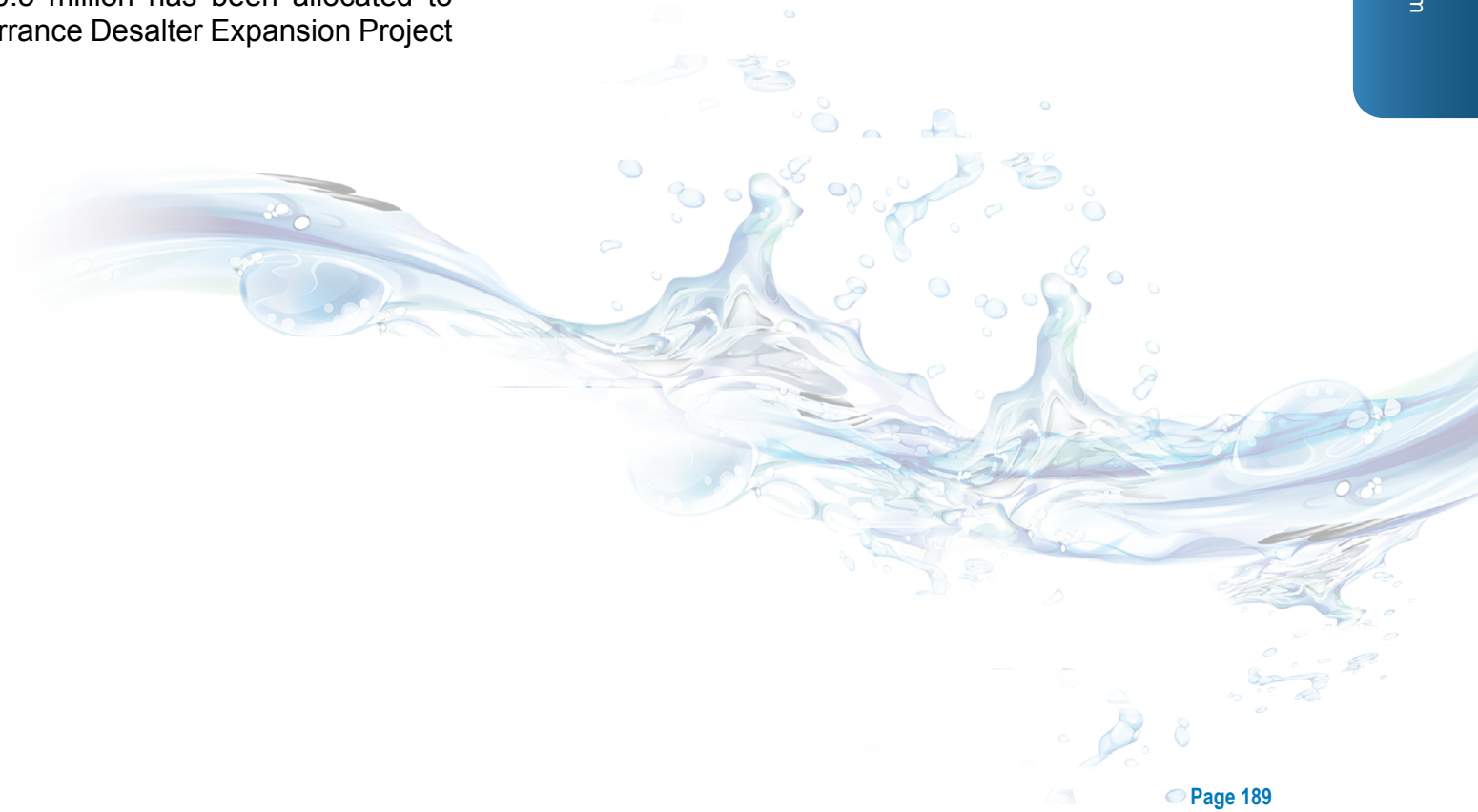
ARC (formerly GRIP) Advanced Water Treatment Facility (033): With a forecasted allocation of nearly $3.7 million, projects like ARC Admin & Learning Center Small CIP and ARC Treatment Facility Small CIP reflect the emphasis on infrastructure maintenance and educational outreach at the Albert Robles Center.

Annex Building (041): With around $4.3 million set aside, the Field Operations & Storage Annex Project stands as a testament to WRD's focus on streamlining operational logistics and storage solutions.

Brackish Groundwater Reclamation Program (043): A total budget of $120.5 million has been allocated to projects such as the Torrance Desalter Expansion Project and the Northern Groundwater Desalter, highlighting WRD's endeavor to remediate the saline plume locked in the West Coast Basin.

PFAS Remediation (048): With a $48 million commitment, this program specifically targets the remediation efforts against PFAS contamination, safeguarding groundwater purity.

The collective commitment over the forecast stands robustly at $208.6 million, signaling WRD's unwavering dedication to groundwater sustainability and quality assurance for the communities it serves.



Program & Project Details

The CIP is an embodiment of WRD's vision to continually enhance, modernize, and expand its facilities and operations. Within this framework, various projects are strategically curated to uphold WRD's mission of providing, protecting, and preserving high-quality groundwater for the region. Each project, whether aimed at infrastructure enhancement, technological advancement, or operational efficiency, resonates with one or multiple strategic goals set by the Board of Directors. The following details offer insights into specific projects within the LVL AWTF program and elucidate how they align with the overarching strategic objectives of the District.

Table 45

Program 001 - Leo J Vander Lans Advanced Water Treatment Facility

Project Title	2024	2025	2026	2027	2028	Total
LVL AWTF Small CIP (<$250K)	$544,408	$176,935	$76,935	$76,935	$76,935	$952,147
LVL Inland Injection General (CIP)	3,268,037	355,000	-	-	-	3,623,037
Pumps and VFDs (CIP)	2,253	11,264	11,264	11,264	11,264	47,307
Chemical Delivery System Repairs (CIP)	270,275	1,682,527	882,527	22,527	22,527	2,880,383
LVL Scada Upgrade (CIP)	2,680,295	200,000	-	-	-	2,880,295
LVL R&R Program (CIP)	6,758	11,264	11,264	11,264	11,264	51,813
LVL Discharge Improvement Project (CIP)	57,133	-	-	-	-	57,133
MF System Upgrades	415,955	3,048,756	4,633,597	158,439	158,439	8,415,185
LVL Source Water Supply	750,000					750,000
001 - Leo J. VanderLans Advanced Water Treatment Facility	**$7,995,113**	**$5,485,745**	**$5,615,587**	**$280,428**	**$280,428**	**$19,657,301**

Program 001: Leo J. Vander Lans Advanced Water Treatment

LVL AWTF Small CIP ($952,147 total): Designated as a placeholder for multiple small-scale capital projects, the Small CIP allocation for LVL AWTF caters to various minor upgrades, improvements, and equipment acquisitions for the facility. Falling under WRD's capitalization policy, these investments underscore the District's commitment to consistent enhancements and regular maintenance. This proactive approach resonates with the Maximize Innovation and Environmental Resiliency goal by ensuring that the LVL AWTF remains technologically advanced and efficient. Moreover, by accommodating unforeseen yet

essential needs, it promotes Organizational Excellence by ensuring the plant's adaptability and responsiveness to emerging challenges.

LVL Inland Injection Well ($3,623,037 for FY2024 and FY2025): The construction of an onsite injection well will elevate basin recharge capabilities. This project directly aligns with Expanding Replenishment Opportunities by introducing more recycled water into the groundwater aquifer, harnessing potential storage space, and bolstering local water supply.

Chemical Delivery System Repairs ($2,880,383 total): This project underpins WRD's dedication to Promoting Organizational Excellence. Regular maintenance and updates of the chemical delivery system guarantee system reliability, safety, and efficiency, reflecting WRD's emphasis on operational perfection.

LVL Scada Upgrade ($2,880,295 total): The investment in the SCADA system showcases WRD's commitment to leveraging technological advancements. This project Maximizes Innovation and Environmental Resiliency through real-time monitoring and control, optimizing facility operations, and indirectly supports the Promotion of Organizational Excellence by enhancing operational reliability and efficiency.

LVL Discharge Improvement Project ($57,133 for FY2024): By improving the hydraulics associated with sending recycled water to the seawater intrusion barrier, this project Expands Replenishment Opportunities. This enhancement will enable increased utilization of recycled water, maximizing both recharge and barrier capacities.

MF System Upgrades ($8,415,185 total): Upgrading the microfiltration system ties into the goal of Maximizing Innovation and Environmental Resiliency. By refining water treatment processes, WRD can ensure higher efficiency levels and demonstrate adaptability in its operations.

LVL Source Water Supply ($750,000 for FY2024): This project ensures a consistent source of water supply for the LVL facility. Such strategic provisioning supports the goal of Expanding Replenishment Opportunities by identifying and securing new replenishment sources and ensuring reliable recharge water for adjudicated pumping allocations.

Pumps and VFDs ($47,307 total) This budget ensures that any necessary rehabilitation or replacement of pumps and VFDs throughout the plant's various and complex treatment stages remains funded, guaranteeing continuous and consistent operation.

LVL R&R Program ($51,813 total) This budget reflects WRD's long-term vision of keeping the water treatment facility's infrastructure in prime condition. By continuously updating and refining the R&R program, WRD aims to optimize future rehabilitation and replacement budgetary needs, which will ensure maximum production and efficient operations.

Program 002: Goldsworthy Groundwater Desalter

Table 46

Program 002 - Goldsworthy Groundwater Desalter

Project Title	2024	2025	2026	2027	2028	Total
Desalter Wells Rehabilitation (CIP)	$310,186	$325,186	$340,936	$357,473	$374,838	$1,708,619
Desalter Condition Assesment (CIP)	210,186	10,186	10,186	10,186	10,186	250,929
Brewer Well Connection Project (CIP)	1,600,000	2,200,000	-	-	-	3,800,000
Goldsworthy Small CIP (<$250K)	176,690	181,190	185,825	190,599	195,516	929,821
002 - Goldsworthy Groundwater Desalter	**$2,297,062**	**$2,716,562**	**$536,947**	**$558,258**	**$580,540**	**$6,689,369**

Desalter Well Rehabilitation ($1,708,619 total): The expansion efforts of the desalter and the focus on well infrastructure ensure a consistent and enhanced water supply. These endeavors align directly with the goal to *Expand Replenishment Opportunities* by increasing the facility's capacity and ensuring reliable water sources.

Desalter Condition Assessment ($250,929 total): Through rigorous assessments of the desalter conditions, WRD aims to achieve preemptive maintenance and ensure operational longevity. This effort demonstrates WRD's commitment to Promoting Organizational Excellence by ensuring optimal functioning of critical infrastructure.

Brewer Well Connection Project ($3,800,000 for FY2024 and FY2025): The acquisition of the Brewer Well from West Basin Municipal Water District and its subsequent connection via a new pipeline will bolster the facility's water intake capacity. This project not only supports the *Expand Replenishment Opportunities* goal but also paves the way for enhancing extraction capabilities, addressing the *Expand Extraction Capacity* objective.

Goldsworthy Small CIP ($929,821 total): The Small CIP budget allocation for Goldsworthy Desalter is a strategic provision for various minor capital initiatives that align with WRD's capitalization criteria. This budget accommodates miscellaneous upgrades, operational improvements, and equipment procurements essential for the facility's optimized functioning. Such granular attention to detail and forward planning echoes the strategic aim to Maximize Innovation and Environmental Resiliency. The proactive allocation ensures that Goldsworthy remains at the forefront of operational excellence, adapting swiftly to evolving needs, and exemplifies the drive to Promote Organizational Excellence.

Program 006: Perchlorate Remediation in the Los Angeles Forebay

Table 47

Program 006 - Perchlorate Remediation in the Los Angeles Forebay

Project Title	2024	2025	2026	2027	2028	Total
Perchlorate Phase 1 - Prop 1 (CIP) - Program Management	$80,144	$ -	$ -	$ -	$ -	$80,144
Perchlorate Phase 1 - Prop 1 (CIP) - Community Outreach	11,449	-	-	-	-	11,449
Perchlorate Phase 1 - Prop 1 (CIP) - Design	11,449	-	-	-	-	11,449
Perchlorate Phase 1 - Prop 1 (CIP) - Construction	34,347	-	-	-	-	34,347
Perchlorate Phase 1 - Prop 1 (CIP) - Operation & Maintenance	-	-	-	-	-	-
100% Reimbursed from State's Grants	(137,389)	-	-	-	-	(137,389)
006 - Perchlorate Remediation in the Los Angeles Forebay	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**

The perchlorate remediation project, now fully constructed and operational, continues to address the contamination issue in the Los Angeles Forebay. Primary areas of focus include:

- Groundwater Extraction & Treatment System Maintenance: Ensuring optimal operation and achieving continued reductions in perchlorate levels.
- Monitoring & Quality Control: Regular checks around the MW-03 monitoring well to confirm stable perchlorate levels and ensure the groundwater's safety.

The project, now in its operational phase, embodies WRD's successful execution of its strategic goals, particularly in expanding replenishment opportunities and maximizing innovation.

Program 012: Safe Drinking Water Program

Table 48

Program 012 - Safe Drinking Water Program

Project Title	2024	2025	2026	2027	2028	Total
Maywood Mutual Wtr Co #3 (CIP)	$4,202,000	$452,000	$ -	$ -	$ -	$4,654,000
Sativa Wells Treatment Project	3,268,884	269,261	-	-	-	3,538,145
Walnut Park Meter Project (DAC) (CIP)	2,489,442	60,000	-	-	-	2,549,442
SWRCB DAC Needs Assessment Project	600,000	200,000	-	-	-	800,000
100% Reimbursed from State's Grants	(10,560,326)	(981,261)	-	-	-	(11,541,587)
012 - Safe Drinking Water Program	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**

Maywood Mutual Water Company No. 3 ($4,654,000 for FY2024 and FY2025): In alignment with the Disadvantaged Community component of the Safe Drinking Water Program, this project focuses on water distribution system improvements and storage reservoir replacement for the Maywood Mutual Water Company No. 3. This project is anticipated to be funded by SDWSRF funds made available by Proposition 1.

Sativa Wellhead Treatment Project ($3,538,145 for FY2024 and FY2025): A joint effort between WRD, the Los Angeles County Department of Public Works, and Suburban Water System, the Sativa Well 5 is impacted by levels of Manganese above the secondary MCL. The project is constructing a Wellhead Treatment System and a Reservoir. This project is funded by SDWSRF funds made available by Proposition 1.

Walnut Park Mutual Water Company Meter Project ($2,549,442 in FY2024 and FY2025): This construction project involves the replacement of all existing residential water meters throughout the Company's system. The existing water meters will be replaced with a new "Kamstrup" ultrasonic meter, which reflects the latest in smart meter reading technology. The meter utilizes a Flow IQ transmitter capable of high accuracy and ability to transmit the meter reading data to a remote receiver at the Company's headquarters. This project is funded by SDWSRF funds made available by Proposition 1.

State Water Resources Control Board DAC Needs Assessment Project ($800,000 in FY 2024 and FY 2025): The DAC Needs Assessment Project includes investigating opportunities to improve water infrastructure for disadvantaged communities. The project is conducting the Technical, Managerial and Financial (TMF) capability analysis of small systems serving disadvantaged communities, which will allow those participants to seek out state funding for the identified needs. This project is funded by a grant from the State Water Resources Control Board.

Program 018: Dominguez Gap Infrastructure

Table 49

Program 018 - Dominguez Gap Infrastructure

Project Title	2024	2025	2026	2027	2028	Total
2nd DGB Connection - General (CIP)	$10,000,000	$5,000,000	$ -	$ -	$ -	$15,000,000
DGB Potable Backup (CIP)	110,186	-	-	-	-	110,186
100% Reimbursed through Partnership with LADWP	(10,110,186)	(5,000,000)	-	-	-	(15,110,186)
018 - Dominguez Gap Infrastructure	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**

DGB 2nd Recycled Water Connection ($15,000,000 in FY2024 and 2025): This project constructs a second recycled water connection in the Dominguez Gap Barrier to an increase of recycled water use from six million gallons per day to as much as 9 million gallons per day. Currently, there is more recycled water available, but injection is hydraulically limited by the current connection size.

DGB Potable Backup ($110,186 total): This project will explore a potable backup connection to the Dominguez Gap Seawater Intrusion Barrier through the LADWP system in the southern section of the Barrier. In the event that recycled water cannot be supplied by LADWP, this project would allow for Barrier protective elevations to be maintained through the use of potable water.

Program 023: Replenishment Operations

Table 50

Program 023 - Replenishment Operations

Project Title	2024	2025	2026	2027	2028	Total
Montebello Forebay Recharge (CIP)	$ -	$450,000	$ -	$ -	$ -	$450,000
023 - Replenishment Operations	**$ -**	**$450,000**	**$ -**	**$ -**	**$ -**	**$450,000**

Montebello Forebay Recharge ($450,000 in 2025): The key project under this program is the Montebello Forebay Recharge at a cost of $450,000. This allocation is dedicated to renewing the permit of Montebello Forebay, which has been in place for over 30 years. New regulations necessitate the addition of wells and deepening of existing ones that run dry during droughts. This budget will support comprehensive research and planning to understand the current system and map out necessary improvements. The study will lay the foundation for future enhancements that will be required under the renewed permit.

Program 032: Building Improvements

Table 51

Program 032 - Building Improvements

Project Title	2024	2025	2026	2027	2028	Total
Office Renovation Project (CIP)	$871,442	$875,721	$282,500	$92,500	$101,500	$2,223,663
HQ HVAC Replacement	1,500,000	-	-	-	-	1,500,000
HQ Solar Car Port	1,000,000	1,000,000	-	-	-	2,000,000
032 - Building Improvements	**$3,371,442**	**$1,875,721**	**$282,500**	**$92,500**	**$101,500**	**$5,723,663**

Office Renovation Project ($2,223,663 total): The Office Renovation Project reflects WRD's commitment to fostering an efficient, modern, and collaborative work environment. As the organization continues to evolve and serve the community, having up-to-date office spaces becomes crucial. Scheduled renovations over the years will ensure that our facilities remain conducive to delivering outstanding service.

HQ HVAC Replacement ($1,500,000 in FY2024): An optimal working environment is more than just aesthetics; it's about comfort and safety too. The HQ HVAC Replacement initiative underlines this belief. Modernizing the HVAC systems not only leads to energy savings and reduced operational costs but also ensures the well-being of our team members.

HQ Solar Car Port ($2,000,000 total for FY2024 and FY2025): WRD continues to be at the forefront of green initiatives with the HQ Solar Car Port project. This project reflects WRD's dedication to sustainable energy practices. By incorporating solar panels into our infrastructure, we're significantly reducing our carbon footprint and promoting the use of renewable energy sources. The dual benefit of providing shade for vehicles while generating clean power demonstrates WRD's vision for an eco-friendly future.

Program 033: ARC (formerly GRIP) Advanced Water Treatment Facility

Table 52

Program 033 - ARC Advanced Water Treatment Facility

Project Title	2024	2025	2026	2027	2028	Total
ARC Admin & Learning Center Small CIP (<$250K)	$384,828	$153,628	$153,628	$153,628	$153,628	$999,340
ARC Treatment Facility Small CIP (<$250K)	1,294,160	347,960	347,960	347,960	347,960	2,686,000
033 - ARC Advanced Water Treatment Facility	**$1,678,988**	**$501,588**	**$501,588**	**$501,588**	**$501,588**	**$3,685,340**

ARC Admin & Learning Center Small CIP (<$250K) ($999,340 total): This budgetary allocation primarily serves as a placeholder for a series of minor capital improvement projects aimed at the ARC Administration and Learning Center. Despite being relatively new at only 4 years old, routine updates, modifications, and equipment enhancements are anticipated. These small-scale projects may include anything from tech upgrades to minor renovations, ensuring that the facility remains up-to-date and serves its dual purpose efficiently.

ARC Treatment Facility Small CIP (<$250K) ($2,686,001 total): Slightly larger in budget compared to the admin and learning center allocation, this set aside pertains to the ARC Treatment Facility, which is an advanced water treatment system. Given the facility's critical role providing advanced treated recycled water to the Montebello Forebay Spreading Grounds operations, there's an emphasis on maintaining its optimal performance. This budget encompasses various small-scale projects, which could range from equipment replacements to system enhancements, ensuring that the facility stays at the forefront of water treatment technology and regulatory compliance.

Program 041: Annex Building

Table 53

Program 041 - Annex Building

Project Title	2024	2025	2026	2027	2028	Total
Field Operations & Storage Annex Project (CIP)	$3,231,000	$1,110,000	$ -	$ -	$ -	$4,341,000
041 - Annex Building	**$3,231,000**	**$1,110,000**	**$ -**	**$ -**	**$ -**	**$4,341,000**

Field Operations & Storage Annex Project ($4,341,000 in FY2024 and FY2025): This budgetary allocation is for the construction of a warehouse building to provide WRD with ample storage space for a diverse range of equipment and miscellaneous items. WRD's fleet of vehicles will be stored in this warehouse.

Program 043: Brackish Groundwater Reclamation Program

Table 54

Program 043 - Brackish Groundwater Reclamation Program

Project Title	2024	2025	2026	2027	2028	Total
BGRP - Torrance Desalter Expansion	$20,000,000	$30,000,000	$50,000,000	$10,000,000	$9,514,096	$119,514,096
BGRP - Northern Groundwater Desalter	500,000	500,000	-	-	-	1,000,000
043 - Brackish Groundwater Reclamation Program	**$20,500,000**	**$30,500,000**	**$50,000,000**	**$10,000,000**	**$9,514,096**	**$120,514,096**

BGRP – Torrance Desalter Expansion ($119,514,096 total): The Torrance segment of this program is designed to expand the Goldsworthy Desalter. By introducing more wells, adding nanofiltration pretreatment and additional reverse osmosis systems, the initiative not only targets the remediation of the basin from salt but also creates a new potable water supply. A progressive design-build delivery will be employed.

BGRP - Northern Groundwater Desalter ($1,000,000 in FY 2024 and 2025): A secondary, remote portion of the

saline plume lies further north of Torrance. These costs include the initiation of a study to determine the most cost-effective means to remediate this remote plume.

Program 048: PFAS Remediation Program

Table 55

Program 048 - PFAS Remediation Program

Project Title	2024	2025	2026	2027	2028	Total
PFAS Remediation Program	$10,000,000	$10,000,000	$10,000,000	$9,000,000	$9,000,000	$48,000,000
048 - PFAS Remediation Program	**$10,000,000**	**$10,000,000**	**$10,000,000**	**$9,000,000**	**$9,000,000**	**$48,000,000**

PFAS Remediation Program ($48,000,000 total): This program is dedicated to assisting pumper agencies requiring well-head treatments due to the detection of PFAS in their wells, ensuring safe and clean water for consumption. To address the issue of PFAS contamination in pumper wells, the PFAS Remediation Program has allocated funds over five years.

Special Initiatives

In addition to routine infrastructure improvements, the district is also spearheading a series of special initiatives. These projects, often executed in collaboration with external agencies or through unique funding sources like grants, underscore our dedication to innovation and excellence in water resource management. The projects described above can all be compartmentalized into one of three special initiatives which represent WRD's overarching strategic objectives or goals. WRD's Special Initiatives include the following:

- Infrastructure Improvements
- Regional Water Independence Program (WIN4ALL)
- Groundwater Quality Protection and Remediation

Infrastructure Improvements:

WRD places significant importance on upgrading its facilities to meet the growing demands for groundwater management. Key among these is the improvement of its two recycled water plants, which both play key roles in leveraging recycled water for protection and recharge of the groundwater basin. Additionally, the Goldsworthy Desalter continues to be instrumental in remediating the saline plume trapped in the West Coast Basin, while ensuring potable water supply to the City of Torrance. Through strategic infrastructure investments in these facilities, WRD underscores its unwavering commitment to safeguarding regional water resources. Projects at WRD's headquarters, such as the Solar Car Port and HVAC replacement, underline the importance of a sustainable and efficient operational environment.

Table 56

Infrastructure Improvement Projects

Project Title	2024	2025	2026	2027	2028	Total
LVL AWTF Small CIP (<$250K)	$544,408	$176,935	$76,935	$76,935	$76,935	$952,147
Pumps and VFDs (CIP)	2,253	11,264	11,264	11,264	11,264	47,307
Chemical Delivery System Repairs (CIP)	270,275	1,682,527	882,527	22,527	22,527	2,880,383
LVL Scada Upgrade (CIP)	2,680,295	200,000	-	-	-	2,880,295
LVL R&R Program (CIP)	6,758	11,264	11,264	11,264	11,264	51,813
LVL Discharge Improvement Project (CIP)	57,133	-	-	-	-	57,133
MF System Upgrades	415,955	3,048,756	4,633,597	158,439	158,439	8,415,185
Desalter Wells Rehabilitation (CIP)	310,186	325,186	340,936	357,473	374,838	1,708,619
Desalter Condition Assesment (CIP)	210,186	10,186	10,186	10,186	10,186	250,929
Goldsworthy Small CIP (<$250K)	176,690	181,190	185,825	190,599	195,516	929,821
Montebello Forebay Recharge (CIP)	-	450,000	-	-	-	450,000
Office Renovation Project (CIP)	871,442	875,721	282,500	92,500	101,500	2,223,663
HQ HVAC Replacement	1,500,000	-	-	-	-	1,500,000
HQ Solar Car Port	1,000,000	1,000,000	-	-	-	2,000,000
ARC Admin & Learning Center Small CIP (<$250K)	384,828	153,628	153,628	153,628	153,628	999,340
ARC Treatment Facility Small CIP (<$250K)	1,294,160	347,960	347,960	347,960	347,960	2,686,001
Field Operations & Storage Annex Project (CIP)	3,231,000	1,110,000	-	-	-	4,341,000
Total - Infrastructure Improvement Projects	**$12,955,568**	**$9,584,616**	**$6,936,621**	**$1,432,775**	**$1,464,056**	**$32,373,636**

Regional Water Independence Program (WIN4ALL)

Building on the foundational success of WRD's Water Independence Now (WIN) Program, the WIN4ALL initiative aims to optimize the use of groundwater aquifers, transforming them into reliable and locally sustainable water sources for the expansive Los Angeles Basin Region. The projects listed under WRD's CIP for WIN4ALL, such as the LVL Inland Injection and the Dominguez Gap Barrier 2nd Recycled Water Connection, serve as pivotal investments towards this cause. These strategic projects, aligned with the mission of WIN4ALL, underscore the District's commitment to harnessing local recycled water and captured stormwater, further solidifying WRD's dedication to sustainably managing the vital groundwater supplies of Southern Los Angeles County. Specific projects that fall under this initiative amount to nearly $20 million over the next five years; however, because of a strategic partnership, approximately $4.4 million is included in WRD's CIP.

Table 57

WIN4ALL Projects

Project Title	2024	2025	2026	2027	2028	Total
LVL Inland Injection General (CIP)	$3,268,037	$355,000	$ -	$ -	$ -	$3,623,037
LVL Source Water Supply	750,000	-	-	-	-	750,000
2nd DGB Connection - General (CIP)	-	-	-	-	-	-
DGB Potable Backup (CIP)	-	-	-	-	-	-
Total - WIN4ALL Projects	**$4,018,037**	**$355,000**	**$ -**	**$ -**	**$ -**	**$4,373,037**

Groundwater Quality Protection and Remediation Projects:

Groundwater Quality Protection and Remediation are a collection of CIP projects focused on addressing WRD's ongoing effort to address water quality issues that affect WRD projects and the pumpers' facilities. Specific projects that fall under this initiative amount to nearly $183 million over the next 5 years. However, because of grant opportunities, only $172 million is included in WRD's CIP. These projects are included below:

Table 58
Groundwater Quality Protection & Remediation

Project Title	2024	2025	2026	2027	2028	Total
Brewer Well Connection Project (CIP)	$1,600,000	$2,200,000	$ -	$ -	$ -	$3,800,000
Perchlorate Remediation in the Los Angeles Forebay	-	-	-	-	-	-
Maywood Mutual Wtr Co #3 (CIP)	-	-	-	-	-	-
Sativa Wells Treatment Project	-	-	-	-	-	-
Walnut Park Meter Project (DAC) (CIP)	-	-	-	-	-	-
SWRCB DAC Needs Assessment Project	-	-	-	-	-	-
BGRP - Torrance Desalter Expansion	20,000,000	30,000,000	50,000,000	10,000,000	9,514,096	119,514,096
BGRP - Northern Groundwater Desalter	500,000	500,000	-	-	-	1,000,000
PFAS Remediation Program	10,000,000	10,000,000	10,000,000	9,000,000	9,000,000	48,000,000
Total - Groundwater Quality Protection & Remediation	**$32,100,000**	**$42,700,000**	**$60,000,000**	**$19,000,000**	**$18,514,096**	**$172,314,096**

Partnerships and Grant Funding Projects

Table 59

Partnerships & Grant Funding Projects

Project Title	2024	2025	2026	2027	2028	Total
LVL Inland Injection General (CIP)	$1,200,000	$300,000	$ -	$ -	$ -	$1,500,000
Brewer Well Connection Project (CIP)	-	1,500,000	558,307	-	-	2,058,307
Perchlorate Remediation in the Los Angeles Forebay	137,389	-	-	-	-	137,389
Maywood Mutual Wtr Co #3 (CIP)	4,202,000	452,000	-	-	-	4,654,000
Sativa Wells Treatment Project	3,268,884	269,261	-	-	-	3,538,145
Walnut Park Meter Project (DAC) (CIP)	2,489,442	60,000	-	-	-	2,549,442
SWRCB DAC Needs Assessment Project	600,000	200,000	-	-	-	800,000
2nd DGB Connection - General (CIP)	10,000,000	5,000,000	-	-	-	15,000,000
DGB Potable Backup (CIP)	110,186	-	-	-	-	110,186
BGRP - Torrance Desalter Expansion	1,500,000	3,429,000	-	-	-	4,929,000
Total - Partnership & Grant Funding Projects	**$23,507,901**	**$11,210,261**	**$558,307**	**$ -**	**$ -**	**$35,276,469**

Many of WRD's projects are funded through partnerships with other agencies or grant opportunities through state, federal, and private avenues. The following offers more information on the various grants and partnerships…

- **LVL Inland Injection:** This project was awarded $1.5 million from the United States Bureau of Reclamation (USBR) 2020 WaterSmart Drought Resiliency Grant Program.
- **Brewer Well Connection Project:** For this project, WRD has secured a $2.06 million grant from the California Department of Water Resources (DWR) Water Desalination Grant Program under Proposition 1 funding.
- **Perchlorate Remediation in the Los Angeles Forebay:** Funding for this project includes a grant from the DWR Groundwater Sustainability Program under Proposition 1 funding.
- **Maywood Mutual Water Co #3:** WRD anticipates funding from the State Water Resources Control Board (SWRCB) Safe Drinking Water State Revolving Fund Proposition 1 funding.

- **Sativa Wells Treatment Project:** This project has received funding from the SWRCB Safe Drinking Water State Revolving Fund Proposition 1 funding.
- **Walnut Park Meter Project (DAC):** This project has received funding from the SWRCB Safe Drinking Water State Revolving Fund Proposition 1 funding.
- **SWRCB DAC Needs Assessment Project:** The allocation of $800,000 for this project is detailed in California Senate Bill 109 (SB109) and is administered by the State Water Resources Control Board (SWRCB).
- **DGB - 2nd Recycled Water Connection:** This project is funded entirely through partnership with the Los Angeles Department of Water and Power (LADWP).
- **DGB Potable Backup:** This project is funded entirely through partnership with the Los Angeles Department of Water and Power (LADWP).
- **BGRP - Torrance Desalter Expansion:** This project is funded by the USBR WIIN Act: WaterSMART Desalination Construction for nearly $5.0 million.

Funding Sources

For the Fiscal Year 2024, WRD's CIP relies on a diversified portfolio of revenue sources to finance the projects aimed at enhancing our infrastructure and ensuring the sustainability of the region's groundwater supply.

- **Bond Proceeds:** A significant portion of WRD's funding, totaling $27,230,008, is derived from bond proceeds. This includes the allocations from the 2015 and 2018 Bond Funds. WRD anticipates additional bonding in 2026 for the PFAS Remediation Program and the Brackish Groundwater Reclamation Program.
- **Restricted Funds:** WRD maintains $3,200,000 in Restricted Funds as required by the terms of the existing SRF loan.
- **Unrestricted Funds:** WRD's unrestricted operating reserves provide a solid foundation with $30,000,000. Additionally, the Water Carryover and Rate Stabilization fund brings in $22,789,052, making the total for unrestricted funds $52,789,052.
- **Encumbered Capital Funds:** A total of $49,200,000 for encumbered capital funds has been accounted for. Key contributors in this category include the Safe Drinking Water fund at $4,000,000, the Well Rehabilitation and Construction Loan Fund with $4,900,000, the PAYGO Capital Fund at $23,000,000, and the PFAS Remediation Fund with a notable $17,300,000.
- **Replenishment Assessment:** WRD's Replenishment Assessment generates $86,715,000, with $83,845,000 towards WRD's annual expenses. The Replenishment Assessment also provides $410,000 and $2,460,000 for PAYGO Capital Fund and the PFAS Remediation Fund, respectively.
- **Other Sources:** Funding from external sources such as the Caltrans Trust Fund, Interest Revenue, and Grant Funding (detailed above) together sum up to $21,159,534. It's worth noting that the grant funding stands at more than $13,000,000 for FY2024.

- **Assessments and Subsidies:** A combined total of $7,431,125 will be sourced from assessments and subsidies. This includes the Desalter assessment, water treatment subsidies, and other operating income.

For FY2024, the total anticipated revenues amount to $247,724,719, ensuring robust financial backing for our CIP projects and our commitment to long-term sustainability and development.

Table 60

Funding Sources

Sources of Revenues	FY 2024	FY 2025	FY 2026	FY 2027	FY 2028
Bond Proceeds					
PFAS Remediation Program Financing	$-	$-	$-	$23,200,000	$-
2015 Bond Funds	7,516	-	-	-	-
2018 Bond Funds	27,222,492	-	-	-	-
2026 Bond Funds/WIFIA or SRF	-	-	55,000,000	-	-
Total Bonds	**27,230,008**	**-**	**55,000,000**	**23,200,000**	**-**
Restricted Funds					
Debt Service (Resticted)	3,200,000	-	-	-	-
Unresticted Funds					
Unrestricted Operating Reserves	30,000,000	-	-	-	-
Water Carryover and Rate Stabilization	22,789,052	-	-	-	-
Total Unrestricted Funds	**52,789,052**	**-**	**-**	**-**	**-**

Table 60

Partnerships and Grant Funding Projects (cont.)

Sources of Revenues	FY 2024	FY 2025	FY 2026	FY 2027	FY 2028
Encumbered Capital Funds					
Safe Drinking Water	4,000,000	-	-	-	-
Well Rehabilitation and Construction Loan Fund	4,900,000	-	-	-	-
PAYGO Capital Fund	23,000,000	-	-	-	-
PFAS Remediation Fund	17,300,000	-	-	-	-
Total Encumbered Capital Funds	**49,200,000**	**-**	**-**	**-**	**-**
Total Restricted, Unrestricted and Encumbered Funds	**105,189,052**	**-**	**-**	**-**	**-**
Replenishment Assessment					
Replenishment Assessment	83,845,000	-	-	-	-
RA Assessment for PAYGO Capital Fund	410,000	-	-	-	-
RA Assessment for PFAS Remediation Fund	2,460,000	-	-	-	-
Total Replenishment Assessment	**86,715,000**	**-**	**-**	**-**	**-**
Other (Interest, Grant Funding)					
CalTrans Trust Fund	5,559,534	-	-	-	-
Interest Revenue	2,000,000	-	-	-	-
Grant Funding	13,600,000	10,000,000	10,000,000	10,000,000	10,000,000
Other (Interest, Grant Funding)	**21,159,534**	**10,000,000**	**10,000,000**	**10,000,000**	**10,000,000**
Assessments and Subsidies					
Desalter assessment	3,000,000	-	-	-	-
Water treatment subsidies (LVL, ARC)	630,000	-	-	-	-
Other operating income (Title 22, OCWD, Interest)	3,801,125	-	-	-	-
Total Assessments and Subsidies	**7,431,125**	**-**	**-**	**-**	**-**
Total Sources of Revenues	**$247,724,719**	**$10,000,000**	**$65,000,000**	**$33,200,000**	**$10,000,000**

Risk Management and Mitigation

Effective management and mitigation of risks are paramount to the success of the Capital Improvement Program. As a California special district, our approach to risk management and mitigation within the Capital Improvement Program is both comprehensive and compliant with the California Environmental Quality Act (CEQA) and public works regulations. Recognizing that unforeseen challenges and changes are inherent to complex infrastructure projects, our risk management approach is proactive and accounts for real world circumstances. We begin by identifying potential risks during the planning and design phases. This process includes an assessment of the project's scope, budget, timeline, and potential environmental and community impacts.

Given the public nature of our projects and the public funds utilized, it's imperative that we categorize and prioritize each risk, ensuring that public resources are efficiently and effectively allocated. Mitigation strategies are then developed, targeting not only the immediate risks but also potential long-term implications for our community and the environment. Transparency is central to our approach. We maintain an open line of communication with stakeholders and receive input and oversight through a Technical Advisory Committee made up WRD pumping agencies.

Being bound by public works regulations means we're committed to ensuring fairness, competitiveness, and transparency in contracting and procurement. Post-project reviews are consistently conducted to evaluate the effectiveness of our risk management strategies. These reviews serve as learning tools, allowing us to refine our processes and consistently deliver projects that meet the expectations of our community, are environmentally conscious, and adhere to the stringent regulations we operate under.

Performance Metrics and Evaluation Framework

WRD recognizes the importance of effective project management to ensure that our CIP projects are not only successful but also reflective of our commitment to excellence and adherence to established standards. Central to our project management philosophy is the Project Management Triangle – a model emphasizing the interconnectedness of scope, cost, and time. By balancing these three critical elements, we strive to deliver projects that meet our defined objectives, are economically viable, and are completed within established timelines.

Scope is at the forefront of our efforts. Before embarking on any project, we meticulously define its parameters to ensure clarity in execution and avoid potential scope creeps. This clear delineation ensures that all project stakeholders have a concise understanding of what the project intends to achieve.

Cost management, influenced by our responsibility to our pumpers and guided by public works rules, ensures that every dollar is judiciously spent. We employ rigorous budgeting and forecasting methods, paired with ongoing monitoring systems. This avoids overruns and ensures that we remain accountable to the community we serve.

Timelines, while often challenged by unforeseen circumstances, are maintained through proactive scheduling, milestone tracking, and the reallocation of resources when necessary. Timely completion not only ensures that our projects remain within the budget but frees up human resources to focus on additional projects.

In addition to the Project Management Triangle, our evaluation framework incorporates both quantitative and qualitative metrics. Quantitative metrics may include financial savings, timely project completions, or efficiency improvements, while qualitative metrics might encompass stakeholder satisfaction and environmental considerations under CEQA.

To measure our performance against these metrics, we've instituted regular review cycles. This iterative approach allows us to assess our progress, recalibrate our strategies, and continuously improve. In doing so, we underscore our commitment to transparency, accountability, and the pursuit of excellence for the benefit of all our stakeholders.

Conclusion

WRD's Capital Improvement Program emphasizes a forward-thinking, comprehensive, and sustainable approach to ensuring water quality and supply for the region. By leveraging a multi-faceted funding strategy, including partnerships, grants, and public funds, WRD showcases its commitment to fiscal responsibility and effective resource utilization. Methodologies and special initiatives, like 'WIN4ALL' and 'Groundwater Quality Protection and Remediation', illustrate the District's innovative endeavors to tackle pressing water challenges.

Moreover, this plan underscores the importance of risk management and performance metrics, highlighting WRD's dedication to transparency, accountability, and continuous improvement. With an emphasis on stakeholder involvement and public benefit, the Capital Improvement Program serves as a testament to WRD's mission of championing water sustainability, quality, and the well-being of the aquifers it manages. This plan not only charts the course for the immediate fiscal year but sets the tone for a future where water security remains a top priority.

Glossary of Terms

Accrual: Revenue is recognized in the fiscal year when earned, and expenditures are recognized in the fiscal year when incurred.

Acre-foot (af): The volume of water necessary to cover one acre to a depth of one foot, equal to 325,900 gallons. An acre-foot is the amount of water used by two households in one year.

Amortization: An accounting technique used to periodically lower the book value of a loan or an intangible asset over a set period of time.

Appropriation Authorization to make expenditures or create obligations from a specific fund for a specific purpose. Appropriations are usually limited in amount and period of time during which the expenditure is to be recognized.

Aquifer: The geologic formation of sand and gravel where groundwater is stored and can be easily pumped out by wells.

Audit: Typically a review of financial reports or performance activity (such as of an agency or program) to determine conformity or compliance with applicable laws, regulations, and/or standards.

Balanced budget Occurs when an organization's revenues either meet or exceed its projected expenses in a given financial cycle.

Bonds: A debt security issued by a government to support government spending and obligations.

Budget: A plan of operation expressed in terms of financial or other resource requirements for a specific period of time

Contamination: An impurity in air, soil or water that can cause harm to human health or the environment.

Depreciation: The method for allocating the cost of fixed assets owned by the recipient/ grantee to periods benefiting from asset use.

Desalination: A process that converts seawater or brackish water to fresh water.

Discharge: To expel water that naturally moves from an aquifer to a surface stream or lake.

Drought: An extended period of dry weather.

Enterprise fund: A separate accounting and financial reporting mechanism for which revenues and expenditures are segregated into a fund with financial statements separate from all other governmental activities.

Groundwater: Water under the ground's surface. It fills up the pore spaces (voids) between grains of gravel, sand, silt, or clay, and is a common source of water for drinking and irrigation.

Groundwater flow: The movement of groundwater beneath the earth's surface.

Imported water: Water that the WRD purchases from the Colorado River or Northern California to put into the groundwater basins to supplement insufficient local rainfall.

Major fund: Governmental Accounting Standards Board (GASB) defines major funds as those meeting the following criteria: The total assets plus deferred outflows, liabilities plus deferred inflows, revenues, or expenditures/expenses of the individual governmental or enterprise fund are at least 10 percent of the corresponding total (assets, liabilities, etc.)

Overdraft: Groundwater extractions typically exceed the natural inflows into the groundwater basin.

Precipitation: Stage of the water cycle when water vapor molecules become too large and heavy to remain in the atmosphere and fall to the ground in the form of rain, snow, sleet, hail, etc.

Recharge: To refill the groundwater basin by infiltrating rain water, imported water, or recycled water down into the aquifers.

Recycled Water: Water that has been collected after prior use, then highly treated at wastewater treatment plants so that it can be safely used again, such as for groundwater recharge.

Runoff: Water that does not become absorbed by the earth but flows across the surface of the land into a stream or lake.

Treatment: The process in which water is cleaned and purified.

Trust fund: Those designated by law as such, whereby receipts are earmarked for spending on specific purposes. The laws establishing trust funds may require balances to be invested, typically in Treasury debt securities.

Water Cycle: The never-ending movement of water through the atmosphere, ground and back again; also called the hydrologic cycle.

Water Table: The top of the saturation zone.

Well: A hole or shaft drilled into the earth to pump water to the surface.

Wheeling: Use of conveyance facilities by parties other than the owner.

WRD: The Water Replenishment District of Southern California, an agency responsible for managing two of the most utilized groundwater basins in Southern California. These basins, the Central and West Coast, extend 420 square-miles through southern Los Angeles County and are among the region's most reliable natural water resources

List of Acronyms

ABAC	Audit and Budget Advisory Committee
ACWA/JPIA	Association of California Water Agencies/Joint Power Insurance Authority
AF	Acre-Feet (equivalent to 325,851 gallons)
AFY	Acre-Feet per Year
AGWT	American Groundwater Trust
AM	Asset Management
AOP	Advanced oxidation using hydrogen peroxide
ARC	Albert Robles Center for Water Recycling and Environmental Learning
ARCWTF	Albert Robles Center Water Treatment Facility
AWPF	Advanced Water Purification Facility
AWTF	Advanced Water Treatment Facility
AWWA	American Water Works Association
AWWARF	American Water Works Association Research Foundation
BAC	Budget Advisory Committee
BDOC	Biodegradable dissolved organic carbon
BOD	Board of Directors
CalPERS	California Public Employee Retirement System
Caltrans	California Department of Transportation
CAR	Compliance Assessment Report
CASGEM	California Statewide Groundwater Elevation Monitoring
CBMWD	Central Basin Municipal Water District
CBWCB	Central Basin and West Coast Basin
CDIR	California Department of Industrial Relations
CDWR	California Department of Water Resources
CEPRD	Coalition for Environmental Protection, Restoration, and Development
CEQA	California Environmental Quality Act
CIP	Capital Improvement Program
CMFA	California Municipal Finance Authority
CMMS	Computerized Maintenance Management System
COE	Corp. of Engineers
COP	Certificates of Participation
CSDLAC	County Sanitation Districts of Los Angeles County
CSR	Cost of Service Report
CWF	Clean Water Fund
CWSC	California Water Service Company
CWSRF	California Clean Water State Revolving Fund
DAC	Disadvantaged Communities
DAF	Dissolved Air Flotation
DDW	Division of Drinking Water
DVBEs	Disabled Veteran Business Enterprises
DGB	Dominguez Gap Barrier
DTS	Data & Technology Services
DTSC	California Department of Toxic Substances Control
DWR	Department of Water Resources
E-MFRES	Enhanced-Montebello Forebay Recharge Enhancement Study
EAM	Enterprise Asset Management

EAMS	Electronic Adjudication Management System
EIR	Environmental Impact Report
EPA	U.S. Environmental Protection Agency
ESA	Environmental Science Associates
ESR	Engineering Survey and Report
ESRI	Environmental Systems Research Institute

F

FASB	Financial Accounting Standards Board
FAT	Fully Advanced Treated
FCD	Flood Control District
FDIC	Federal Deposit Insurance Corporation
FTE	Full -Time Equivalent
FY	Fiscal Year

G

GAAP	Generally Accepted Accounting Principles
GAAS	Generally Accepted Auditing Standards
GASB	Government Accounting Standards Board
GBMP	Groundwater Basin Master Plan
GBOP	Groundwater Basin Optimization Pipeline
GDP	Gross Domestic Product
GFOA	Government Finance Officers Association
GIS	Geographic Information System
GLAC	Greater Los Angeles County
GRAC	Groundwater Resources Association of California
GRIP	Groundwater Reliability Improvement Program
GRRR	Groundwater Replenishment using Recycled Water Regulations
GSWC	Golden State Water Company
GW	Groundwater
GWAM	Groundwater Augmentation Model
GWMA	Groundwater Management Area
HR	Human Resources

H

HVAC	Heating, Ventilation and Air Conditioning

I

ICA	Independent Cities Association
ICP	Interconnection Pipeline Improvements
IRWMP	Integrated Regional Water Management Plan
IT	Information Technology

J

JPA	Joint Powers Authority
JWPCP	Joint Water Pollution Control Plan

L

LABC	Los Angeles Business Council
LABOS	Los Angeles Bureau of Sanitation
LACDPW	Los Angeles County Department of Public Works (Flood Control)
LACFCD	Los Angeles County Flood Control District
LACSD	Los Angeles County Sanitation Districts
LADWP	City of Los Angeles Department of Water and Power
LAIF	Local Agency Investment Fund
LAMS4	Los Angeles County Municipal Stormwater Permit
LARWQCB	Los Angeles Regional Water Quality Control Board
LASAN	Los Angeles Sanitation
LBEs	Local Business Enterprises
LBWD	City of Long Beach Water Department
LBWRP	Long Beach Water Reclamation Plant
LBWTP	Long Beach Waste Treatment Plant
LEED	Leadership in Energy & Environmental Design
LGCR	Local Government Compensation Report
LJVWTF	Leo J. Vander Lans Water Treatment Facility
LRP	Local Resources Program
LUST	Leaking Underground Storage Tank
LVL	Leo J. Vander Lans

M

MAR	Managed Aquifer Recharge
MF	Microfiltration
MFI	Modified Fouling Index
MFRES	Montebello Forebay Recharge Enhancement Study
MFSG	Montebello Forebay Spreading Grounds
MFSGOM	Montebello Forebay Spreading Grounds Operational Model
MGD	Million Gallons per Day
MISAC	Municipal Information Systems Association of California
MODFLOW	Modular three-dimensional finite-difference groundwater FLOW model
MOU	Memorandum of Understanding
MSE	Materials, Supplies, and Equipment
MSGBWM	Main San Gabriel Basin Watermaster
MWD	Metropolitan Water District of Southern California

N

N/A	Not Applicable
NCWUP	Non-Consumptive Water Use Permit
ND	Negative Declaration
NEPA	National Environmental Policy Act
NGWA	National Groundwater Association
NGWN	National Groundwater Monitoring Network
NPV	Net Present Value
NSGIS	NorthSouth Geographic Information System

O

O&M	Operation and Maintenance
OA	Owner's Agent
OBEs	Other Business Enterprises
OCWD	Orange County Water District
OE	Owner's Engineers
OPEB	Other Post-Employment Benefits

P

PCE	Perchloroethylene Pollution
PEIR	Programmatic Environmental Impact Report
PFAS	Polyfluoroalkyl Substances
PFOA	Perfluorooctanoic Acid
PFOS	Perfluorooctanesulfonic Acid

Q

QA	Quality Assurance
QC	Quality Control

R

RA	Replenishment Assessment
RBWRP	Regional Brackish Water Reclamation Program
R&M	Repairs & Maintenance
RF	Replenishment Fund
RFB	Request for Bid
RFP	Request for Proposal
RFQ	Request for Quote
RGMP	Regional Groundwater Monitoring Program
RGWMR	Regional Groundwater Monitoring Report
RHSG	Rio Hondo Spreading Grounds
RO	Reverse-osmosis
RTS	Readiness-to-Serve
RW	Recycled Water
RWQCB	LA California Regional Water Quality Control Board – Los Angeles

S

SAT	Soil Aquifer Treatment
SBEs	Small Business Enterprises
SCADA	Supervisory Control and Data Acquisition
SCWC	Southern California Water Committee
SDLAC	Sanitation Districts of Los Angeles County
SDWP	Safe Drinking Water Program

SGCBSG	San Gabriel Coastal Basin Spreading Grounds
SGMA	Sustainable Groundwater Management Act
SGSG	San Gabriel Spreading Grounds
SGRWM	San Gabriel River Watermaster
SJC	San Jose Creek
SJCWRP	San Jose Creek Water Reclamation Plant
SMBGSA	Santa Monica Basin Groundwater Sustainability Agency
SRF	State Revolving Fund
SWP	State Water Project
SWRCB	State Water Resources Control Board

T

TAC	Technical Advisory Committee
TBD	To be determined
TCE	Trichloroethylene
TDS	Total Dissolved Solids
TITP	Terminal Island Treatment Plant
TIWRP	Terminal Island Water Reclamation Plant
TOC	Total organic compounds

U

UAL	Unfunded Accrued Liability
UCMR	Unregulated Contaminant Monitoring Rule
UPS	Uninterruptible Power Supply
USACE	U.S. Army Corps of Engineers
USBR	United States Bureau of Reclamation
USEPA	United States Environmental Protection Agency
USFW	United States Fish & Wildlife
USGS	United States Geological Survey
UV	Ultraviolet

V

VOC	Volatile organic compound

W

WAS	Water Augmentation Study
WBMWD	West Basin Municipal Water District
WCBBP	West Coast Basin Barrier Project
WCS	Water Compliance Solutions
WDR	Waste Discharge Requirement
WEF	Water Education Foundation
WET	Water Education for Teachers
WE&T	Water Environment & Technology
WEFTEC	Water Environment Federation Technical Exhibition and Conference
WIN	Water Independence Now Program
WN	Whittier Narrows
WNOU	Whittier Narrows Operable Unit
WRD	Water Replenishment District of Southern California
WRP	Water Reclamation Plant
WWTS	Wastewater Treatment Surcharge
WY	Water Year

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For this budget and other financial reports, please refer to:

https://www.wrd.org/reports

For upcoming meetings of Board of Directors regarding budget activities, please refer to:

https://agendas.wrd.org/OnBaseAgendaOnline