

LAS VIRGENES MUNICIPAL WATER DISTRICT Westlake Village Community Meeting Room 31200 Oak Crest Drive Westlake Village, CA 91361

AGENDA LVMWD BOARD OF DIRECTORS - SPECIAL MEETING TUESDAY, FEBRUARY 13, 2024 – 9:00 AM

PUBLIC PARTICIPATION: The public may join this meeting virtually or attend in person in the Board Room. Teleconference participants will be muted until recognized at the appropriate time by the Board President. To join via teleconference, please use the following Webinar ID:

Webinar ID: https://us06web.zoom.us/j/88293462879

To join by telephone, please dial (669) 900-6833 or (346) 248-7799 and enter Webinar ID:

882 9346 2879

For members of the public wishing to address the Board during Public Comment or during a specific agenda item, please press "Raise Hand" if you are joining via computer; or press *9 if you are joining via phone; or inform the Executive Assistant/Clerk of the Board if attending in person.

Members of the public can also access and request to speak at meetings live on-line, with audio and limited video, at www.lvmwd.com/livestream. To ensure distribution of the agenda, please submit comments 24 hours prior to the day of the meeting. Those comments, as well as any comments received during the meeting, will be distributed to the members of the Board of Directors and will be made part of the official public record of the meeting. Contact Josie Guzman, Executive Assistance/Clerk of the Board, at (818) 251-2123 or jguzman@lvmwd.com with any questions.

ACCESSIBILITY: If requested, the agenda and backup materials will be made available in appropriate alternative formats to persons with a disability, as required by Section 202 of the Americans with Disabilities Act of 1990 (42 U.S.C. Sec. 12132), and the federal rules and regulations adopted in the implementation thereof. Any person who requires a disability-related modification or accommodation, to attend or participate in this meeting, including auxiliary aids or services, may request such reasonable modification or accommodation by contacting the Executive Assistant/Clerk of the Board by telephone at (818) 251-2123 or via email to jguzman@lvmwd.com at least 48 hours prior to the meeting.

Members of the public wishing to address the Board of Directors are advised that a statement of Public Comment Protocols is available from the Clerk of the Board. Prior to speaking, each speaker is asked to review these protocols, complete a speakers' card, and hand it to the Clerk of the Board. Speakers will be recognized in the order the cards are received. A live webcast of the meeting will be available at LVMWD.com. Also, a web-based version of the speaker card is available for those who would like to submit written comments electronically or request to make public comment by telephone during the meeting.

The Public Comments agenda item is presented to allow the public to address the Board on matters not on the agenda. The public may also present comments on matters on the agenda; speakers for agendized items will be recognized at the time the item is called up for discussion.

Materials prepared by the District in connection with the subject matter on the agenda are available for public inspection at 4232 Las Virgenes Road, Calabasas, CA 91302. Materials prepared by the District and distributed to the Board during this meeting are available for public inspection at the meeting or as soon thereafter as possible. Materials presented to the Board by the public will be maintained as part of the records of these proceedings and are available upon request to the Clerk of the Board.

PLEDGE OF ALLEGIANCE

- 1. CALL TO ORDER AND ROLL CALL
- 2. APPROVAL OF AGENDA
- 3. PUBLIC COMMENTS

Members of the public may now address the Board of Directors **ON MATTERS NOT APPEARING ON THE AGENDA**, but within the jurisdiction of the Board. No action shall be taken on any matter not appearing on the agenda unless authorized by Subdivision (b) of Government Code Section 54954.2

4. WELCOME AND INTRODUCTIONS

5. STRATEGIC PLAN: REVIEW AND CONTEXT FOR PLANNING (Pg. 4)

6. UPDATE ON 2023 PERFORMANCE MEASURES AND <u>ACCOMPLISHMENTS</u> (Pg. 7)

7. PROPOSED FISCAL YEARS 2024-26 PRIORITIES (Pg. 30)

8. GROUP DISCUSSION: FISCAL YEARS 2024-26 PRIORITIES

9. WRAP-UP AND NEXT STEPS

10. ADJOURNMENT

Pursuant to Section 202 of the Americans with Disabilities Act of 1990 (42 U.S.C. Sec. 12132), and applicable federal rules and regulations, requests for a disability-related modification or accommodation, including auxiliary aids or services, in order to attend or participate in a meeting, should be made to the Executive Assistant/Clerk of the Board in advance of the meeting to ensure availability of the requested service or accommodation. Notices, agendas, and public documents related to the Board meetings can be made available in appropriate alternative format upon request.

BUSINESS VALUES

The following business values describe the commitments LVMWD makes to its customers:



KEY STANDARDS

The table below, followed by narrative descriptions, puts the business values in context with key standards.

High Level of Customer SatisfactionAccurate and Timely Water Use Data and BillingEasy to Pay Bill, View Water Usage in Near Real-TimeSolve ProblemsEmploy Technology to Improve ServicesSolicit Feedback and Meet Customer Expectations	Transparency and Community Engagement Understandable Operations, Decisions, Financials Cooper- ative Relationships with Customers, Community Promote Water Education Programs Engage in Local, Governmental, Industry Affairs Ensure Customers and Stakeholders are Well-Informed
Highly Effective Workforce Hire, Promote, and Retain Qualified Employees Provide Competitive Compensation and Benefits Develop Employee Skills, Competencies, Leadership Focus on Knowledge Transfer and Succession Planning	Safe, High-Quality Water Meet or Exceed Drinking Water Standards Anticipate Future Regulations, Standards Meet Customer Needs for Quality, Consistency Timely Communication of Water Quality Information
Protection of Public Health and EnvironmentMeet or Exceed Environmental Regulations Safe andReliable Wastewater ServicesEffective Watershed Leader and Environmental StewardSupport Economical Greenhouse Gas Reductions	Maximum Reuse and Resource Recovery Maximize Beneficial Use of Recycled Water Maximize Compost Use and Cogeneration Capacity Advocate for Science-Based Regulations
Sound Financial Management Fiscally Conservative, High-Liquidity Investments High Credit Ratings Prudent Capital and Operating Reserves Timely and Accurate Financial Reporting	Reliable Water Supplies and ServiceMeet Current and Future DemandsPromote, Encourage, and Support Efficient Water Use LowRisk of a Sustained Water ShortageDiverse Portfolio, Resilient to Climate ChangeComprehensive Maintenance and Replacement Programs
Sound Planning and Appropriate Investment Rates Cover Full Cost of Service Long-Term View, Appropriate CIP Funding Make Compelling Cases for Investment, Rates Well-Prepared for Emergencies	Innovative and Efficient Operations Invest in Efficiency Improvements Reduce Costs while Preserving Key Service Standards Use Proven Technologies to Increase Efficiency Systematic Approach to Enhance Efficiency

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High Level of Customer Satisfaction

LVMWD endeavors to maintain a high level of customer satisfaction through responsive and professional service. When calling during business hours, customers can count on their calls being answered by the appropriate person, without unreasonable wait-times and excessive "button pushing" associated with an automated phone system. Employees are empowered to solve customer problems or escalate them to the appropriate manager. After hours, employees are available 24/7 to respond to outages and other emergencies.

Transparency and Community Engagement

LVMWD is committed to providing easy access to important information on its finances, operations and decision-making process. Openly sharing information builds public trust and ensures accountability. Further, LVMWD maintains an active role in the communities it serves, engages those affected by its activities and values customer feedback, and and ensure customers, city officials, and other stakeholders. are wellinformed of District programs and initiatives.

Highly Effective Workforce

A highly effective workforce is LVMWD's most valuable resource. Fulfilling LVMWD's promises to its customers depends on hiring, promoting and retaining the most qualified employees. LVMWD meets its workforce objectives by offering competitive compensation, providing opportunities for professional growth and leadership, and fostering a collaborative work environment.

Safe, High Quality Water

LVMWD takes its responsibility very seriously to provide customers with safe, high quality water. Maintaining the trust of customers depends on serving water that meets or exceeds drinking water standards. Information on the quality of LVMWD's water is provided to customers annually. Additionally, customers are notified in advance when a change in water source may affect the taste or odor of their drinking water. LVMWD responds quickly to water quality-related concerns.

Protection of Public Health and the Environment

Protecting public health and the environment is central to all aspects of LVMWD's business, from supplying safe drinking water to preventing sanitary sewer overflows. LVMWD is diligent in meeting or exceeding the many environmental regulations applicable to its operations.

Further, LVMWD is a watershed leader and environmental steward, recognizing the need to protect the valuable natural resources that make its service area unique. LVWMD is committed to maintaining facilities that complement the natural beauty and ecology of the service area by maintaining attractive, water efficient landscaping at District facilities. Landscapes serve several purposes including the enhancement of facility aesthetics, screening facilities from public view or blending facilities in with the natural environment. As part of this commitment the District will also minimize the amount of erosion and stormwater runoff from facilities. Facility landscaping is to be non-invasive, droughttolerant and climate-appropriate with an emphasis on native plants in order to mimic the surrounding environment and minimize watering requirements. The utilization of harmful chemicals to manage weeds or fertilize vegetation and the use of rodenticides for pest control will be minimized.

Maximum Reuse and Resource Recovery

Maximizing the beneficial reuse of recycled water is critical to improve LVMWD's water supply reliability and support efforts to stop discharging to Malibu Creek. Water is too valuable to use only once. Also, LVMWD is committed to recover additional resources from its treatment processes. For example, additional biogas could be recovered and used to generate energy by accepting fats, oils and grease for digestion at the Rancho Las Virgenes Composting Facility.

Sound Financial Management

LVMWD manages its finances to provide customers with value through reliable, high-quality service at competitive rates. Sufficient reserves are maintained to support operations, maintain high credit ratings and avoid large, unexpected rate increases. LVMWD maintains a conservative and liquid investment portfolio. Additionally, LVMWD seeks available grant funding to leverage its use of local funds for infrastructure improvements. Finally, LVMWD is dedicated to accurate, understandable and timely financial reporting.

Reliable Water Supplies and Service

Customers can expect LVMWD to provide reliable water supplies and service. LVMWD plans and invests appropriately to ensure a very low risk of a sustained water shortage. Water delivery and treatment facilities are wellmaintained and rehabilitated/replaced, as necessary, to minimize the potential for failures that could temporarily interrupt service. Further, LVMWD promotes efficient water use, eliminating wasteful practices and stretching supplies further. Finally, LVMWD seeks to diversify its water supply portfolio, recognizing uncertainty associated with the future availability of water supplies and the potential impacts of climate change.

Sound Planning and Appropriate Investment

The foundation for reliable water and wastewater services is sound planning. LVMWD focuses on the long-term, anticipating future needs and making the appropriate investments to address those needs. Planning efforts support LVMWD in making compelling business cases for investments. LVMWD sets rates to recover the full cost of service, including investments to replace or upgrade aging infrastructure. Also, LVMWD recognizes the importance of reliable water service to public safety, particularly for firefighting. LVMWD is well-prepared for emergencies, including fires, floods and earthquakes.

Innovative and Efficient Operations

LVMWD is committed to innovative and efficient operations. Investments are made in efficiency improvements with a focus on reducing costs while maintaining key service standards. Efficiency improvements are sought through innovation and the use of proven technologies. Also, a systematic approach, utilizing suggestions from employees, supports efficiency enhancements.

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DATE: February 13, 2024

TO: Board of Directors

FROM: Finance and Administration

SUBJECT: Fiscal Years 2022-24 Departmental Goals and Performance Measures

SUMMARY:

As part of each biennial budget, the Board reviews Departmental Goals and Performance Measures that highlight the District's efforts to accomplish its strategic objectives as outlined in the Strategic Plan.

FINANCIAL IMPACT:

There is no financial impact associated with this report.

DISCUSSION:

The Strategic Plan describes the District's strategy to address the opportunities, challenges and needed investment likely to arise over the next 20 years. The plan provides the basis for making decisions on the allocation of resources to ensure consistent direction moving forward. Strategic Objectives constitute the major undertakings planned for the next five years.

Departmental goals and performance measures are created to support implementation of the Strategic Plan and to highlight key priorities and goals for each Department and the District as a whole. Departmental goals and performance measures are reviewed annually to determine progress in achieving the District's Strategic Objectives.

GOALS:

Ensure Effective Utilization of the Public's Assets and Money

Prepared by: Debbie Rosales, Financial Analyst II

ATTACHMENTS:

FY2022-2024 Performance Measure Updates.pdf Performance Measures and Accomplishments.pdf

Strategic Alignment Department Activities & Performance Measures Engineering and External Affairs

Customer Service

Goal - Keep customers, city officials and other stakeholders well-informed and provide new/improved customer tools to enhance service delivery.

Provide excellent service by keeping customers and stakeholders well informed, providing new and improved tools, providing timely and accurate billings, and being responsive to their needs.

Performance Measure	FY2023 Proposed	FY2023 Actual	FY2024 Proposed	FY2024 Projected
Maximize customer registration with WaterSmart portal (percent registered)	30%	38%	50%	50%
Maximize customer registration with AutoPay and e-Bills (percent registered)	50%	55%	55%	55%
Maintain a past due balance below \$350,000 via shut-offs and/or the utilization of restriction devices. (percent at or below dollar threshold)	100%	100%	100%	100%
Inspect 100% of meter vaults annually, inspect/repair 33% (1/3) of service pressure regularors annually, inspect/repair 20% of meter boxes annually. (percent achievement; all categories)	100%	100%	100%	100%
Create and conduct a customer satisfaction survey bi-annually (100% complete every other year).	0%	100%	100%	100%
Inspect and test 100% of backflow prevention devices annually.	100%	100%	100%	100%
Conduct 300 irrigated area budget reviews annually.	100%	100%	100%	100%
Achieve a positive rating from the customer survey of at least 3/5 for timely and accurate billings	n/a	3	3	3
Achieve a positive rating from the customer survey of at least 3/5 for customer service staff being courteous and knowledgeable in their interactions with customers and responsive to customer inquiries.	n/a	3	3	3

Public Information

Goal - Keep customers, city officials and other stakeholders well-informed and provide new/improved customer tools to

Provide excellent service by keeping customers and stakeholders well informed, providing new and improved tools, providing timely and accurate billings, and being responsive to their needs.

Performance Measure	FY2023 Proposed	FY2023 Actual	FY2024 Proposed	FY2024 Projected
Perform public outreach to customers and stakeholders on drought messaging and other important initatives and receive a positive rating of at least 3/5 on being well informed based on the customer satisfaction survey.	n/a	3	3	3
Provide tours of the Pure Water Project Las Virgenes - Triunfo Demonstration Facility and other District/JPA facilities (at least 24 annually) to the public, schools, elected officials, industry personnel, and community leaders.	12	65	24	24

Strategic Alignment Department Activities & Performance Measures Engineering and External Affairs

Conservation

Goal - Support Customers to Meet Water Use Efficiency Standards

Achieve State mandated water use standards at the District level by the year 2027 (AB 1668/SB606) and minimize the amount of non-efficient use of water by customers.

Performance Measure	FY2023 Proposed	FY2023 Actual	FY2024 Proposed	FY2024 Projected
Reduce water consumption (both drinking and recycled water) by 20% compared to 2020 (% reduction)	20%	20%	20%	20%
Reduce wasteful water use by at least 80% by 2027 as compared to 2020 (% reductions annually)	30%	30%	50%	50%
Achieve and maintain monthly average of 85% of customers within water budget (average monthly % of customers within water budget)	60%	70%	85%	85%

Goal - Eliminate the Discharge of Pollutants to Malibu Creek and Preserve the Beauty of the Watershed

Maintain water efficient and aesthetic landscaping that maximizes ecosystem benefits at all District facilities.

Performance Measure	FY2023 Proposed	FY2023 Actual	FY2024 Proposed	FY2024 Projected
Maintain highly efficient water use landscaping and irrigation practices at District facilities. (monthly average % within water budget)	100%	100%	100%	100%
Reduce the size of turf and other inefficient landscaping at District facilities (% reduction)	0%	25%	50%	50%
Implement landscape changes at Westlake Filter Plant Ops Building, Equestrian Tank, Rancho Composting Admin Building, Tapia to reduce turf, maximize native plantings (% complete)	50%	50%	75%	75%
Develop and implement plan for erosion control on slopes around Headquarters facilities. Complete by installations by July 1, 2024. (% complete)	50%	25%	100%	100%
Develop plan and complete rehabilitation of planters and subsurface waterproofing in front patio area at entrance to headquarters. (% complete)	20%	20%	100%	100%
Develop long-term landuse plan for District Sprayfields. (% complete)	20%	10%	50%	50%

Goal - Reduce LVMWD's Carbon Footprint

Complete the development and participate in the implementation of a Climate Action Plan and other energy conservation initiatives in collaboration with the Facilities and Operations Department

Performance Measure	FY2023	FY2023	FY2024	FY2024
	Proposed	Actual	Proposed	Projected
Complete hiring process for contractor and complete Climate Action Plan. (% complete)	100%	80%	100%	100%

Strategic Alignment Department Activities & Performance Measures Engineering and External Affairs

Engineering

Goal - Improve LVMWD's Water Supply Reliability

Diversify the District's water supply portfolio via completion of the Pure Water Project; repair, replace or improve the water, wastewater and recycle water infastructure to maintain reliable, high quality, and efficient service 24 hours a day and 365 days a year.

Performance Measure	FY2023 Proposed	FY2023 Projected	FY2024 Proposed	FY2024 Proposed
Complete and adopt the EIR for Pure Water Project and initiate initiate design/build services by July 1, 2023. Progress design to at least 50% completion level by July 1, 2024.	100%	100%	100%	100%
Complete sewer pipe assessment study and replacement plan	50%	0%	100%	100%
Complete water pipe assessment study and replacement plan	50%	0%	100%	100%
Execute and substantially complete or progress with multi-year projects and programs at least 70% of the planned, budgeted and active projects being managed by the Engineering division as scheduled in the IIP/CIP on an annual basis.	100%	45%	70%	70%

* n/a represents new performance measures - no data available

Strategic Alignment Department Activities & Performance Measures Facilities and Operations

F&O Administration

Goal - Highly Effective Workforce

Maintain appropriate staffing levels across all operating divisions within the Facilities and Operations department.

Performance Measure	FY2023 Proposed	FY2023 Actual	FY2024 Proposed	FY2024 Projected
Implement cross training between tapia and rancho along with adding of two one thousand hour Operate -in-training positions (positions cross-trained)	6	2	6	6
Provide staff training on the technology used to provide Pure Water. This will allow staff to better educate the public. (number of training events)	2	2	2	2
Continue demonstration facility cross training with all District staff to ensure improved skills and knowledge of leading technologies.	4	4	4	4

Goal -Innovations and Efficient Operations

Explore opportunities for enhancing energy efficient across all district enterprises to achieve cost savings (avoided costs) and to reduce carbon footprint.

Performance Measure	FY2023	FY2023	FY2024	FY2024
	Proposed	Actual	Proposed	Projected
Implementation of energy efficiency projects such as Recycled Water pump station battery Storage project, and solar project /battery Storage project at Rancho. Perform additional study to identify future energy efficiency projects based on latest CPUC rules.	1	1	1	1

Facilities

Goal - Protection of Public Health and Environment

Operate district facilities to provide reliable services and achieve regulatory compliance.

Performance Measure	FY2023	FY2023	FY2024	FY2024
	Proposed	Actual	Proposed	Projected
Assess equipment for replacement and repair based on maintenance cost records or useful life cycles.	5	6	5	5

Goal - Sound Planning and Appropriate Investment

Maintain district assets with an emphasis on maximizing facilities equipment lifecycle cost, reliability, and cost saving

Performance Measure	FY2023 Proposed	FY2023 Actual	FY2024 Proposed	FY2024 Projected
Perform timely equipment preventive maintenance and use Upkeep maintenance management system to track work order and record keeping.	Yes	Yes	Yes	Yes
Clean and videotape a minimum of 20% of sanitary sewer. Identify any areas needing repair and budget accordingly.	11 miles	11 miles	11 miles	11 miles

Strategic Alignment Department Activities & Performance Measures Facilities and Operations

Water Operations

Goal - Sound Planning and Appropriate Investment

Maintain district assets with an emphasis on maximizing facilities equipment lifecycle cost, reliability, and cost saving

Performance Measure	FY2023	FY2023	FY2024	FY2024
	Proposed	Actual	Proposed	Projected
Continue operations and maintenace of the demonstration facility to ensure readiness for public tours.	Yes	Yes	Yes	Yes

Goal -Innovations and Efficient Operatons

Explore opportunities for enhancing energy efficient aross all district enterprises to achieve cost savings (avoided costs) and to reduce carbon footprint.

Performance Measure	FY2023	FY2023	FY2024	FY2024
	Proposed	Actual	Proposed	Projected
Implement smart devices and/or artificial intelligence to monitor system processes for high performance. Continue artifical intelligence grant work to reduce chemical and energy costs.	1	1	1	1

Reclamation Operations

Goal - Protection of Public Health and Environment

Operate district facilities to provide reliable services and achieve regulatory compliance.

Performance Measure	FY2023 Proposed	FY2023 Actual	FY2024 Proposed	FY2024 Projected
Minimize exceedances to the various permits conditions for Tapia and	Yes	Yes	Yes	Yes
Rancho include NPDES (N and P), and Sanitary Sewer Overflow.	Tes	Tes	res	res

Goal - Innovative and Efficient Operations / Protection of Health and Environment

Obtain favorable National Pollution Discharge Elimination System (NPDES) permit that satisfies environmental and regulatory requirements while protecting ratepayers from excessive compliance costs.

Performance Measure	FY2023	FY2023	FY2024	FY2024
	Proposed	Projected	Proposed	Proposed
Request and obtain regulatory approved and favorable NPDES permit conditions that would reduce operating cost while achieve the protection of the environment.	Yes	Yes	Yes	Yes

Strategic Alignment Department Activities & Performance Measures Finance and Administration

Finance Administration

Goal - Sound Planning and Appropriate Investment

Effectively administer the stewardship of public resources through responsible fiscal management and planning by achieving optimal rate of return on investments.

Performance Measure	FY2023 Proposed	FY2023 Actual	FY2024 Proposed	FY2024 Projected
Rate of return on portfolio				
(measures performance to benchmarks)	100%	100%	100%	100%
Present annual review of the Investment Policy	Yes	Yes	Yes	Yes

Goal - Sound Financial Management

Complete risk assessment of agency-wide internal processes to insure proper internal controls are in place to protect public assets.

Performance Measure	FY2023	FY2023	FY2024	FY2024
	Proposed	Actual*	Proposed	Projected
Number of Internal Audits Completed	5	0	2	2

*Outside consultant hired - performed initial risk assessment.

Finance and Accounting

Goal - Sound Financial Management

Prepare the highest quality of budget and financial reporting documents that provide accountability and transparency and go beyond the minimum requirements of best practices and generally accepted accounting principles.

Performance Measure	FY2023	FY2023	FY2024	FY2024
	Proposed	Actual	Proposed	Projected
Receive GFOA Certificate of Achievement for Excellence in	Receive	Received	Receive	Receive
Financial Reporting	Award	Award	Award	Award
Receive GFOA Distringuished Budget Presentation Award	Receive	Received	Receive	Receive
	Award	Award	Award	Award

Goal - Sound Financial Management

Provide information necessary for Board to make strategic decisions related to the financial position of the Agency.

Performance Measure	FY2023	FY2023	FY2024	FY2024
	Proposed	Actual	Proposed	Projected
Timely closing of month/fiscal year accounting records by the 10th business day of the month.	11 mos.	11 mos.	11mos.	11mos.

Strategic Alignment Department Activities & Performance Measures Finance and Administration

Goal - Highly Effective Workforce

Review and update policies and procedures to strengthen internal controls and foster an environment of continuous improvement.

Performance Measure	FY2023	FY2023	FY2024	FY2024
	Proposed	Actual	Proposed	Projected
Updated Policies & Procedures				
(number of policies)	4	4	5	5
Cross train key tasks and functions within the Accounting				
Division	5	5	5	5
Automate processes using ERP system				
(number of processes)	2	2	2	2

Human Resources

Goal - Highly Effective Workforce

Develop and enhance recruitment, selection, and retention strategies to attract, recruit, and retain a highly effective and diverse workforce.

Performance Measure	FY2023 Proposed	FY2023 Actual	FY2024 Proposed	FY2024 Projected
Develop quality and diversity of applicant pools (number of failed recruitments)	0	0	0	0
Administer two new hire surveys within first six months of employment and annual survey of all others	Yes	Yes	Yes	Yes
Minimize percentage of non-retirement voluntary turnover	<5%	4.03%	<5%	<5%

Goal - Highly Effective Workforce

Increase competency among supervisory staff and expand development opportunities for growth to non-supervisory staff.

Performance Measure	FY2023	FY2023	FY2024	FY2024
	Proposed	Actual	Proposed	Projected
Administer one new supervisor training for completion withit first six months of assuming position; annual for current supervisors.	Yes	No	Yes	Yes
Provide cross-training, interim appointments, career paths, and internal promotion opportunities.	Yes	Yes	Yes	Yes

Goal - Highly Effective Workforce

Increase the effectiveness of performance evaluation process.

Performance Measure	FY2023	FY2023	FY2024	FY2024
	Proposed	Actual	Proposed	Projected
Reduce the number of delinquent performance appraisals (Percent of appraisals overdue by over two weeks)	<5%	10%	<5%	<5%

Strategic Alignment Department Activities & Performance Measures Finance and Administration

Information Systems

Goal - Sound Financial Management

Increase awareness and reliability on District security Systems.

Performance Measure	FY2023	FY2023	FY2024	FY2024
	Proposed	Actual	Proposed	Projected
Number of clicks on phishing/smshing tests	<7	<6	<6	<6

Goal - Innovative and Efficient Operations

Increase accessibility, reliability, and redundancy by using bloud-based services and mobile applications.

Performance Measure	FY2023	FY2023	FY2024	FY2024
	Proposed	Actual	Proposed	Projected
Percentage of systems hosted within cloud-based platforms	60%	60%	60%	60%

Goal - Highly Effective Workforce

Provide staff with tools, information, and data needed to facilitate service delivery through Information

Performance Measure	FY2023	FY2023	FY2024	FY2024
	Proposed	Actual	Proposed	Projected
Number of requests submitted via the ITSM portal	550	1475	550	1500

Performance Measures and Accomplishments

Strategic Planning February 13, 2024



Las Virgenes Municipal Water District www.LVMWD.com

Engineering and External Affairs – Administration

Completion and Board adoption of the Climate Action and Adaptation Plan (CAAP).

EXTREME HEAT Extreme heat is expected to increase in frequency and severity in LVMWD's service area. Extreme heat days are expected to increase up to 34 days by the end of the century. DROUGHT FLOODING AND LVMWD's service area and imported **EXTREME STORMS** CLIMATE water supplies are projected to endure Climate change may cause low-lying future prolonged drought conditions areas and exposed property throughout and increasing seasonal dryness. CHANGE LVMWD's service area to experience more frequent flooding, Atmospheric IMPACTS river events are expected to increase in severity and frequency. ON LVMWD LANDSLIDES The susceptibility of LVMWD's service area to landslides is projected to increase as WILDFIRE precipitation variability increases and wildfires Wildfire risk is projected to increase through increase in frequency, size, and severity the end of the century with more days of extreme wildfire risk and increased wildfire occurrence.

Significance

- Provides a roadmap for reducing greenhouse gas emissions in alignment with State goals and guidance for increasing the resilience of critical facilities, infrastructure, services, and resources to climate change impacts.
- Positions the JPA and District to compete for certain grants and loans including SRF for the Pure Water Project.

Business Value

Protection of Public Health and the Environment, Maximum Reuse and Resource Recovery, and Reliable Water Supplies and Service



Engineering and External Affairs - Conservation

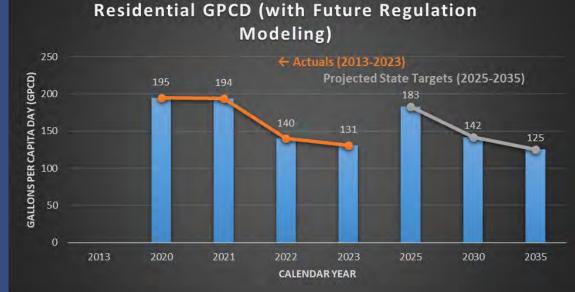
Through on-going conservation messaging, implementation of several water-saving programs, and launching of the Landscape Transformation Program, the District achieved 30% overall potable water conservation in 2023 compared to 2020 (33% reduction in residential use).

Significance

- Indicates customers are not rebounding to pre-drought usage and demonstrates significant progress towards the District's conservation goals.
- Data suggests District's residential customers are close to meeting the new indoor and proposed outdoor water use standards for 2035.

Business Value

Highly Effective Workforce and Reliable Water Supplies and Service





Engineering and External Affairs – Legislative Affairs

Expanding the legislative reach of the District through developing and maintaining strong key relationships with elected officials and their staff on the Federal, State, County and City levels.

Significance

 Leveraged relationships with our State Senator and Assemblymember to submit a budget earmark request of \$10 million to help fund the Pure Water Project.

Business Value

Transparency and Community Engagement and Sound Financial Management

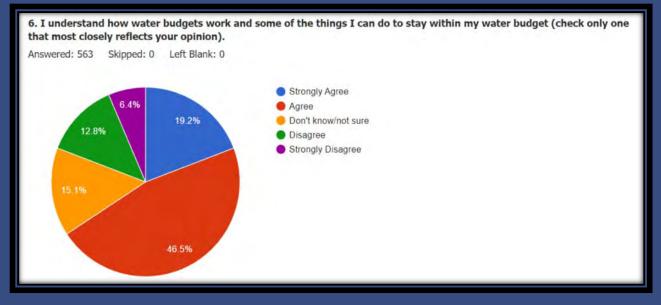




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Engineering and External Affairs – Customer Service

Conducted a customer experience survey to evaluate if customers were satisfied with the level of service they were receiving when interacting with the District, if they understand their bills, whether they know how budgets work, and several other questions.



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MUNICIPAL EST. 1658

Significance

- The District received a rating of 3.6 out of 5 for overall customer service satisfaction.
- The majority of customers agreed that District staff is courteous, knowledgeable, and responsive.
- Most customers understand their water/sewer bills and how water budgets work.

Business Value High Level of Customer Satisfaction



Engineering and External Affairs Engineering & Technical Services

Completed the procurement, selection and negotiation process for the progressive design-build team for the Pure Water Project.

Significance

- Maintains schedule to ensure regulatory compliance and minimize costs to the JPA and ratepayers.
- Project's advancement positions the JPA to maximize finance and funding strategies (WIFIA, SRF, Title 16, LRP).

Business Value

Protection of Public Health and the Environment, Maximum Reuse and Resource Recovery, and Reliable Water Supplies and Service





Las Virgenes Municipal Water District www.LVMWD.com

Engineering and External Affairs – Public Affairs

Established and implemented a successful podcast called "Full Circle Podcast." To date, the podcast episodes have been viewed over 3,400 times with over 8,700 impressions across multiple social media platforms.



The studio was built and created in-house by staff and all programming was executed by LVMWD public affairs team members.

Significance

- The podcast series highlights the breadth of ingenuity, thought, technology, and need of the Pure Water Project Las Virgenes Triunfo to the region.
- Each episode deep dives into the intricacies of the who, what, when, where, and why the District is implementing this project.

Business Value

Protection of Public Health and Environment, Transparency and Community Engagement, Maximum Reuse and Resource Recovery, Sound Planning and Appropriate Investment, Highly Effective Workforce, Innovative and Efficient Operations, and Reliable Water Supplies and Service.



Facilities and Operations – Facilities Maintenance

Through better planning and technology, we minimized the financial risk as well as the public health and the environment.



Significance

- Contracting with multiple specialty contractors available 24/7 allows for faster response and less impact across all our divisions of the District.
- Benefits of these contracts are, they help limit any environmental impact that might be caused by a sewer failure. These environmental incidents can incur hefty penalties and years of litigation.

Business Value

This supports the business value of protection of Public Health and the Environment

Facilities and Operations – Water Systems

Completion of five-year annual sanitary survey conducted by the Division of Drinking Water (DDW) for Westlake Filtration Facility and the Potable Distribution System.

Significance

• This is a significant accomplish for Operations staff indicating the hard work and dedication to ensure District facilities meet and exceed drinking water standards.

Business Value – Safe, High-Quality Water





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Facilities and Operations – Reclamation

Construction completion of the Tapia WRF TMDL Summer Compliance Project; The treatment process was started and tested in December.

Significance

 Regulatory changes set forth in the 2017 NPDES permit lowered limits for Total N and P; Tapia effluent could no longer meet these limits; therefore the solution is breakpoint chlorination of potable water to discharge for creek flow augmentation during summer months. With this process in place, Tapia will treat potable water by hyper-chlorinating potable water to remove ammonia (oxidized into nitrogen gas), followed by dichlorination to supplement the creek for NPDES permit compliance to maintain the creek above 2.5 cfs.

Business Value Protection of Public Health and the Environment





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Finance and Administration – Administration

Complete initial assessment of the District's policies and procedures that establish and ensure proper internal controls.



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Significance

- Maintaining proper internal controls is an essential element of effective District operations. The controls are intended to safeguard the District's assets, ensure appropriate separation of duties and reduce the risk of fraud.
- The primary focus of the proposed internal audit program is to ensure that the District is establishing, monitoring and implementing controls that mitigate risk to the District and follow industry best practices

Business Value Ensure Effective Utilization of the Public's Assets and Money

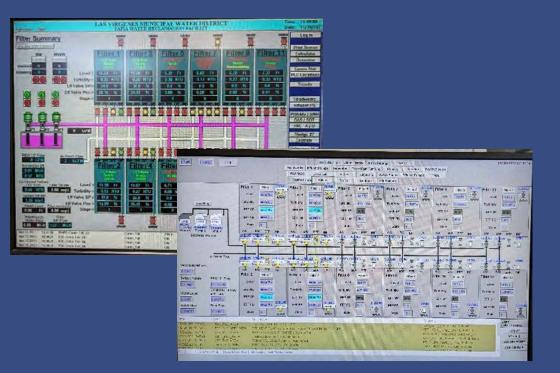
Finance and Administration – Information Systems

Comprehensive upgrade of 55 SCADA controls (PLCs), reprogramming of processes, and upgrade of the network at the District's Tapia Water Reclamation Facility including in-depth review of existing processes along with Piping and Instrumentation Diagrams (P&IDs) and reprogramming the processes to meet established District PLC, SCADA, and Tag programming standards.

Significance

- Streamlined and Modernized Operational Technology (55 to 16 supported PLCs).
- People, Processes, and Technologies Melting Pot.

Business Value Innovative and Efficient Operations





Finance and Administration – Human Resources

Diversified advertising sources to cast a wider net of potential applicants due to the uptick in staff turnover while also concentrating resources towards enhancing employee engagement and fostering long-term retention.



Significance

- Administered over 22 recruitments that led to 19 new hires (15% of the organization), 9 promotions and 1 transfer.
- Implemented new hire surveys, revamped the existing Idea Committee, administered an employee engagement survey that resulted in the creation of an Employee Recognition Committee and launched a Lunch and Learn Program.

Business Value

Highly Effective Workforce & Innovative and Efficient Operations

Finance and Administration – Finance and Accounting

Implemented, for the first time, electronic payment processing for accounts payable disbursements.

Significance

- Eliminated the need to print and mail physical checks "in house" at District headquarters and instead opens the opportunity for vendors to receive their payments electronically using a virtual card payment, wire, or ACH.
- Electronic payment processing reduces the likelihood of fraud and strengthens the District's internal controls over payment disbursements.

Business Value Innovative and Efficient Operations





Las Virgenes Municipal Water District www.LVMWD.com



DATE: February 13, 2024

TO: Board of Directors

FROM: Engineering and External Affairs

SUBJECT: Proposed Water Supply Reliability and Diversification Study

SUMMARY:

The attached document outlines the proposed Water Supply Reliability and Diversification Study for the Board's consideration to pursue as part of the District's Strategic Planning efforts. Staff will be providing a presentation and will seek feedback from the Board.

Prepared by: Joe McDermott, Director of Engineering and External Affairs

ATTACHMENTS:

Water Supply Reliability and Diversification Study Staff Proposal.pdf

Water Supply Reliability and Diversification Study Staff Proposal

LVMWD Workshop - February 13, 2024

Purpose of Study: To identify and study water supply alternatives to diversify LVMWD's water supply portfolio for the purpose of providing a more reliable supply of water to customers in a cost-effective and environmentally sensitive manner during a variety of water supply conditions.

A diversified water supply portfolio is a strategy that involves using multiple sources of water to meet the water demands of a region. This approach provides several benefits, including:

- Improved water quality: Diversifying water sources can ensure a more reliable supply of clean water, reducing the risk of contamination from a single source¹.
- Increased resilience: Having multiple water sources can reduce the impact of droughts, natural disasters, or other disruptions to the water supply ¹.
- Reduced costs: Diversification can help reduce the cost of water supply by reducing the need for expensive infrastructure projects, such as large dams or pipelines ².
- Environmental benefits: Diversification can help reduce the environmental impact of water supply projects by reducing the need for large-scale infrastructure projects that can harm ecosystems ³.

Many water agencies in California and throughout the United States have implemented diversified water management strategies to supply enough reliable water to their customers. A water supply reliability and diversification plan or study could also be called by other names, such as

- Alternative water supply portfolio study/plan
- Water resources plan
- Water supply master plan
- Sustainable water supply assessment/plan
- One Water Plan

The City of San Diego developed a 2020 Supply Diversification Plan. Information resulting from this plan can be found at:

https://www.sdcwa.org/annualreport/2020/diversification-and-operation/2020-supply-reliability.php

https://www.sdcwa.org/sites/default/files/files/purified-water/purified-water-brochure.pdf

The San Francisco Public Utilities Commission just completed their Alternative Water Supply Plan, which can be located at:

https://sfpuc.org/about-us/policies-plans/alternative-water-supply-plan

The City of Santa Monica did a Sustainable Water Master Plan in 2014, updated in 2018. The Plan and can be located at:

https://www.santamonica.gov/Media/Users/smgov_5Calfredo_2Egonzalez/Water_Rate_ Files/City_of_Santa_Monica_SWMP_122018.pdf

Types of Supplies

Current, Planned and Potential Future Supply Enhancements

- State Water Project (status quo assuming no enhancements)
- Pure Water Project (in progress operational by 2030)
- Other:
 - MWD and/or State Investments
 - SWP Reliability
 - Delta Conveyance
 - Banking Program (Additional Groundwater Storage, AVEK)
 - Additional Surface Water Storage
 - Sepulveda Pass
 - East-West Conveyance
 - Potential Non-MWD Partnerships/Interconnections/Water Transfer Agreements
 - Calleguas (in-lieu or direct access to stored groundwater in the Oxnard Plane or desal operation)
 - District 29 (potential indirect access to a desal operation)
 - LADWP

Study Components

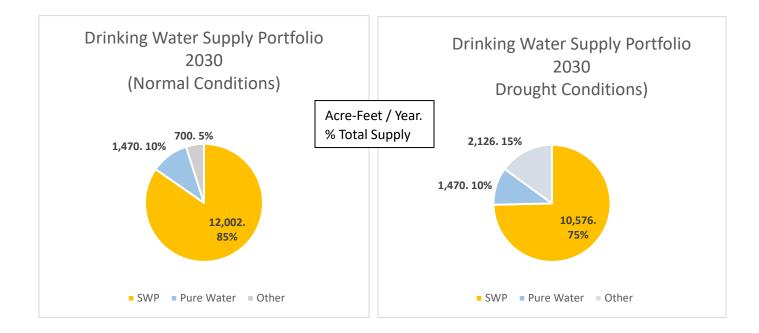
- Multiple water supply and demand scenarios
- Sensitivity analysis and variable supply portfolio based on water supply conditions (drought versus normal and water supply surplus years)
- Account for latest climate change predictions, LVMWD Climate Action and Adaptation Plan, etc.
- Range of costs and rate/bill impacts would be provided for alternative supply scenarios to help provide guidance on which supply projects/programs to pursue.
- Form a stakeholder group/task force comprised of the following: one city councilmember from each of the four cities, the General Manager, EEA Director,

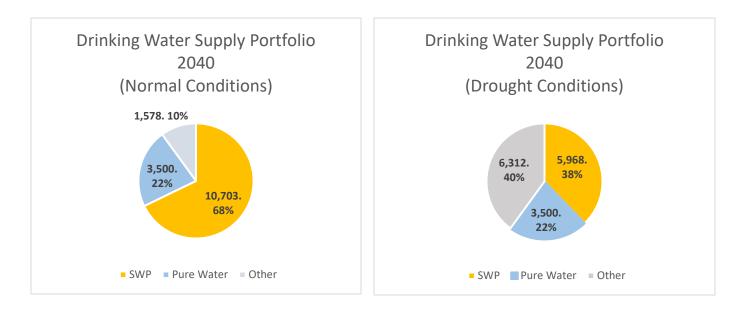
Finance Director, Operations Director, two LVMWD Boardmembers, two representatives of the environmental community (Coast Keeper, Surfrider, etc), one representative each from Conejo and Calabasas Chambers of Commerce, et al.

The study will help answer several questions, including:

- What is the optimal/most-feasible water supply portfolio near-term and longterm?
- To what degree should we rely on MWD for bolstering supply reliability versus local/non-MWD supply?
- To what extent are alternative supplies reliable?
- What are the realistic timelines for planning and implementing various alternative water supplies?
- How much will the optimal portfolio cost and what is the impact to the average customer's water bill?
- Will our customers be willing to support diversification and what are the cost limitations?

Below are example pie charts that would be developed and included in a final report as part of the study (illustrative purposes only) for near and long-term supply portfolios under different supply availability/hydrological conditions. The Study would primarily define the source and amount of water supply in the "other" category.





Cost and Schedule (Rough Estimate)

- Cost of Study: TBD \$200k-\$500k (depends on level of involvement from others such as Calleguas, District 29, the general public, etc.)
- Timeline: Commence in 2024 and complete in 2025

Other Benefits of a Study

The study will inform the next major update to the Strategic Plan, updates to the Water Master Plan and Urban Water Management Plans, future IIP/CIP Plans and rate studies.

Citations

- J.D. Solomon. Apr 24, 2023. <u>Why Diversifying Water Sources Provides Benefits and</u> <u>Challenges (jdsolomonsolutions.com)</u>. <u>https://www.jdsolomonsolutions.com/post/why-</u> <u>diversifying-water-sources-provides-benefits-and-challenges</u>. Accessed on January 3, 2024.
- <u>Ashok K. Sharma, Rodney A. Stewart, Thulo Ram Gurung</u>, Cara D. Bea June 21, 2016. <u>Investigating the Financial Implications and Viability of Diversified Water Supply Systems</u> in an Urban Water Supply Zone | Water Resources Management (springer.com). <u>https://link.springer.com/article/10.1007/s11269-016-1411-x</u>. Accessed on January 3, 2024.
- Natural Resources Defense Council. January 16, 2024. <u>Benefits of a Diversified Portfolio</u> <u>Approach to the Bay-Delta and Water Supply (PDF) (nrdc.org)</u>. <u>https://www.nrdc.org/sites/default/files/portfolio-based-bdcp-conceptual-alternativebenefits.pdf</u>. Accessed on January 3, 2024.



DATE: February 13, 2024

TO: Board of Directors

FROM: Engineering and External Affairs

SUBJECT: Comprehensive Water Conservation Plan: 2024 Update

SUMMARY:

The Comprehensive Water Conservation Plan (Plan) provides an update of LVMWD's conservation efforts since 2022 and proposed program efforts. A copy of the updated Comprehensive Water Conservation Plan is attached for reference. In an effort to assist the District in meeting future water supply challenges, the Plan includes a comprehensive review of objectives, strategies, 2023 achievements, future program enhancements for the Landscape Transformation Program (LTP) in 2024, and regulatory compliance efforts to satisfy proposed "Conservation as a California Way of Life" requirements.

ITEM BUDGETED:

Yes

FINANCIAL IMPACT:

There is no financial impact associated with the recommendation.

DISCUSSION:

The foundation of the Plan consists of further enhancements and implementation of the LTP. The implementation of the LTP has and will continue to assist the District in reducing water demands.

ACHIEVEMENTS

The District has experienced a water use reduction from 195 gallons per person per day (GPCD) in 2020 to 131 GPCD in 2023 - a 33 percent reduction. Overall water consumption in the District, including both residential and commercial potable use, was 30 percent less. Based on preliminary data from the Department of Water Resource's (DWR)'s Water Use Objective Exploration Tool, future modeling simulations indicate a residential compliance point of approximately 125 GPCD by 2035. Effectively, the District's water efficiency efforts are only three percentage points (36 percent total) away from accomplishing residential water use

reduction compliance with the State's current proposed water use objective requirements by 2035. However, it is important to note that adopted regulations could be different from those currently proposed, and some of the data needs to be verified. Also, while the state's mandates appear to be achievable, staff is primarily concerned with additional costs associated with data collection and reporting requirements, which could impact rates.

The District has also made progress with the conservation of recycled water. For the recycled water system, 4,101 acre-feet (AF) of recycled water was delivered in 2023 - a 14 percent reduction in recycled water usage compared to 2020 (4,765 AF). One acre-foot of water is approximately equal to filling a football field with one foot of water. When comparing the latter half of recycled water usage in 2023 to the same period in 2020, the trend is closer to a 30 percent reduction. The goal is to consistently reduce recycled water use on landscapes by at least 20 percent in 2024 and 25 percent by 2030 compared to 2020. This will make more recycled water available for a higher beneficial use to augment drinking water supplies via the Pure Water Project Las Virgenes-Triunfo.

LANDSCAPE TRANSFORMATION PROGRAM

In an effort to continue to build on 2022 water saving messaging and encourage more integration of water efficient best practices with a focus on outdoor landscapes and irrigation, Resource Conservation staff developed and implemented the LTP to provide additional water saving tools and incentives that will assist and encourage customers to maximize and future-proof water savings. Below are LTP objectives and strategies:

PROGRAM OBJECTIVES

- Develop new programs that complement LVMWD's existing programs, MWD's Turf Replacement Program, and align with grant funding efforts;
- Provide assistance, guidance, and education to overcome customer obstacles;
- Incentivize landscape transformation by providing financial support, professional services, education, and water saving devices at discounted rates;
- Meet or exceed state mandates for water use efficiency;
- Reduce water use from the 2020 level of 195 GPCD to equal to or less than 125 GPCD by the year 2035; and
- Reduce recycled water use on landscapes by 25 percent compared to 2020 levels by the year 2030.

PROGRAM STRATEGY

- Develop and implement priority programs that facilitate landscape transformation and produce water savings;
- Continue to strengthen LVMWD website/webpages to improve customer connection to LVMWD rebates and existing MWD rebates and incentives;
- Create and publish collateral to support ease of access;
- Ensure rebates offered by LVMWD align and/or supplement existing programs;
- Incentivize landscape transformations by providing financial incentives, professional services support, education/workshops, and discounted water saving devices and equipment;
- Leverage the WaterSmart Customer Portal to manage and track water savings programmatically (Program Participation Module);

- Promote programs through interactive campaigns and customer recognition; and
- Pursue and manage grants that provide funding towards water efficiency programs.

NEXT STEPS

Future action items that Resource Conservation staff will prioritize in the 2024-25 include the following goals and objectives:

- Landscape Design Assistance Landscape designer and/or Homeowners Association (HOA) design palette plans (Integrated Resource Water Management (IRWM) Grant – 2024-2026).
- Execute Memorandum of Understanding (MOU) with Los Angeles County Flood Control District (LACFCD) and implement IRWM Drought Resiliency Grant Program with Los Angeles County District #289 and West Basin.
- Execute MOU with Inland Empire Utilities Association (IEUA) and implement Commercial/Public Lands Turn-Key Turf Transformation Grant.
- Program Efficiency Request for Proposal (RFP) for Irrigation Retrofit Rachio Program to be conjoined into one program.
- Partnership with Malibu Foundation and City of Calabasas– planting micro forests and pollinator gardens Bark Park (2024).
- Implement Turf Transformation Project Equestrian and Westlake Reservoir (2024-2025).
- Hire consultant to create ten-year Conservation Strategic Plan (2025 Urban Water Management Plan) (2024-2025).
 - Will include detailed analysis and verifying impacts of regulations on District future supply/demand.
- Pursue additional grant funding for conservation initiatives.

GOALS:

Provide Excellent Services that Exceed Customer's Expectation

Prepared by: Craig Jones, Resource Conservation Manager

ATTACHMENTS:

2024 Comprehensive Water Conservation Plan.pdf



2024 Comprehensive Water Conservation Plan



Executive Summary

To assist the District in meeting future water supply challenges, the 2024 Comprehensive Water Conservation Plan (Plan) includes *a broad review of current and future objectives, 2023 achievements, the scheduled implementation of landscape transformation programs in 2024, and District efforts to meet the proposed "Conservation as a California Way of Life" regulations.*

The Landscape Transformation Program (LTP) is made up of a combination of programs that assist in reducing customers' outdoor water footprint. *Outdoor water use for landscape irrigation is the single largest type of water use in the District and has historically accounted for up to 70% of total potable water use.* Conservation programs and savings for Indoor water use have largely been exhausted. Therefore, the Conservation Plan focuses on outdoor water use. LVMWD currently offers turf replacement rebates, smart irrigation controllers, native plant kits, residential and commercial water surveys, irrigation efficiency retrofits, rain barrels, and educational workshops to provide assistance through professional services, guidance, and education to overcome obstacles for reducing outdoor water usage.

By combining new water efficient initiatives with existing programs as part of a comprehensive strategy for sustainable management of water supplies, the District currently achieves an estimated 93 acre-feet per year (AFY) of water savings attributed to the LTP (one acre-foot is approximately equal to filling a football field withone foot of water). The Rachio Smart Irrigation Controller Program produces the largest estimated cumulative water savings at 84 AFY because the program has been available to customers for almost five years (since 2019). By 2030, assuming current participation and savings trends, cumulative water savings are projected to be approximately 170 AFY.

The Irrigation Retrofit Program - in only three months after launching - has produced an estimated savings of almost 7 AFY. Staff anticipates customer interest in this program will continue to grow in 2024 - dramatically increasing estimated water savings to as much as 30 AFY. The native plant kit produces the smallest margin of savings but at the least cost to the District. Coupled with these savings, *other District initiatives including robust conservation messaging, the installation of advanced meters and implementation of the Flow Restriction Program (FRP) – an estimated total of 5,888 AFY in reduced potable water consumption has already been realized in 2023 compared to 2020.* While individual programs under the LTP don't by themselves yield a high level of water savings, the conservation messaging that accompanies the programs likely has and will continue to yield substantial savings.

For the recycled water system, 4,101 AF of recycled water was delivered in 2023 - a 14% reduction in recycled water usage compared to 2020 (4,765 AF). When comparing the latter half of recycled water usage in 2023 to the same period in 2020, the trend is closer to a 30% reduction. The goal is to consistently reduce recycled water use on landscapes by at least 20% in 2024 and 25% by 2030 compared to 2020. This will make more recycled water available for a higher beneficial use – to augment drinking water supplies via the Pure Water Project.

Historically, the District has had one of the highest per capita water use rates in Gallons Per Capita (person) Per Day (GPCD) at over 227, which is significantly higher than most other jurisdictions throughout the state. *In 2023 the District achieved a 30% overall reduction in potable water consumption (compared to 2020). When looking only at residential use, a 33% reduction in GPCD has been achieved.* Although the first three months of 2023 were extremely wet, this trend was observed in the dryer months of 2023 as well and fortifies that LVMWD customers are not returning to old habits but instead making conservation a way of life.

Overall, District conservation efforts coupled with the overwhelming customer response to the call for improved water efficiency over the last two years, positions the District to meet or exceed the proposed regulations under the Conservation as a California Way of Life framework. Based on preliminary estimates, the District is already within only a few percentage points from its ultimate water use objective, which will not be required until the year 2035. However, proposed regulations are subject to change and the data needs to be verified before there is certainty on the level of compliance. While the water use and efficiency standards appear to be achievable, rigorous proposed reporting requirements, data collection, annual variance requests, and overall compliance requirements may require additional staffing. This contradicts the District's objective to also keep rates affordable.

In 2024, staff intends to release a Request for Proposals to hire a contractor to continue to fund the Irrigation Retrofit Program and merge the Rachio Smart Irrigation Controller Program into one composite program. Because the Irrigation Retrofit Program includes an initial indoor and outdoor water use evaluation along with re-programming the irrigation controller after retrofits are completed, there are cost savings associated with merging these two programs. Other program enhancements consist of providing customers with landscape design assistance, seeking to partner with local stakeholders to implement landscape transformations at visible public spaces and at District facilities.

The District's ability to continue to achieve the mission of providing high quality water in a cost-effective and environmentally sensitive manner will continue to center on educating and equipping customers to be good stewards of our precious water resources because the best available and most affordable water supply is the one we conserve today!

Background

Since its formation in 1958, LVMWD has been an innovative leader in water supply reliability and diversification. As early as 1964, recycled water was utilized for offsetting the imported water demand for irrigation of golf courses, green belts, and farm fields. The Las Virgenes Reservoir was constructed to serve as a six-month back-up supply for emergencies and provide for high demands during summer and help alleviate shortages of water from other sources. A fundamental element of optimizing the use of available water supplies is demand side management - namely through successful implementation of conservation programs.

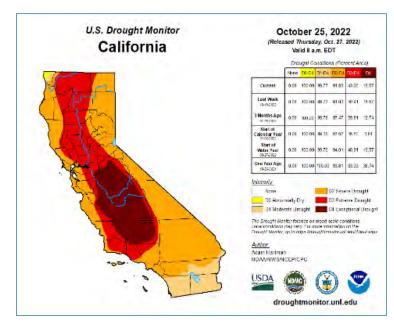
Water conservation has become an integral approach to overcome the impacts of climate change on water supplies and energy resources. As a State Water Project (SWP) dependent area, local water supply development coupled with conservation efforts is viewed as a key basis of supplementing imported supplies and strengthening the region's drought resiliency. Every drop of water saved is an additional drop of water that can remain in storage for dry periods.

The District has maintained a long-standing culture and practice of water conservation long before the State's Conservation as a California Way of Life framework was established. On January 1, 2016, LVMWD implemented budget-based rates, establishing individualized indoor and outdoor budgets for every customer. At the end of 2022, the District completed the Advanced Meter Project (AMI) replacing over 21,000

meters. This project has positioned the District and its customers to strategically and proactively use alerts to identify leaks and make necessary changes through the visualization of their water consumption using the WaterSmart portal – empowering customers to be as water efficient as possible. Conversely, it equips the District to accurately identify water loss and leverage near real-time water use data to improve its operations. This strategic investment in water savings positions the District to continue to be innovators in conservation and drought resiliency and build a legacy of stewardship - preserving precious water resources for generations to come.

2022 - Unprecedented Drought

In November of 2021, in anticipation of worsening drought conditions, LVMWD adopted water use restrictions by officially moving into Stage 3 of its Water Shortage Contingency Plan (WSCP). Subsequently, the District implemented a fifty percent outdoor water budget reduction on all residential water accounts preceding Metropolitan's emergency drought restrictions calling for one day per week outdoor watering restrictions.

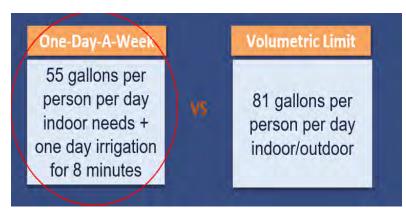


In 2022, Southern California experienced the driest three-month stretch in recorded history beginning in January through March. The combination of below average snowpack and record high temperatures left the State Water Project reservoir system well below average levels. As a result, State Water Project dependent areas faced unprecedented calls for mandatory conservation. Overall, the District received a 73% reduction in its water supply allocation from Metropolitan Water District, one of the highest in the State of California. This reduction required LVMWD to implement one day per week of watering and other restrictions to avoid substantial fines.

To take action and intensify public outreach to the community and respond to growing public concerns around the emergency drought restrictions, the District hosted a virtual Town Hall where more than 1,300 community members attended and staff addressed and responded to hundreds of questions.

During the summer months of 2022, LVMWD staff worked earnestly to assist customers in meeting the challenges of "letting their lawns go" and helping them make critical adjustments to stay at or below their tightened outdoor budgets. LVMWD customers rose to the challenge of meeting and exceeding stringent outdoor watering restrictions.

From June 2022 through December 2022, customers used an average of 39% less water compared to the same period in 2020. The District's efforts along with the overwhelming conservation response was remarkable and historical. 2022 highlighted that customers are capable of achieving and exceeding conservation levels that may become the new and permanent benchmark



proposed by state regulations in future years.

2023 – A Banner Year of Rainfall

On February 7, 2023, the LVMWD Board scaled back outdoor watering restrictions due to improved hydrologic conditions and an increased water allocation from the State. The California Department of Water Resources (DWR) increased its SWP allocation from 5 to 30% after a winter of atmospheric rivers delivered record breaking precipitation to the state. The combination of SWP reservoirs filling to maximum capacity and a historic snowpack in the Sierra Nevada Mountains – together provided a much-needed answer to the worst drought conditions in recorded history.

After remaining at Stage 3 for over a year, LVMWD transitioned back to Stage 2 of its WSCP - normalizing customers' outdoor budgets. The Metropolitan Water District of Southern California also rescinded their emergency drought declaration on March 15, 2023, ending the one-day a week watering restriction. Regardless, customers were encouraged to keep up the habits that resulted in historic conservation efforts and to stay in the efficient tier of their water budgets.

Recycled Water Conservation

The Tapia Water Reclamation Facility (TWRF) treats an average of eight million gallons per day of sewage that meets Title 22 requirements (suitable for non-potable purposes such as irrigation). Currently LVMWD serves Title 22 water to approximately 652 dedicated recycled water accounts within the service area. Recycled water uses are mainly landscape irrigation and golf course irrigation. During periods of peak recycled water demands, supply of treated effluent is not always sufficient to meet recycled water from two groundwater production wells and potable water. Since 2016, the amount of supplemental potable water has averaged approximately 682 AFY. In 2020, 332 AF of potable water was added to the recycled water system.

In 2020 4,766 AF of recycled water was delivered to LVMWD's recycled water system for beneficial reuse. In 2023, 4,101 AF of recycled water was delivered, marking a 14%

reduction in recycled water use compared to 2020. The latter part of 2023 when compared to the same period in 2020 indicates trending closer to a 30% reduction. The 2020 Urban Water Management Plan sets a recycled water demand reduction goal for 2025 of 3,995 AF (approximately 16% reduction compared to 2020); however, the District has established new targets.

These downward trends in overall recycled water usage are attributed in large part to staff efforts to promote better efficiency through shut off warnings of accounts with repeated excessive use and utilizing WaterSmart to identify and notify customers of large leak events. The LTP will serve to further promote additional savings by encouraging customers to convert non-functional turf areas to climate appropriate plantings that require less water. The goal is to reduce recycled water use on landscapes by at 20% in 2024 and 25% by 2030, which will make more recycled water available for a higher beneficial use – to augment drinking water supplies via the Pure Water Project.

Landscape Transformation Program (LTP)

To build on 2022 water saving messaging and encourage more integration of water efficient best practices with a focus on outdoor landscapes and irrigation, Resource Conservation staff developed and implemented the LTP to provide additional water saving tools and incentives that will assist and encourage customers to maximize and future-proof water savings. Below are LTP objectives and strategies:

Program Objectives

- Develop new programs that complement LVMWD's existing programs; Metropolitan's Turf Replacement Program and align with grant funding efforts;
- Provide assistance, guidance, and education to overcome customer obstacles;
- Incentivize landscape transformation by providing financial support, professional services, education, and water saving devices at discounted rates;
- Meet or exceed state mandates for water use efficiency;
- Reduce water use from the 2020 level of 195 gpcd to less than 125 gpcd by the year 2035; and
- Reduce recycled water use by 25% compared to 2020 levels by the year 2030.

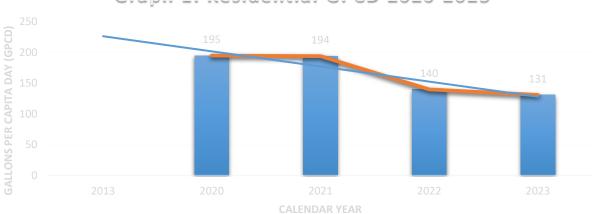
Program Strategies

- Develop and implement priority programs that facilitate landscape transformations and produce water savings;
- Continue to strengthen the LVMWD website to improve customer connection to rebates and incentives;
- Create and publish collateral information to support ease of access;

- Ensure rebates offered by LVMWD align with and/or supplement existing programs;
- Incentivize landscape transformations by providing financial assistance, professional services support, education/workshops, and discounted water saving devices and equipment;
- Leverage the WaterSmart Customer Portal to manage and track water savings programmatically (Program Participation Module);
- Promote programs through interactive campaigns and customer recognition; and
- Pursue and manage grants that provide funding towards water efficiency programs.

The LTP has several components and "subprograms". It provides both technical and financial assistance to customers to convert or transform landscapes that require substantial amounts of water to more climate appropriate and drought tolerant landscapes. There are subprograms that focus on residential landscape conversions and others that will focus on commercial and recycled water conservation. There are also elements of the LTP that focus on the installation and maintenance of more efficient irrigation systems.

Programs are tracked for participation levels and estimated water savings. Goals are set annually and the level of success is measured with Key Performing Indicators (KPIs). Prior to the drought, approximately 70% of residential water use was on landscapes. Most opportunities to conserve water indoors have already been achieved. The greatest opportunity to conserve water use residentially will continue to focus on reducing outdoor irrigation. Historically, the District has had one of the highest per capita water use rates in Gallons Per Capita Per Day (GPCD) at over 227 gallons compared to that of most other jurisdictions throughout the state.



Graph 1: Residential GPCD 2020-2023

The implementation of the LPT has and will continue to assist the District in reducing its residential demand. Based on **Graph 1 (above)**, the 2023 reduction in residential GPCD when compared to 2020 highlights a District-wide residential water use reduction

of 33% over a three- year period. Consumption has decreased from 195 GPCD in 2020 to 131 GPCD in 2023. This is an incredible accomplishment for the District and its customers. Considering the 2022 drought emergency restrictions that were in place, 2023 demonstrated a continuing reduction trend in residential GPCD despite the record rainfall in the first three months of the year. This trend validates customers are not rebounding to pre-drought usage and it demonstrates significant progress towards the District's efforts to achieve anticipated future state-mandated water use standards.

2023 Resource Conservation Achievements

- 2023 achieved 30% overall water conservation (2023 vs. 2020)
- 2023 achieved 14% recycled water conservation (2023 v. 2020)
- Installed 493 Rachio irrigation controllers
- Hosted nine workshops attended by 203 unique (non-repeat) customers
- Distributed 149 native plant kits to participating residents
- Launched the Irrigation Efficiency Retrofit Program (75 customer applications)
- Issued 117 rain barrel vouchers
- Awarded Prop.1, Round 2 IRWM Grant (\$123,800)
- Awarded DWR Urban Community Drought Relief Grant Funding IEUA Partnership (\$504,771)
- Coordinated and executed the Dave Roberts Wildflower Garden Dedication
- Launched the Water Hero Customer Recognition Program
- Provided public comment and written letters for draft outdoor water use regulations at State Board workshops
- Active participation in ACWA's and CalWEP's Water Use Efficiency working groups

Rachio Smart Irrigation Controller Program

Excessive irrigation or "over watering" represents enormous sources of water waste, particularly within the District's service area where as much as 70% of water is used outdoors. In addition to applying too much water to landscapes, the Environmental Protection Agency (EPA) estimates half of the water used outdoors is lost due to wind, evaporation, and runoff. Weather-based irrigation controllers help subdue these challenges by using near real-time weather data to facilitate irrigation schedules. Smart controllers can skip irrigation cycles in the event of precipitation, high winds, or other unfavorable conditions. Additionally, smart controllers can be programed to apply the optimal amount of water for various plant types, ensuring that landscapes are neither over nor under watered. The greatest advantage in investing in smart controllers is its ability to provide an audit trail of when it ran and for how long - directly to the end-user's smart phone. Traditional analog controllers are set and left to run automatically. The challenge is that unless someone is a student of the device and intentionally makes

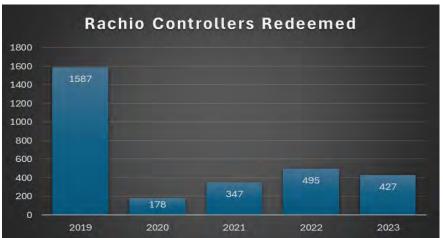
routine adjustments, it's a mystery to determine when and for how long an irrigation system was operated.

Beginning in February 2019, the District launched a full-service smart irrigation controller program with a goal of installing 2,000 controllers. During the pilot phase, controllers were provided at no cost to the customer and included professional installation. Marketing targeted customers who had exceeded their water budget by over 200%, with a limited quantity available on a first-come, first-serve basis to customers who learned about the program via word of mouth. The program was limited to one controller, but if a customer needed an additional controller, they could purchase a second controller and the District's contractor would install it at no cost.

The pilot program was suspended prematurely in March 2020 because of COVID-19; however, 2,139 controllers were installed up until this time. Consumption analysis showed that targeted customers exceeding their budget by 200% who participated in the program used, on average, 34% less water than targeted non-participants. Non-targeted participants (i.e., those already performing within their budget) saw an overall reduction of 5% vs. non-participants. In summary, the program proved to be effective in reducing water waste.

The District resumed the Rachio program in January 2021; however, some changes were made to make the program sustainable. Customers had to pay a \$99 cost-share for either an 8-station or 16-station controller, with the District covering the remaining cost and device installation. The program is marketed to all customers, not just those in the excessive, wasteful tiers. The program is still limited to one controller per customer,

but customers can purchase additional controllers and pay for installation of the additional devices at a discounted rate. Due in part to the added cost to the customer, overall program participation has diminished following the pilot period as illustrated in the graph.



As of December 2023, 3,034 Rachio Smart irrigation Controllers have been installed representing approximately 20% of residential accounts. Program participation has seen a subtle decline since the start of 2023. This may be that customers are not willing to pay the cost share amount – as cost does become a barrier to participation. Also, the program is experiencing a hardening effect. Customers most interested in the program

have already redeemed controllers and the remaining customers are less interested or are satisfied with their current irrigation system.

An analysis of 2023 consumption data found that participating customers that exceeded their budget (i.e., are in the inefficient or excessive tiers) used **24.7%** less water than nonparticipating customers in the same category. Contradictorily,

Customer Category	# Accounts	Gallons Over/Under Budget	% Difference of Participants
Inefficient (over budget)			
Rachio Participants	446	72.22	-24.72%
Non-Participants	3093	92.59	
Efficient (within budget)			
Rachio Participants	2140	-143.65	15.72%
Non-Particiapnts	12832	-168.15	

participating customers that performed within or under their budget used 15.7% more water than non-participating counterparts. This data suggests that customers who exceeded their budget were over irrigating, while customers that were within budget were most likely deficit irrigating.

2024 Program Enhancements

Based on staff's internal research, 2024 strategic outreach efforts will focus on inefficient users, where the program can improve the efficiency of participating customers and achieve maximum water savings. Another strategy to overcome program participation hardening is to expand the program to include a second discounted controller and installation since many customers have more than one controller (e.g., front yard and back yard). Finally, program enhancements will include an optional Wi-Fi extender, working with Rachio to develop targeted push notifications, hosting a webinar, and developing a leave behind for customers to reference for optimal performance and troubleshooting. This will ensure ease of use and minimize customer challenges.

Water Savings

Implementation of the Weather-Based Irrigation Controller Program is estimated to reduce water consumption between 5,000 and 13,000 gallons per year per single family household. At 3,034 controllers installed District wide to date, using an average savings of 9,000 gallons per household per year, the Rachio Program is currently estimated to be producing an annual water savings of 84 AFY. Based on the goal for 2024, to install an additional 450 controllers - an extra 12 AFY savings is anticipated. By 2030, assuming current participation and savings trends, cumulative water savings are projected to be approximately 170 AFY.

Native Garden Kit

For nearly three years, LVMWD staff have worked with TreePeople Land Trust to design and produce a "Native Garden Kit," modeled after a successful "Garden in a Box" program founded in Boulder, Colorado. These kits make landscape transformation affordable and accessible by providing customers with a professionally designed, waterwise kit, tailor-made for Southern California yards. Kits include ten, one-gallon native plants predesigned for any one hundred



square-foot garden space, a plant-by-numbers site map, installation guide, seasonal maintenance suggestions, and watering recommendations. Six themed kits have been developed for multiple landscape scenarios, including full-sun, full-shade, partial-sun, and pollinator preferences.

California native plants have a lower watering requirement than conventional cool season turf grass, which dominates many landscapes within the area. Native plants require only 10-50% of the water needed to maintain a healthy lawn.

The Regular cost is \$120 per kit; however, a limited number of kits are offered for \$100 during a pre-sale period. LVMWD is offering customers a \$50 instant rebate per kit. The rebate is limited to five kits per customer to ensure that limited funding is shared broadly and equitably. Exceptions are reviewed on a case-by-case basis.

In September 2023, TreePeople and LVMWD launched a pilot program to nearly 500 customers to test the feasibility of TreePeople's payment processing platform and evaluate pickup event logistics. During the pilot period, 28 kits were purchased, and a distribution event was hosted at LVMWD on November 4th.

On November 1, 2023, the program was made available to all LVMWD customers. Customers were notified via email and a new program webpage was created at LVMWD.com. As of January 2, 2024, 179 kits have been sold. A distribution event has been scheduled for February 23 and 24, 2024.



Water Savings

Each native garden kit installed can achieve a savings of 1,610 – 2,901 gallons per year once established (using an annual evapotranspiration rate of 52-inches). With an average of 300 kits distributed per year, which equates to between 483,000 and 870,300 gallons. Averaged water savings annually equals 676,650 gallons or 2.1 AFY.

Irrigation Efficiency Retrofit Program

In September 2023, Resource Conservation launched the Irrigation Efficiency Retrofit Program in partnership with WaterWise Consulting. Customers start by applying for a Water Efficient Home Survey with

Install Date	Landscape Area (SF)	# MP Rotators Installed	Linear Feet Drip Installed	# Sprinklers Caped	# Pressure Regulators Installed
10/18/2023	7500	36	0	0	0
10/20/2023	3200	0	450	17	0
10/27/2023	4200	22	0	0	0
10/27/2023	1300	17	0	0	0
11/2/2023	1200	23	0	0	0
11/9/2023	4000	56	0	19	0
11/27/2023	3000	9	0	0	0
11/28/2023	1250	1	0	5	0
12/11/2023	5000	60	150	8	0
12/20/2023	4500	0	0	0	0
12/28/2023	2000	17	0	0	0
Total	37150	241	600	49	0

WaterWise. During the survey, a certified water auditor identifies opportunities to improve water use efficiency indoors and outdoors. The auditor compiles findings in a report and shares the report with the homeowner and the District. The report includes the auditor's recommendation to qualify each customer for some or all the irrigation retrofit components – drip lines, high efficiency nozzles, and capping of sprinkler heads that are no longer needed. The District reviews the recommendations to confirm approval to commence retrofit. If the customer's landscape qualifies, WaterWise contacts the homeowner to schedule the retrofit installation and requires the terms and conditions/hold harmless form be signed in advance of commencement of any work being performed. If the customer does not qualify, they are notified.

The District covers up to \$1,000 in irrigation upgrades per qualifying customer. Eligibility for costs that would be covered by the District is reviewed and approved on a case-by-case basis. Upgrades may include conversion from overhead spray to drip irrigation, installation of high efficiency rotating nozzles, installation of pressure regulating spray heads, capping unnecessary sprinkler heads, and reprogramming the irrigation controller for retrofitted zones.

Water Savings

High efficiency nozzles save 924 gallons per 100 square-feet per year. Drip irrigation saves 1,433 gallons per 100 square-feet per year. Based on the retrofits performed to date, annual water savings equates to an estimated 6.7 AFY.

2024 Program Enhancements

For the initial program pilot launch in September 2023, strategic marketing efforts targeted customers for the irrigation retrofit program who had previously engaged in District water conservation programs and were in the excessive or inefficient tiers of their water budget. On December 1, 2023, the program was made available to all LVMWD customers. As of December 31. 2023, 107 customers had applied for the Irrigation Efficiency Retrofit Program and six installations had been completed to date.



In 2024, staff intends to release a Request for Proposals to hire a contractor to continue to fund the Irrigation Retrofit Program and merge the Rachio Smart Controller Program into one composite program. Because the irrigation retrofit program includes an initial indoor and outdoor comprehensive water survey along with re-programming the irrigation controller after retrofitting the irrigation, there are cost savings associated with merging these two programs.

Rain Barrels

In January 2023, the District launched a new rain barrel program in partnership with Smith Pipe & Supply in Westlake Village. Participating customers are eligible to receive the Rain Station 50-gallon rain barrel for \$70 plus tax (\$140 value). LVMWD provided customers with a voucher that is presented at the time of purchase to subsidize the cost of the barrel. Rainwater captured by these barrels can be used to augment year-round irrigation and reduce the amount of supplemental water needed to maintain an attractive garden. A well-established native landscape could require little to no potable water by relying on natural rainfall and water collected in multiple rain barrels, depending on the size of the landscape.

Initial marketing targeted customers who had made the greatest progress towards water use efficiency in 2022 (i.e., those that started the year over budget and then had at least four consecutive months under budget by the end of the year), as well as customers that had applied for a Turf Replacement Rebate and completed their project. The discounted rain barrels were intended as a reward to show LVMWD's appreciation for customers' commitment to water conservation during the drought.

Program Metrics

In March 2023, rain barrel vouchers were made available to all LVMWD customers. Customers were notified via email, through the District's social media accounts, and

online at LVMWD.com. As of December 31, 2023, 117 customers have requested a rain barrel voucher. Water savings are hard to delineate with the installation of rain barrels. Some key conservation benefits include the complimentary influence of a rain barrel in capturing the first flush of rain in a landscape via rainwater retention feature - a required part of landscape transformation design to qualify for \$2 per square-foot turf transformation rebate. A rain barrel acts as an important stormwater mitigation device. By re-routing a downspout from a concrete surface to a planted area, the rain barrel acts as a catch basin redirecting rainwater to a planted bio swale where it can be absorbed and filter pollutants - improving water quality in local watersheds.



Sustainable Landscape Workshop Series

Climate change is driving more frequent weather extremes, as seen by the historic drought California experienced in 2022, immediately followed by historic rainfall during the winter of 2022-2023. However, the region will undoubtedly face another drought and

Californians need to make conservation a California way of life. Our saturated soils and replenished reservoirs provide the perfect opportunity to transform traditional European-inspired gardens into ecologically beneficial spaces that make our region more resilient to the effects of climate change. Native and sustainable gardens support the local ecology, reduce the urban heat effect, reduce runoff and associated ocean pollution, and require considerably less water than traditional landscapes.



Program Metrics

In 2022 and 2023, # Registered # Attended Date Topic **Resource Conservation** 10/1/2022 Replace Your Thirsty Lawn 35 23 hosted a record 11/16/2022 Goodbye Grass 80 45 breaking eleven 3/14/2023 Garden Design Workshop 50 32 4/1/2023 Firescaping 71 33 workshops attended by 5/6/2023 Native Garden Maintenance 40 33 312 customers. For 6/13/2023 Climate Appropriate Landscapes 23 27 customers considering 6/15/2023 Modern Meadows 33 39 landscape 9/16/2023 Firescaping 35 27 9/30/2023 Hand-On Drip Irrigation transformation, LVMWD 39 17 10/21/2023 Hand-On Drip Irrigation 23 13 hosts a Sustainable 12/9/2023 Native Garden Maintenance 60 23 Landscape Workshop Total 489 312 Series with sessions

offered each spring and fall. Topics included garden design, fire-wise landscaping, native garden maintenance, how to apply for a turf replacement rebate, and other topics related to California-friendly gardening. University-level professors and industry professionals share their experiences with sustainable landscaping and provide customers with resources needed to tackle their own transformation project.

Workshops are offered for free to customers and are designed to assist those that have or are planning to transition their conventional turf-dominated landscape to a resilient, climate-appropriate refuge. For more information visit www.LVMWD.com/LandscapeClasses

Landscape Transformation Program Water Savings 2023

By combining new water efficient initiatives with existing programs as part of a comprehensive strategy for sustainable management of water supplies, the District may save an estimated 93 AFY of water. This savings is attributed to existing programs. As seen in **Graph 2 (next page)**, the Rachio Smart Irrigation Controller Program produces the largest estimated water savings at 84 AFY. This is largely because the program has been available to customers for almost five years (since 2019). The Irrigation Retrofit Program - in only 3 months - has produced an estimated savings of almost 7 AFY. Staff anticipates customer interest in this Program will continue to grow in 2024 - dramatically increasing water savings. The Native Plant Kit Program produces the smallest margin of savings but at the least cost to the District.

Presenter

Urban Water Group

G3 / Alexa Hendricks

G3 / Alexa Hendricks

UC Master Gardeners

UC Master Gardeners

Antonio Sanchez

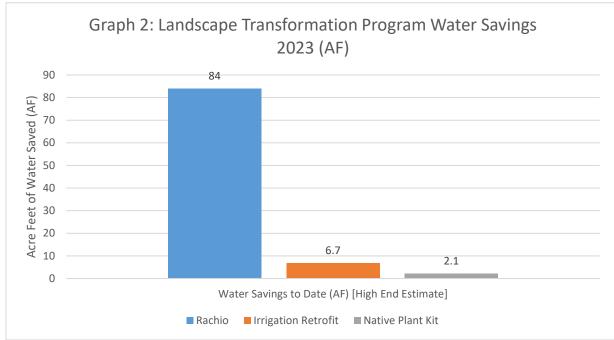
Douglas Kent

Antonio Sanchez

Alexa Hendricks

Andrey Pongs

Douglas Kent

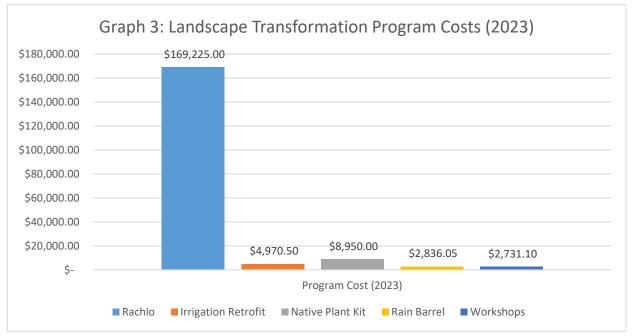


Landscape Transformation Program Costs

Overall, the Resource Conservation Division expenditures over budget are projected to end the 2023-24 fiscal year at 79%. Staff worked with Finance and Administration to infuse budget funding for existing and future programs.

2023 Program Costs

In 2023, District wide Landscape Transformation Program expenses totaled approximately \$188,712 as broken down in **Graph 3 (below)**. This includes funding a total of nine educational workshops that are an invaluable tool in altering human behavior. These costs do not factor in staff time to develop and implement programs.



Funding Strategy

The District places a high priority on securing grant funding to offset the cost of projects and program initiatives like the Landscape Transformation Program to keep rates competitively low for customers. In 2023, Resource Conservation staff secured two state grants that will assist in funding regional water conservation programs.

Drought Resiliency Water Conservation Program – IRWM Prop 1 Round 2 Grant

The Drought Resiliency Water Conservation Program, a subprogram of the Landscape Transformation Program through the Integrated Resources Water Management (IRWM) Grant, will utilize rebates, devices, and assistance to replace water wasting grass with low water use plants and incentivize the installation of water efficient outdoor devices. This program will include landscape design assistance, drip irrigation direct install/tune-ups, weather-based irrigation controllers, native plant kits, rain barrels, and cisterns. This program will be supplementary to Metropolitan's turf replacement program. This regional three-way partnership with Las Virgenes, West Basin and Los Angeles County Waterworks District No. 29, where LVMWD will be the Lead Project Sponsor, encourages climate resilience and strengthens collaboration with local water agencies and non-profit partners who share in the stewardship of our local watersheds and resources. If authorized by the Board of Directors, staff will be executing the MOU agreement with Los Angeles County Flood Control District in February 2024 and finalizing the three-way interagency MOU agreement between agencies in the coming months. LVMWD has a total cost share of \$263,000 with a total grant reimbursement of approximately \$123,800. The regional program is scheduled to launch in summer or fall 2024. The grant performance period is through December 31, 2026 with an estimated total water savings of 58 acre-feet per year (19 million gallons/year) as a result of this program.

<u>Urban Community Drought Relief Grant Program – Inland Empire Utilities</u> Agency (IEUA) Partnership

As part of the Department of Water Resources' Urban Community Drought Relief Grant Program, the Inland Empire Utilities Agency (IEUA) and three partner agencies - Calleguas Municipal Water District, Las Virgenes Municipal Water District, and Upper San Gabriel Valley Municipal Water District, were awarded grant funding to provide a new turn- key water-use efficiency program for select properties in more than 60 communities in Southern California. The Turnkey Turf Transformation Project was competitively selected for an award of \$8,474,500. Of this amount LVMWD will be awarded a total of \$504,771. This landscape transformation funding will be for public lands and commercial sites only. LVMWD staff has been working with cities within the District's service area to identify public lands square footage - specifically highly visible turf areas like medians to be eligible for this funding. Staff is working on drafting the MOU agreement to be executed between agencies. Turf transformation projects must be completed on or before June 30, 2026.

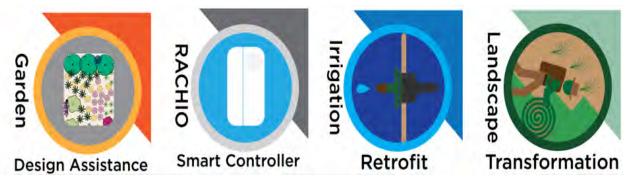
2024 Turf Transformation Outreach

A key strategy for implementing the District's Landscape Transformation Program has been to develop programs designed to fill in the gaps or removes obstacles as opposed to a "one size fits all" approach. Two key takeaways and actions implemented by staff in response to data collected from the Landscape Transformation Survey conducted in 2023 include:

- 50% of respondents conveyed they would transform their landscape by way of do-it-yourself. Resource Conservation staff hosted a total of 9 educational workshops.
- Assistance with formal landscape design and converting conventional irrigation to low flow efficient irrigation scored the highest for potential rebate options. Resource Conservation staff launched the Irrigation Efficiency Retrofit Program in September 2023.

The Resource Conservation team has worked closely with the Communications/Public Affairs team to update, refine and simplify the Landscape Transformation webpages, develop collateral for public consumption, and effectively message the Program through the District's notification system and social media platforms.

From the development of individual icons for each subprogram of Landscape Transformation to brochures and videos that simplify how to apply for a turf replacement rebate in five steps, advertising and marketing efforts will continue to highlight and promote the message around more ways to be water efficient through Landscape Transformation programs.



Regulatory Framework: Making Conservation a California Way of Life

In August 2022, Governor Newsom released "California's Water Supply Strategy" with actions to recycle, de-salt and conserve more water and expand water storage capacity. Making conservation a way of life is a critical part of this strategy.

Assembly Bill (AB) 1668 and Senate Bill (SB) 606 (together, the 2018 conservation legislation) established long-term improvements in water conservation and drought-

planning to adapt to climate change. The 2018 conservation legislation amended existing law to provide expanded and new authorities and requirements to enable permanent changes for improving the State's water efficiency to be more prepared for future water shortages.

Making Conservation a California Way of Life regulation proposes a new way of managing urban water use. The new framework establishes unique goals for each urban retail water supplier and provide communities with the flexibility to implement locally appropriate solutions.

The State Water Board's proposed regulatory framework follows the formal recommendations provided by the Department of Water Resources (DWR) on September 22, 2022. The statute directed DWR, in coordination with the State Water Resources Control Board (SWRCB), to conduct studies and investigations and to recommend the following:

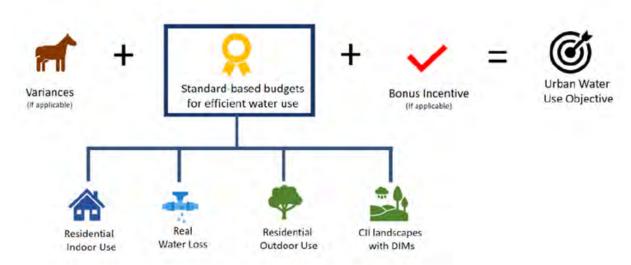
- Standards for outdoor residential use;
- Standards for the outdoor irrigation of Commercial, Institutional, and Industrial (CII) landscape areas with dedicated irrigation meters or other means of calculating outdoor irrigation use;
- CII performance measures; Variances for unique uses that can have a material effect on water use; and
- Guidelines and methodologies that identify how each urban retail water supplier will calculate its urban water use objective.

Urban Water Use Objective

A supplier's urban water use objective is an estimate of aggregate, efficient water use for the previous year, based on adopted water use efficiency standards and local service area characteristics for that year. A supplier's water use objective equals the sum of standard-based budgets for:

- Residential indoor use
- Residential outdoor use
- CII landscapes with Dedicated Irrigation Meters (DIMs)
- Real water losses

The urban water use objectives will also include variances for unique uses that can have a material effect on an urban retail water supplier's urban water use objective and a bonus incentive for potable recycled water use. The proposed regulation pursuant to separate statutory authority, would not require suppliers to comply with any individual standard; suppliers would be required to meet their overall objective. Below is the formula for how a supplier calculates its overall urban water use objective:



This report focuses on proposed outdoor water use efficiency standards, but for brief inclusion, below is a table summarizing the set standards for efficient residential indoor use (Wat. Code 10609.2.) which was lowered in 2022 based on new legislation and jointly regulated by DWR and the Water Resource Board (SB 1157).

	Residential Indoor Standard (GPCD)
Through December 31, 2024	55
From January 1, 2025, through December 31, 2029	47
January 1, 2030, onwards	42

Residential Outdoor Use and Cll Landscapes with DIMs

Using Landscape Efficiency Factors (LEF), the proposed regulation would set the standard for residential outdoor water use and the standard for CII landscapes with Dedicated Irrigation Meters (DIMs). The LEF is a factor used to indicate the amount of water a supplier may need to deliver to maintain healthy and efficient landscapes across the supplier's service area. A higher LEF value would correspond to high water using, less efficiently irrigated landscapes; a lower LEF value would correspond to lower water using, more efficiently irrigated landscapes. The table below summarizes the SWRCB staff proposal for the long-term standards:

	Landscape Efficiency Factor
Through September 30, 2030	
Residential outdoor	80%
CII DIM landscapes	80%
From October 1, 2030, to September 30, 2035	
Residential outdoor	63%
CII DIM landscapes	63%
October 1, 2035, onwards	
Residential outdoor	55%
CII DIM landscapes	45%

The long-term standard (2035 and onwards) for **residential outdoor water use** on landscapes would be a Landscape Efficiency Factor (LEF) of .55 or 55 percent; for CII landscapes with DIMs .45 or 45 percent. These LEF factors would be used in lieu of the District's Plant Factor (PF), which is currently 0.8. In other words, that State's proposed regulations would significantly reduce the amount of water that can be used on outdoor landscapes to stay within budget. The District's residential customer could conceivably see their outdoor water budgets reduced from current levels by approximately 31%. But this may not be necessary if customers continue to conserve to the extent they have been in recent years.

The standards for outdoor use — along with suppliers' unique service area data — would be used to calculate efficient outdoor use budgets. For example, a supplier's efficient residential outdoor water use budget would be calculated by multiplying the standard by the square footage of residential irrigable irrigated landscape area, by net evapotranspiration, and by a conversion factor of 0.62 (See Figure Below). The square footage of residential irrigable irrigated landscape area, reference evapotranspiration, and effective precipitation values will be provided by DWR, unless a supplier has produced alternative data that demonstrates equal or superior accuracy or quality to what has been provided by DWR.



• Net evapotranspiration (ETo) is a standard measurement of environmental parameters that affect the water use of plants.

- **ETo** is expressed in inches per year and is an estimate of the evapotranspiration of a large field of four to seven- inch tall, cool season grass that is well watered. It varies from year-to-year and throughout the state.
- Effective precipitation (EP) is the portion of total precipitation that becomes available for plant growth. It too varies from year-to-year and throughout the state.
- Irrigable Irrigated (II) landscape areas include healthy vegetation, somewhat unhealthy vegetation (e.g., brown lawns), and non-vegetative features, such as the rows between irrigated trees and features on or between vegetated areas (e.g., mulch, rocks, gravel, or weed blocking fabric; patches of bare earth; cars, trampolines, or other movable objects).
- Irrigable Not Irrigated (INI) landscape area includes very unhealthy vegetation (e.g., brown or leafless plants) and areas that are not currently being irrigated, but were irrigated in the past or may be irrigated in the future.
- Not Irrigated (NI) areas refer to residential landscapes that are not being irrigated and are unlikely to be in the foreseeable future (e.g., undeveloped or less developed areas, or hardscapes that cannot grow plants or hold water).

DWR's recommendation to the State Board proposed that the residential outdoor standard be applied to all *Irrigable Irrigated (II)* areas and 20% of Irrigable Not Irrigated (INI) area in a supplier's service area. DWR refers to the 20% of INI as an "INI buffer." Under the proposed regulation, a supplier would calculate their residential outdoor water use budget by applying the standard to Irrigable Irrigated area, plus up to 20% of the INI buffer, if the supplier demonstrates those INI areas are being irrigated. This differs from DWR's recommendation that the INI buffer be automatically included.

Provisions and Variances

The proposed regulation would establish variances for unique uses of water, along with the process suppliers would follow to request variances. In addition to the variances recommended by DWR, the State Board staff proposal includes two provisions:

- A provision for urban tree health
- A provision for pools, spas and other water features, starting in 2030.

The proposed regulation would establish a process that suppliers would follow to annually request approval to include additional Irrigable Irrigated (II) areas beyond that calculated by DWR, SLAs, and variances. The supplier would be required to provide information quantifying and substantiating each request (e.g., demonstrating that the amount of water requested was delivered by the supplier for the requested use) and a description of efforts to prioritize water for existing trees.

Bonus Incentive

Retail water suppliers that deliver water from a groundwater basin, reservoir, or other source that is augmented by potable reuse water will be eligible for a bonus incentive. With the bonus incentive, eligible suppliers will be able to adjust their urban water use objective based on the volume of potable reuse water delivered to residential customer and landscape areas with dedicated irrigation meters (DIM) in connection with Commercial, Industrial, and Institutional (CII) water use. The bonus incentive is not to exceed 15% percent of the supplier's water use objective for any potable reuse water produced at an existing facility or 10% percent at any facility that is not existing (planning phase). As an example, based on 2023 total potable water production of 14,118 AF an additional 1,411.8 AF (10%) would be added or allocated as a "bonus incentive" to the District's overall water use objective budget to account for LVMWD's Pure Water Facility.

Proposed Regulation Impacts on Urban Water Use

The State Board prepared a Standard Regulatory Impact Analysis (SRIA) document that describes in detail the assumptions used to estimate overall economic and fiscal costs and benefits of the proposed regulation, a primary component being the water savings that would be associated with the proposed regulatory framework. Under the proposed regulations, water savings would be calculated by comparing, for each supplier, a baseline to actual water use. Data was only available to evaluate residential indoor impacts (already established in statute) and the proposed residential outdoor standard. The analysis may overestimate prospective water savings associated with meeting urban water use objectives because the data did not account for variances.

Without the proposed regulation, average statewide total urban water use is forecasted to decline from an average of 130 gallons per capita per day (GPCD) to 117 GPCD in 2035 based on current trending and voluntary efforts being made by water users.

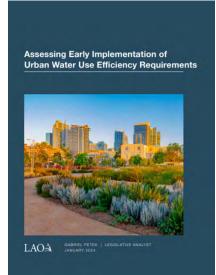
In 2000, California's urban water use averaged 199 GPCD, according to the 20×2020 Water Conservation Program report (DWR et al. 2013). With the passage of the Water Conservation Bill of 2009 (SBx7 7), the State sought to reduce per capita water use by 20% by 2020. Between 2000 and 2013, average statewide per capita water use decreased from 199 GPCD to 164 GPCD. Between 2013 and 2015, emergency conservation regulations and tremendous drought responses by local agencies and their customers resulted in average statewide water use dropping from 164 GPCD to 129 GPCD, a 21% savings in two years (State Water Board 2022). Since then, California has experienced some rebound, peaking at 137 GPCD in 2020 (the beginning of the hot, dry conditions associated with the most recent drought) and again dropping by the end of 2022, averaging 130 GPCD (State Water Board 2022).

While urban water use has rebounded since 2015, the long-term trend is clear: Californians are taking strides to conserve and use water more efficiently, indoors and outdoors. Between 2013 and 2022, per capita urban water use decreased by over 20% - savings equating to an average decline of 2.3% per year. By 2035, the proposed regulation could result in average GPCD declining at a rate of 1.5% per year, without accounting for variances.

Differences from DWR's September 2022 Recommendations

The following is a summary of framework provisions proposed by the State Board that differ from DWR's recommendations:

- Lowering of both the outdoor residential and CII standard to an Evapotranspiration Factor (ETF) factor of 0.55 and 0.45, respectively after October 1, 2035.
- 2. Replacing the CII-DIM conversion threshold of one acre with a volumetric water usage of 500 thousand gallons or more annually (process water excluded).
- 3. Changing the CII classification categories from the 19 NAICS codes recommended by DWR to the eighteen categories used by the U.S. EPA's Energy Star Portfolio Manager tool.



On March 30, 2023 LVMWD aligned its efforts with the Association of California Water Agencies (ACWA) and agencies across California in signing a coalition letter offering key water use efficiency input for the State Water Resources Control Board (SWRCB) to consider in advance of its formal rulemaking on the Draft Staff Framework for Making Conservation a California Way of Life. Additionally, District staff attended and made public comments during the SWRCB workshop on March 22, 2023. Some of the overarching concerns identified in the State Boards draft rulemakings are:

- A lack of flexibility in compliance
- Highly complex, infeasible variance process with data burden and uncertainty
- Inadequate time for water suppliers to analyze and assess how to implement effectively (develop new programs, develop budgets, and hire staff)
- Timeline, cost and complexity create unintended impacts
- Administrative reporting burdens that don't achieve actual water savings
- Flaws within methodology of performance standards
- Other technical issues

Overall, the newly proposed SWRCB framework standards are a clear divergence from the original intent of DWR's 2018 legislative package designed to build in support for water efficient best practices and continue to encourage more of the innovative and

incredible work that has been accomplished long before there was a call for a statewide framework.

Despite the challenges ahead, the District is well positioned for success in urban water use efficiency due to its early adoption and implementation of budget-based rates in 2013. Resource Conservation staff have and will remain active and engaged with ACWA and CalWEP's water use efficiency working groups to engage and endorse the best possible regulatory outcomes.

In October 2023 water agencies and stakeholders from across California provided oral comment at the SWRCB Workshop. The resounding presence of speakers pushed the SWRCB public hearing to almost 10 p.m. to accommodate the volume of speakers providing formal public comments. LVMWD staff provided oral and written comments regarding the proposed rulemaking.

On November 28, 2023, the Public Policy Institute of California published a blog entitled "A Better Way to Promote Urban Water Conservation." The article addressed three major challenges – very high cost for little benefit, major affordability concerns, and the proposed standards are difficult to meet. The improved approach recommended to revert to outdoor water use standards originally proposed by DWR, cap required water use reductions, and conduct benefit cost assessments at the utility level. On January 4, 2024, the Legislative Analyst's Office (LAO), the California Legislature's Nonpartisan Fiscal and Policy Advisor published their critical assessment of the draft Regulation. They are quoted as stating, "it creates implementation challenges and goes beyond what the legislation requires or DWR recommends." The LAO's formal recommendations consisted of:

- Use its oversight authority to make several changes to the framework in the near term as well as key milestones over the coming years.
- Direct SWRCB to simplify several aspects of the framework.
- Require DWR to provide more technical assistance to supplier.,
- Develop a strategy to manage and take advantage of any water saved due to these regulations.

Editorials continue to be published, highlighting the legislative overstep of the SWRCB's draft rulemaking. There has been some consensus reached in the State Water Board Working Groups. The Outdoor Standard remains the most complex due to alternative compliance pathways being extremely complicated. To date most consensus has been reached in the Reporting Working Group – by simplifying and removing redundant reporting requirements. Commercial Institutional, Industrial (CII) Performance Measures

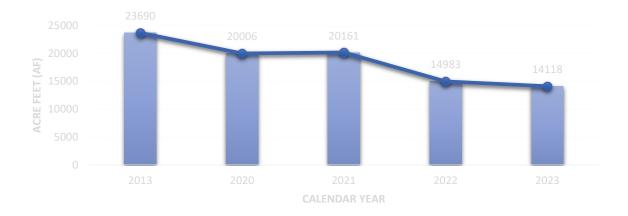
remain a massive lift in additional workload for suppliers as it remains unclear if requested changes will be made. The Administrative Procedures Act prescribes the one-year rule making requirement which places the burden on SWRCB to meet the one-year timeline for adopting the Regulations (August 2024). The revised draft regulation and response to comments are scheduled to be released in February 2024. LVMWD staff remain heavily engaged and are working with ACWA and other partner agencies to put together advocacy efforts with legislators, regulators, and media outlets. Depending on the outcome, the District may seek a regulatory "fix" through legislation if it feels the SWRCB ignored comments and concerns on the draft regulations.

Additional information about the regulatory process is available on the State Water Board's webpage: <u>Rulemaking to Make Conservation a California Way of Life</u> <u>California State Water Resources Control Board</u>.

LVMWD Modeled Trends and Impacts of Proposed Regulatory Framework

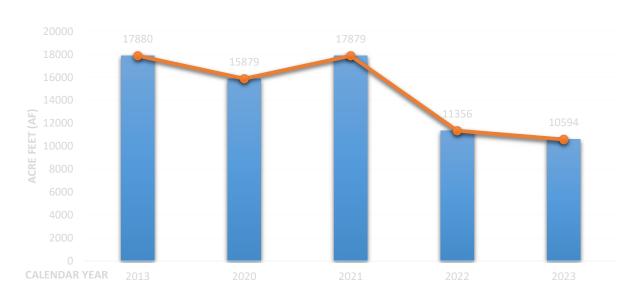
Graph 4 (below) shows the District's downward reduction trend since 2013 of total potable water production. In a 10-year period (2013 to 2023) total production has reduced 9,572 acre-feet. The more recent trend from 2021 to 2023 which includes the 2022 drought emergency outdoor water use restrictions illustrates a 6,043 AF decrease in overall total production.

Although the first part of 2023 was an extremely wet year, this trend of continued conservation marks a movement that LVMWD customers are not returning to old habits but instead making conservation a way of life.



Graph 4: Total Potable Water Production (AF)

Illustrated in **Graph 5 (below)**, is another look at the consistent reduction pattern in residential water consumption from 2013 to 2023. In a span of 10 years, residential water use has dropped 41% percent (7,286 AF), demonstrating the remarkable cutbacks in water use at the residential level. The Single-Family Residential meter class represents approximately 89% percent of the total metered accounts for the District.



Graph 5: Residential Water Consumption (AF)

Graph 6 (next page) depicts residential water use on a per capita basis over time – actuals and projected state targets. Based on preliminary data from the Department of Water Resources (DWR) Water Use Objective Exploration Tool, future modeling simulations indicate a residential GPCD compliance point for LVMWD of 125 GPCD by 2035. Effectively, at the end of 2023, the Districts' water efficiency savings efforts are three percentage points (36% total) away from accomplishing residential water use reduction compliance with the State's current proposed water use objective requirements by 2035. However, it's important to note that adopted regulations could be different from those currently proposed and these future estimates are currently hypothetical and based on DWR's current modeling tool. In 2024, Resource Conservation staff will be verifying DWR's figures with in-house data to determine data confidence limits and margins of error.



Graph 6: Residential GPCD (with Future Regulation Modeling)

While the Exploration Tool and chart can provide estimates on future water use objectives, its projections should not be viewed as accurate or final.

Water Loss Prevention Program

The District completes a water loss audit every year which is then required to go through a third-party validation process before being submitted to the Department of Water Resources. The purpose of the water loss audit is to determine the amount of water loss in the distribution system that is occurring either as a real loss, such as a leak, or an apparent loss, such as incorrect meter readings. This process provides the opportunity for water purveyors to better understand where water is being lost in the distribution system or if corrections need to be made in how water distribution is being accounted.

The District has a relatively new distribution system and historically has very low water loss. However, SB 555 and *Making Conservation a California Way of Life* will require the District to take a closer look at water loss and be more proactive in addressing potential areas of concern and new regulatory requirements. To be prepared for this inevitability, Staff will be organizing a water loss prevention team that will draw on different areas of expertise in the District. Since water loss prevention covers such a wide range of issues, the team will be comprised of staff from operations, customer service, finance and conservation. The initial focus of this effort will be the development of a Water Loss Prevention Program that will outline what actions will need to be taken to address the new regulations, identify proactive measures to document the Districts efforts to minimize water loss and development of a timeline of when these actions will be taken. The water loss prevention team will then be responsible for implementing the program, tracking District efforts and achieving regulatory requirements.

2024 Program Enhancements

Following the passing of the Water Loss Performance Standards in 2023, annually required Water Loss Audits and supporting documentation required by the SWRCB have continued to evolve and become more complex and detailed. Resource Conservation staff have been working diligently to manage the required annual Water Loss Audits. During this process, staff discovered many areas where improvements on its water loss reporting and tracking can be made.

Therefore, Resource Conservation staff are working on the creation of a Water Loss Committee, which will convene on a regular basis. The primary goals of the Committee will be:

- To identify any additional areas where the District needs to improve tracking and reporting of related water loss;
- To create an action items list and keep departments accountable for assigned tasks;
- To actively improve the District's Water Loss Audit data validity score and criteria; and
- To ensure all Committee members are aware of any changes to reporting requirements.

2024 - 2025 – Landscape Transformation - Looking Ahead

Future action items that Resource Conservation staff will prioritize in 2024 -25 include:

- Landscape Design Assistance Landscape designer and/or HOA design palette plans (IRWM Grant – 2024-2026)
- Execute MOU with IEUA and implement Commercial/Public Lands Turn-key turf transformation grant
- Program Efficiency RFP for Irrigation Retrofit Rachio Program to be conjoined into one Program
- Partnership with Malibu Foundation and City of Calabasas– planting micro forests and pollinator gardens Bark Park (2024)
- Implement Turf Transformation Project Equestrian and Westlake Reservoir (2024-2025)
- Hire consultant to create 10-year Conservation Strategic Plan (2025 UWMP) (2024-2025)
 - Will include analyzing impacts of Regulations on District supply/demand
- Pursue additional grant funding for conservation initiatives

Conclusion

District conservation efforts coupled with the overwhelming customer response to the call for improved water efficiency over the last two years positions the District to meet or exceed the current modeling impacts of Conservation as a Way of Life proposed regulations. However, staff maintains a hesitancy with DWR's exploration tool and dataset - that it has the potential to convey an overly optimistic indication of compliance. In 2024, Resource Conservation staff will be verifying DWR's figures with in-house data to determine data confidence limits and margin of error.

The goal moving forward is to maintain conservation as a way of life momentum with customers and continue to build on existing landscape transformation programs to maximize District wide water demand offset. The critical program and infrastructure investments the District has already made and proposed enhancements outlined in this report, positions LVMWD to maintain its legacy as a pioneer in water efficiency and be better positioned to be more resilient for future droughts and water shortage conditions.

While individual programs under the LTP don't by themselves yield a high level of water savings, the conservation messaging that accompanies the programs likely has and will continue to yield substantial savings. When including conservation messaging and other District initiatives such as the installation of advanced meters and the Flow Restriction Program (FRP) – an estimated total of 5,888 AFY in reduced potable water consumption has already been realized in 2023 compared to 2020. In 2023 the District achieved a 30% overall reduction in potable water consumption (compared to 2020). When looking only at residential use, a 33% reduction in GPCD has been achieved. Although the first three months of 2023 were extremely wet, this trend was observed in the dryer months of 2023 as well and fortifies that LVMWD customers are not returning to old habits but instead making conservation a way of life.

A similar trend is being realized with the recycled water system where 4,101 AF of recycled water was delivered in 2023 - a 14% reduction in recycled water usage compared to 2020 (4,765 AF). When comparing the latter half of recycled water usage in 2023 to the same period in 2020, the trend is closer to a 30% reduction. The goal is to consistently reduce recycled water use on landscapes by at least 20% in 2024 and 25% by 2030 compared to 2020. This will make more recycled water available for a higher beneficial use – to augment drinking water supplies via the Pure Water Project.

In summary, the District has a realized commitment to water use efficiency, as demonstrated by the substantial decreases in total and per capita water use our customers have achieved that are well beyond the 20x2020 goals. Assuming the customer response trend continues not to rebound to pre 2020 water usage levels and the District continues to invest and advance LTP initiatives, the District will be well positioned to manage the urban water use budget compliance targets of the proposed regulations.

The overarching concerns of the proposed regulations – cost, feasibility and timeline will have a massive impact on day-to-day operations and may impact the delicate balance of providing critical infrastructural services at affordable rates for our customers. While the water use and efficiency standards appear to be achievable, rigorous proposed reporting requirements, data collection, annual variance requests, and overall compliance requirements may require additional staffing that could impact the rates that we charge customers. Additionally, the threat of non-compliance fines by the State will hinge on the customer response.

Resource Conservation staff will continue to work collaboratively with ACWA, water suppliers, and the State Board to develop alternative compliance pathways that allows suppliers alternative mechanisms to obtain feasible, affordable compliance standards and timelines.