

I hereby certify that the following agenda was posted at least 72 hours prior to the time of the meeting so noticed below at 24251 Los Alisos Boulevard, Lake Forest, California.



DENNIS P. CAFFERTY, Secretary  
of the El Toro Water District and  
the Board of Directors thereof



**AGENDA**  
**EL TORO WATER DISTRICT**  
**REGULAR MEETING OF THE BOARD OF DIRECTORS**

**October 24, 2024**

**7:30 a.m.**

**BOARDROOM, DISTRICT OFFICE**  
**24251 LOS ALISOS BLVD., LAKE FOREST, CA**  
**92630**

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This meeting will be held in person. As a convenience for the public, the meeting may also be accessed by Zoom and will be available by either computer or telephone audio as indicated below. Because this is an in-person meeting and the virtual component is not required, but rather is being offered as a convenience, if there are any technical issues during the meeting, this meeting will continue and will not be suspended.

Members of the public who wish to comment on any item within the jurisdiction of the District or on any item on the agenda, may attend the meeting in person at the District's office or may observe and address the Meeting by joining at this link:  
<https://us02web.zoom.us/j/82401039505> (Meeting ID: 824 0103 9505).

Members of the public who wish only to listen to the telephonic meeting may dial in at the following numbers (669) 900-6833 or (346) 248-7799 with the same Meeting ID noted above. Please be advised the Meeting is being recorded.

**CALL MEETING TO ORDER – President Monin**

**PLEDGE OF ALLEGIANCE – Director Havens**

**ROLL CALL (Determination of a Quorum)**

## ORAL COMMUNICATIONS/PUBLIC COMMENTS

Members of the public may address the Board at this time or they may reserve this opportunity with regard to an item on the agenda, until said item is discussed by the Board. Comments on other items will be heard at the time set aside for "COMMENTS REGARDING NON-AGENDA ITEMS." The public may identify themselves when called on and limit their comments to three minutes.

## ITEMS RECEIVED TOO LATE TO BE AGENDIZED

Determine need and take action to agendize items which arose subsequent to the posting of the Agenda. (ROLL CALL VOTE: Adoption of this recommendation requires a two-thirds vote of the Board members present, or, if less than two-thirds of the Board members are present, a unanimous vote of those members present.)

1. **Consider Board Member's Request for Remote Participation (AB 2449)**

2. **California Special District Association**

Chris Palmer of the California Special District Association will present recognition to the District Board and staff for achievement of the District of Distinction accreditation (Platinum Level) and Certified Special District Manager designation.

3. **Resolution No. 24-10-1 Recognizing Director Adjarian**  
(Reference Material Included)

The Board will consider adopting Resolution No. 24-10-1 which commends Director Fred Adjarian for 5 years of dedicated service to the El Toro Water District and the community it serves.

**Recommended Action:** Staff recommends that the Board approve Resolution No. 24-10-1 which commends Director Fred Adjarian on his 5 years of service to the El Toro Water District.

### RESOLUTION NO. 24-10-1

RESOLUTION OF THE BOARD OF DIRECTORS  
OF THE EL TORO WATER DISTRICT  
COMMENDING DIRECTOR FRED ADJARIAN  
FOR HIS DEDICATED SERVICE TO THE EL TORO WATER DISTRICT

4. **Consent Calendar**

(All matters under the Consent Calendar will be approved by one motion unless a Board member or a member of the public requests separate action or discussion on a specific item)

- a. Consider approving the minutes of the September 26, 2024 Board meeting

**Recommended Action:** The Board will consider approving the above Consent Calendar.

5. **Director Reports for Meetings Attended** (Oral Report)

**GENERAL MANAGER ACTION ITEMS**

6. **Resolution No. 24-10-2 El Toro Water District Administrative Code**  
(Reference Materials Included)

Staff will review and comment on proposed revisions to the District Administrative Code.

**Recommended Action:** The Board of Directors will consider adopting Resolution No. 24-10-2 which adopts the amended El Toro Water District Administrative Code.

RESOLUTION NO. 24-10-2

RESOLUTION OF THE BOARD OF DIRECTORS  
OF THE EL TORO WATER DISTRICT  
ADOPTING THE AMENDED EL TORO WATER DISTRICT  
ADMINISTRATIVE CODE

7. **ETWD Board Vacancy** (Reference Material Included)

The Board of Directors will discuss the filling of a vacancy on the Board created by the resignation of Director Fred Adjarian.

**Recommended Action:** The Board of Directors will provide the District's Secretary with direction as to how to proceed to fill the vacancy created by the resignation of Director Fred Adjarian.

8. **Proposed Updates/Revisions to CSDA Bylaws** (Reference Material Included)

Staff will review and comment on proposed updates/revisions to the California Special District Association (CSDA) Bylaws.

**Recommended Action:** Staff recommends that the Board of Directors consider casting a ballot in favor of the proposed Bylaw updates/revisions as recommended by CSDA.

**GENERAL MANAGER INFORMATION ITEMS**

9. **General Manager's Monthly Report** (Reference Material Included)

Staff will review and comment on the General Manager's Monthly Report.

10. **Legislative Reports** (Reference Material Included)

Staff and General Counsel will review and comment on the Legislative reports.

11. **Public Education and Outreach Report** (Reference Material Included)

Staff will review and comment on the Public Education and Outreach report.

12. **Water Use Efficiency Report** (Reference Material Included)

Staff will review and comment on the Water Use Efficiency Report.

13. **SOCWA Report** (Reference Material Included)

- a. SOCWA Board Meeting – October 3, 2024
- b. SOCWA Engineering Committee Meeting – October 10, 2024
- c. SOCWA Finance Committee Meeting – October 15, 2024 - Cancelled

14. **Municipal Water District of Orange County (MWDOC) Report**  
(Reference Material Included)

- a. MWDOC/MET Directors Workshop – October 2, 2024
- b. MWDOC Admin/Finance Meeting – October 9, 2024
- c. MWDOC Planning/Operations Meeting – October 14, 2024
- d. MWDOC Board Meeting – October 16, 2024
- e. MWDOC Executive Committee Meeting – October 17, 2024
- f. MWDOC/OCWD – October 23, 2024



**15. South Orange County Agencies Group Meeting (Reference Material Included)**

Report on the September 26, 2024 South Orange County Agencies Group Meeting.

**16. Local Agency Formation Commission Report (Reference Material Included)**

Report on the October 9, 2024 LAFCO meeting

**17. ISDOC Meetings Report (Reference Material Included)**

Report on the October 1, 2024 ISDOC Executive Committee meeting

**18. WACO Meetings Report (Reference Material Included)**

- a. Report on the October 4, 2024 WACO meeting
- b. Report on the October 15, 2024 WACO Planning meeting

**COMMITTEE AND GENERAL INFORMATION**

**19. Dates to Remember for October/November (Reference Material Included)**

**COMMENTS REGARDING NON-AGENDA ITEMS**

**ATTORNEY REPORT**

**CLOSED SESSION**

At this time the Board will go into Closed Session as follows:

- 1. Pursuant to Government Code Section 54956.8 to consult with the District's designated negotiator (Dennis P. Cafferty, General Manager) with respect to the terms and conditions pertaining to the proposed exchange and/or transfer of ownership in the Joint Regional Treatment Plant presently owned and operated by the South Orange County Wastewater Authority (in which the District is a member agency) to the Moulton Niguel Water District and the assignment of capacity in the Effluent Transmission Main and Aliso Creek Ocean Outfall from Moulton Niguel Water District to El Toro Water District.

## **REGULAR SESSION**

### **REPORT ON CLOSED SESSION (Legal Counsel)**

Mr. Granito will provide an oral report on the Closed Session.

## **ADJOURNMENT**

*The agenda material for this meeting is available to the public at the District's Administrative Office, which is located at 24251 Los Alisos Blvd., Lake Forest, Ca. 92630. If any additional material related to an open session agenda item is distributed to all or a majority of the board of directors after this agenda is posted, such material will be made available for immediate public inspection at the same location.*

### *Request for Disability-Related Modifications or Accommodations*

*If you require any disability-related accommodation, including auxiliary aids or services, in order to participate in this public meeting, please telephone the District's Recording Secretary, Marisol Melendez at (949) 837-7050, extension 225 at least forty-eight (48) hours prior to said meeting. If you prefer, your request may be submitted in writing to El Toro Water District, P.O. Box 4000, Laguna Hills, California 92654, Attention: Marisol Melendez.*



## STAFF REPORT

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**To: Board of Directors**

**Meeting Date: October 24, 2024**

**From: Dennis Cafferty, General Manager**

**Subject: Resolution No. 24-10-1 Recognizing Director Adjarian**

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## **RESOLUTION NO. 24-10-1**

### **RESOLUTION OF THE BOARD OF DIRECTORS OF THE EL TORO WATER DISTRICT COMMENDING DIRECTOR FRED ADJARIAN FOR HIS DEDICATED SERVICE TO THE EL TORO WATER DISTRICT**

**WHEREAS**, Director Fred Adjarian was elected as a Director of the El Toro Water District in 2014, serving through 2018 and again appointed as a Director in 2023; and

**WHEREAS**, Director Fred Adjarian has provided dedicated public service on the El Toro Water District Board of Directors from 2014 through 2018 and from 2023 through 2024; and

**WHEREAS**, during his tenure, Director Adjarian was a faithful public servant exercising sound stewardship with strong leadership relative to California's most precious resource; and,

**WHEREAS**, during his tenure on the Board of Directors, Director Adjarian has provided unwavering leadership, including serving as Director, providing guidance and insight, and; along with other board members a discerning vision that has helped to implement cost-effective principles and programs, thus allowing the tradition of efficiency and innovation to continue in all operational aspects of the District; and

**WHEREAS**, thanks to the tremendous foresight and planning by Director Adjarian and the rest of the Board of Directors, the El Toro Water District has been an anchor in the water-supply community for 64 years and has received the prestigious District of Distinction accreditation by the Special District Leadership Foundation since 2007 and receiving the District of Distinction Platinum Level accreditation in 2024; and

**WHEREAS**, Director Adjarian has demonstrated his leadership and extensive knowledge of regional water issues during the planning and implementation of the District's comprehensive, multi-phase Recycled Water Expansion Project that enhanced local water supply reliability, reduced dependence on imported water and reduced discharges of treated effluent to the ocean; and

**WHEREAS**, Director Adjarian participated with the Board and management team through a strategic planning process that provided guidance for the District for years to come; and

**WHEREAS**, during Director Adjarian's tenure, El Toro Water District participated in the Baker Water Treatment Plant Project which significantly improved the reliability of the District's potable water supply; and

**WHEREAS**, Director Adjarian served as the ETWD Community Advisory Group Chairman enhancing communication between the District and the community that we serve; and

**WHEREAS**, Director Adjarian was appointed by California Governor Pete Wilson to the San Diego Regional Quality Control Board, serving three years on the Board of Directors from 1996 – 1999; and

**WHEREAS**, highly respected by water colleagues throughout the region, Director Adjarian was an engaged member of the South Orange County Wastewater Authority, Orange County Local Formation Agency; and Association of California Water Agencies – Joint Power Insurance Authority; and

**WHEREAS**, Director Adjarian demonstrated unwavering commitment to the regional water supply planning, providing 45 years of service managing and advising public and private water utilities in Central and Southern California; and

**WHEREAS**, during his tenure, Director Adjarian has consistently supported the El Toro Water District staff.

**NOW THEREFORE, BE IT RESOLVED** that El Toro Water District hereby recognizes the significant contributions of Director Adjarian and expresses its sincere appreciation for his leadership and dedication to the water and wastewater industry, citizens of the El Toro Water District, Orange County, and southern California and wishes Director Adjarian well in all his future endeavors.

ADOPTED, SIGNED AND APPROVED, this 24<sup>th</sup> day of October 2024.

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MARK MONIN, Board President  
El Toro Water District and of the  
Board of Directors thereof

ATTEST:

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DENNIS P. CAFFERTY, Secretary  
El Toro Water District and of the  
Board of Directors thereof

MINUTES OF THE REGULAR MEETING  
OF THE  
BOARD OF DIRECTORS  
OF THE  
EL TORO WATER DISTRICT  
September 26, 2024

President Monin called the meeting of the Board of Directors of the EL TORO WATER DISTRICT to order at 7:30 a.m.

Director Adjarian led the Pledge of Allegiance to the flag.

Directors KAY HAVENS, MIKE GASKINS, MARK MONIN, FRED ADJARIAN, and KATHRYN FRESHLEY participated.

Also present were DENNIS P. CAFFERTY, General Manager, GILBERT J. GRANITO, General Counsel, JUDY CIMORELL, Director of Human Resources, HANNAH FORD, Director of Engineering, VISHAV SHARMA, CFO, SHERRI SEITZ, Public Affairs Manager, VU CHU, Water Use Efficiency Analyst, CAROL MOORE, Laguna Woods City Council Member (Zoom), and MARISOL MELENDEZ, Recording Secretary.

Determination of a Quorum

Five Board members were present for the meeting, therefore a quorum was determined.

Oral Communications/Public Comments

There were no comments.

### Items Received Too Late to be Agendized

President Monin asked if there were any items received too late to be agendized.

Mr. Cafferty replied no.

### Consent Calendar

President Monin asked for a Motion.

Motion: Director Adjarian made a Motion, seconded by Vice President Gaskins to approve the Consent Calendar.

### Roll Call Vote:

|                        |     |
|------------------------|-----|
| Director Adjarian      | aye |
| Director Freshley      | aye |
| Director Havens        | aye |
| Vice President Gaskins | aye |
| President Monin        | aye |

### Directors Reports for Meetings Attended

Vice President Gaskins stated that he attended the ISDOC Executive meeting, the RRC meeting, the MWDOC P&O meeting, the MWDOC Board meeting, the SOCWA Board meeting, the WACO meeting, the LAFCO meeting, the Agenda Review meeting, the ETWD Engineering and Finance meeting, the ETWD regular Board meeting, will be attending SOCAG today, the OC Water Summit tomorrow, and the President/VP/GM meeting on Monday.

President Monin stated that he attended the ISDOC Executive Committee meeting, the MWDOC P&O meeting, the MWDOC Board Workshop, the WACO meeting, the CSDA Annual Conference, the MWDOC A&F meeting, the Agenda Review meeting, the WACO Planning meeting, the MWDOC Board meeting, ETWD's Engineering and Finance meeting, ETWD's regular Board meeting, and will be at the OC Water Summit tomorrow.

Director Adjarian stated that he attended the WACO meeting, the WACO Planning meeting, ETWD's two Board meetings, and will be attending the OC Water Summit tomorrow.

Director Freshley stated that she attended the MWDOC P&O Committee meeting, the MWDOC Workshop, the MWDOC Board meeting, ETWD's Engineering and Finance meeting, ETWD's regular Board meeting, the SOCWA Board meeting, the RRC meeting, the WACO meeting, the LAFCO meeting, the Laguna Woods City Council meeting, and will be attending the OC Water Summit tomorrow.

Director Havens stated that she attended the MWDOC P&O meeting, the MWDOC Met Directors Workshop, the WACO meeting, the MWDOC A&F meeting, the MWDOC Board meeting, the two ETWD Board meetings, will be attending the SOCAG meeting today, and the OC Water Summit tomorrow.

#### General Manager Action Items

##### City of Laguna Woods Easement – Fire Station

Mr. Cafferty stated that the proposed fire station's location is adjacent to the P-1 Pump Station Site access road on the City of Laguna Woods City Centre Park property. The City of Laguna Woods has requested the District to grant an easement that will allow access up the District's road to ingress the proposed fire station and exit onto Moulton Parkway. Mr. Cafferty further stated that the District will consider granting access via the easement subject to separate agreements involving the required improvements. He added that Orange County Fire Authority design process will involve improvements of the road to ensure that it can structurally handle the fire equipment and that it is sufficiently wide enough for two-way traffic.



Director Freshley inquired about the District's water main lines in the area and asked if the fence will be moved. Mr. Cafferty explained that the District has multiple water lines in the area and the protection of the water lines will be included as a part of the design. He also explained that there are two gates; one at the bottom of the road and one at the top of the road. Mr. Cafferty stated that the upper gate would remain but the lower gate would be removed.

Mr. Cafferty pointed out that the fire station adds an important benefit to the Laguna Woods Village Community and also to the District because of its proximity to the P-1 Pump Stations facility should emergency fire services be needed.

Mr. Cafferty stated that no Board action is necessary today as staff will continue to work with the City of Laguna Woods on an easement agreement and an action item will be brought back next month.

#### Resolution No. 24-9-1 El Toro Water District Administrative Code

Mr. Cafferty stated that Section 7120 Establishment of Accounts has not been revised since 2003 and changes include increasing the administrative fee to establish an account from \$15.00 to \$20.00, requesting email addresses from customers, and requesting a W-9 forms for non-residential accounts.

Director Havens asked if any of the increased fees are subject to the Proposition 218 legal process. She also noted that the fees are diminutive specifically on the credit worthiness section.

Mr. Granito explained that the fee increases are not subject to the Proposition 218 legal process. However, the fees cannot exceed the reasonable cost for providing for said services.

Mr. Cafferty stated there was no change to the \$50.00 deposit for credit worthiness for both residential and non-residential. After further discussion the Board decided for the deposit to remain the same.

President Monin asked for a Motion.

Motion: Director Adjarian made a Motion, seconded by Director Freshley to adopt Resolution No. 24-9-1 which adopts the amended El Toro Water District Administrative Code.

#### Roll Call Vote

|                        |     |
|------------------------|-----|
| Director Adjarian      | aye |
| Director Freshley      | aye |
| Director Havens        | aye |
| Vice President Gaskins | aye |
| President Monin        | aye |

#### General Manager Information Items

##### General Manager's Monthly Report

Mr. Cafferty noted that the Recycled Water Sales for August of 2024 is the highest sales month of recycled water ever.

Mr. Cafferty stated that he attended a productive meeting yesterday with District accounting staff and US Bank Representatives regarding potential future plans.

##### District of Distinction Accreditation

Mr. Cafferty announced that Chris Palmer from CSDA plans to be here next month to present the District of Distinction Accreditation Award to the Board. He added that El Toro Water District first pursued the District of Distinction in 2007 and has maintained it since. Mr. Cafferty stated that the recent accreditation raised the District's DOD level to Platinum which represents the highest DOD level available.

## Legislative Reports

There were no comments.

## Public Education and Outreach Report

### Laguna Woods Village Television (LWVT)

Ms. Seitz stated the next Laguna Woods Village Television interview will feature Director Adjarian whose tentative topic is emergency preparedness.

Ms. Seitz reported that the District's newsletter was sent to customers last week, will be published in the Laguna Woods Globe, and will be sent out via e-blast.

Ms. Seitz stated staff will begin the website redesign with Big Wig Monster Media LLC soon and they will provide an introductory presentation at next month's Board meeting.

Ms. Seitz stated the channel (Adopt a Channel program) has been cleaned up and staff is now working with the County to cut down the dry bush and vegetation.

Ms. Seitz stated a photo of President Monin receiving the District of Distinction Platinum Award at the CSDA Conference is in the package and staff will do a press release next month after CSDA attends the District's Board meeting.

Ms. Seitz reported on the recent community events that District staff has participated in including a successfully led OC Grand Jury Inspection Trip at R-6 last month. Ms. Seitz also provided upcoming community event dates that staff will be participating in.

Ms. Seitz stated that staff will be meeting with Kurt Wiemann from Laguna Woods Village to discuss AB 1572 updates.

### Water Use Efficiency Report

Mr. Chu reported that total consumption was up approximately 9% compared to the same month last year and recycled water usage also increased by 18% in comparison to last year. He added that Laguna Woods Village usage (excluding irrigation) is also trending up higher than usual at 18%.

### SOCWA Reports

Director Freshley provided a report on the recent SOCWA meetings.

### MWDOC

There were no comments.

### LAFCO

Director Freshley stated there was discussion regarding the clarity of legislative interfacing responsibilities which has been historically held by the CAL LAFCO General Manager and there will be further updates at the annual conference.

### ISDOC

President Monin stated that Executive Committee elections are complete.

### WACO

President Monin stated the Mayor of Santa Ana helped put together a great presentation with the City of Santa Ana. He added that their next event will be held by the County of Orange on the topic of Orange County Action Planning.

### COMMITTEE AND GENERAL INFORMATION

#### Dates to Remember for September/October

There were no comments.

### Comments Regarding Non-Agenda Items

Director Adjarian announced that he will be resigning his position on the El Toro Water District's Board of Directors, effective October 31, 2024. He thanked everyone for their support over the years.

Mr. Cafferty provided an overview of the timelines for filling the Board vacancy following Director Adjarian's leaving of office.

### Attorney Report

Mr. Granito provided a legislative update on AB 1827, which addresses concerns associated with the Otay Water District's tiered rate structure. He explained the significance of the legislation and its impact on water districts across the state. Mr. Granito mentioned the appeal filed by the Otay Water District to the Supreme Court, highlighting the ongoing legal challenges.

Mr. Cafferty stated that from a legislative standpoint, AB 1827 is important because it speaks to the methodology that most agencies including El Toro Water District use.

### Closed Session

At approximately 9:02 a.m. the meeting went into a closed session. At this time, everyone left the meeting except for the Board members, General Counsel, and the General Manager.

### Regular Session

At approximately 10:11 a.m. regular session resumed. Also, at this time Ms. Melendez returned to the meeting.

Attorney Report on Closed Session

Mr. Granito reported that no reportable action was taken during the closed session.

Adjournment

There being no further business to come before the Board, the meeting was adjourned at approximately 10:11 a.m.

Respectfully submitted,

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MARISOL MELENDEZ  
Recording Secretary

APPROVED:

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MARK MONIN, President of  
the El Toro Water District and the  
Board of Directors thereof

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DENNIS P. CAFFERTY, Secretary  
of the El Toro Water District and  
the Board of Directors thereof



## STAFF REPORT

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**To: Board of Directors**

**Meeting Date: October 24, 2024**

**From: Dennis Cafferty, General Manager**

**Subject: Administrative Code Amendment**

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At the November 2023 Board meeting the Board approved the initial version of the El Toro Water District Administrative Code. Staff continues to work to transition existing policies into the Administrative Code with revisions or updates as appropriate.

The current proposal moves the District's Rules and Regulations for Recycled Water from Schedule 3-S of the Rules and Regulations into the Administrative Code as Section 10,000.

The attached redline document includes the redlined cover page and Table of Contents as well as the excerpt from the Administrative Code in which changes or additions are proposed to the Recycled Water Rules and Regulations

There are a number of minor non-substantive changes to correct spelling and grammar errors as well as modify the structure and section references to the Administrative Code format.

In addition, several changes were made to update the document to appropriately reference the recently adopted Cross Connection Control Policy Handbook which replaced Title 17.

A clean copy of the Recycled Water Rules and Regulations is also attached.

**Recommended Action:**

The Board of Directors will consider adopting Resolution No. 24-10-2 which adopts the amended El Toro Water District Administrative Code.

### RESOLUTION 24-10-2

RESOLUTION OF THE BOARD OF DIRECTORS  
OF THE EL TORO WATER DISTRICT  
ADOPTING THE AMENDED EL TORO WATER DISTRICT  
ADMINISTRATIVE CODE

**RESOLUTION NO. 24-10-2**

**RESOLUTION OF THE BOARD OF DIRECTORS  
OF THE EL TORO WATER DISTRICT  
ADOPTING THE AMENDED EL TORO WATER DISTRICT  
ADMINISTRATIVE CODE**

**WHEREAS**, the Board of Directors of the El Toro Water District adopted an Administrative Code defining the policies the El Toro Water District in November, 2023; and

**WHEREAS**, it is in the best interest of the District that the District's Administrative Code be amended in its entirety to incorporate updates to, and additional policies in, the existing Administrative Code; and

**WHEREAS**, the Board of Directors of the El Toro Water District has reviewed the Administrative Code which is incorporated herein by this reference.

**NOW THEREFORE, BE IT RESOLVED**, that the Board of Directors of the El Toro Water District does hereby adopt the Amended El Toro Water District Administrative Code effective October 24, 2024.

**ADOPTED, SIGNED AND APPROVED** this 24th day of October 2024.

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MARK MONIN, President  
El Toro Water District and of the  
Board of Directors thereof

ATTEST:

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DENNIS P. CAFFERTY, Secretary  
El Toro Water District and of the  
Board of Directors there of



**RULES AND REGULATIONS  
FOR  
RECYCLED WATER**

**REDLINE DOCUMENT**

## **§10000      RECYCLED WATER RULES & REGULATIONS – TABLE OF CONTENTS**

### **10100    Introduction and Purpose**

- 10110    Introduction
- 10120    Benefits of Recycled Water Use
- 10130    Recycled Water Regulatory Requirements
- 10140    Purpose of Rules and Regulations
- 10150    Summary of Authority

### **10200    Definitions**

### **10300    General Requirements**

- 10305    Approved Use
- 10310    Requirement to Use Recycled Water
- 10315    New Development
- 10320    Retrofit/Conversion of Existing Site
- 10325    Process of Determination
- 10330    Application Procedure
- 10335    Use Permit
- 10340    Service Connections and Size of Service Line
- 10345    Backflow Protection
- 10350    Regulatory Agencies
- 10355    Scheduling and Emergency Connections
- 10360    Maintenance
- 10365    Recycled Water Non-Conformance

### **10400    Permitting Process**

- 10410    Permitting Process Overview
- 10420    Determination Notice
  - 10421      Preliminary Determination Notice
  - 10422      Notice of Objection
  - 10423      Final Determination Notice
- 10430    Use Permit
  - 10431      Application for Recycled Water Service Process
  - 10432      Use Permit Submittal Process
  - 10433      Use Permit Requirements and Force
  - 10434      Use Permit Life
- 10440    Submittals and Records
  - 10441      Facility Layout Documents
  - 10442      On-site Irrigation Systems Design Documents
  - 10443      Final Record Drawings and Documents
  - 10444      Temporary Service Connection
- 10450    Reporting
- 10460    Upgrades/Alterations/Repairs

### **10500    Technical Requirements**

- 10510    General
- 10520    On-site Irrigation Systems
- 10521    Design Responsibility

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| 10523 | Service Line                                          |
| 10524 | Service Pressure                                      |
| 10525 | Design Application Rates                              |
| 10526 | System Layout                                         |
| 10527 | On-site Separation Requirements                       |
| 10528 | System Control Devices                                |
| 10529 | Identification Requirements                           |
| 10530 | Plan Requirements                                     |
| 10531 | Meter and Irrigation Criteria                         |
| 10532 | Standard Recycled Water Notes                         |
| 10540 | On-site Recycled Water Retrofit Procedures            |
| 10541 | Recycled Water Retrofit Procedures                    |
| 10542 | On-site Irrigation System Requirements                |
| 10543 | Retrofit Plan Requirements                            |
| 10544 | Submittals                                            |
| 10545 | General Recycled Water Retrofit Construction Sequence |
| 10546 | Conversion from Recycled Water Use                    |
| 10550 | Construction Water Facilities                         |
| 10551 | Service Connections                                   |
| 10552 | On-site Distribution Facilities                       |
| 10553 | Storage Facilities                                    |
| 10554 | Distribution Vehicles                                 |
| 10555 | Identification                                        |
| 10560 | Protective Measures                                   |

## **10600 Construction Specifications**

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| 10611 | Trade Names or Approved Equivalents           |
| 10612 | Permits and Licenses                          |
| 10613 | Liability                                     |
| 10614 | Loss and Damage                               |
| 10615 | Legal Responsibility                          |
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| 10620 | Material Specifications                       |
| 10621 | Identification Requirements                   |
| 10622 | Color                                         |
| 10623 | Buried Piping Identification (Warning) Tape   |
| 10624 | Identification / Warning Tags                 |
| 10625 | Warning Labels                                |
| 10626 | Identification Signs                          |
| 10627 | Sprinkler Labeling/Tags                       |
| 10628 | Miscellaneous Irrigation Facilities           |
| 10629 | Recycled Water Service Materials              |
| 10630 | Potable Water Plumbing                        |
| 10631 | Construction Water Facilities                 |
| 10640 | Methods of Construction                       |
| 10641 | Offsite Potable and Recycled Water Facilities |
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|       |                                                             |
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| 10650 | Inspection Including Inspection Items                       |
| 10651 | General                                                     |
| 10652 | Inspection Items                                            |
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| 10654 | Notification and Approvals                                  |
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| 10672 | On-site Facilities                                          |
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| 10690 | Cross Connection Test                                       |
| 10691 | Case I (Recycled Water – no other water source on site)     |
| 10692 | Case II (Recycled Water with Potable Water service on site) |
| 10693 | Site Specific Requirements                                  |

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## **§10100      INTRODUCTION AND PURPOSE**

### **§10110      INTRODUCTION**

El Toro Water District (District) serves recycled water to a portion of its service area via its recycled water distribution system. Recycled water service by the District is provided subject to the availability of facilities or adequate capacity in facilities, funds, or financing for the construction thereof, or all of the foregoing, and is available on the following terms and conditions, including all terms, conditions, and charges hereinafter established and provided for. Neither these rules nor any other act of or on behalf of the District shall create a right to service of any kind until a "Will Serve" letter has been issued by the District, and all fees and charges imposed by the District have been paid. This is a declaration of existing policy and not intended as a change by District of any of its policies or requirements. The availability of such service on the basis herein set forth is intended to be furnished to each member of the public or each segment of the public on the same basis to the extent all such applicants, owners, or customers are similarly situated and desire to be served, and may be served in an equal and comparable manner as determined by the Board to be in the best interest of the District.

The District's existing recycled water distribution system is depicted on Exhibit 1. Exhibit 1 is by this reference incorporated herein and may be changed by the District from time to time. In such instances, the revised Exhibit 1 or portions thereof will be substituted to these Rules and Regulations. Each applicant shall verify the location of the existing recycled water facilities relative to its property and confirm with the District if there is available capacity in that portion of the recycled water system. Facts necessary for such verification may be obtained from the District. However, the fact that the District provides such information is not a commitment to provide recycled water or a guarantee that capacity will be available at the time of application therefore.

All recycled water service from the District shall be available in accordance with the following Rules and Regulations, and on the basis of the charges established therefore from time to time and subject to all penalties and charges for violations thereof, or any statutes applicable to the District.

### **§10120      BENEFITS OF RECYCLED WATER USE**

As it is the mandate of the State of California to effect conservation of water resources whenever possible, the District's goal has always been directed toward collecting, treating, and reclaiming sewage and wastewater and beneficially reusing the resulting recycled water. Using recycled water for landscape irrigation uses provides the following benefits:

- Reduce dependence on imported water by using potable water for household consumption, sanitary uses and recycled water for irrigation;
- Enhance local supplies and reliability by using the water more than once;
- Create a more self-reliant water system, particularly important in times of unplanned service interruptions such as drought and emergencies; and
- Reduce treated wastewater discharge to the ocean.

Like most water districts in south Orange County, El Toro Water District relies on imported water from the Sacramento-San Joaquin Bay Delta and the Colorado River to meet the majority of its customer demands. By expanding the recycled water usage, the District will reduce the dependency on imported potable water for irrigation and therefore, enhance overall supply reliability while reducing the amount of treated wastewater discharged into the ocean.

## **§10130      RECYCLED WATER REGULATORY REQUIREMENTS**

The California Legislature has declared its intent to promote the use of recycled water. Recycled water is a valuable resource and a significant component of California's water supply. Landscape irrigation with recycled water is a viable strategy to reduce potable water demand and to reduce the volume of water wasted after a single use. When used in compliance with the Recycled Water Policy, adopted by State Water Board Resolution No. 2009-001 in 2009, California Code of Regulations (CCR) Title 22, and all applicable state and federal water quality laws, the State Water Board finds that recycled water is safe for approved uses, and strongly supports recycled water as a safe alternative to potable water for landscape irrigation uses.

In July 2009, the State Water Resources Control Board (SWRCB) adopted General Waste Discharge Requirements for Landscape Irrigation Uses of Municipal Recycled Water (Water Quality Order No. 2009-0006-DWQ) in order to satisfy the requirements of California Water Code (Water Code) Section 13552.5. El Toro Water District, being the "Producer and Distributor" of the recycled water for landscape irrigation uses, has obtained coverage under the above General Permit (Order No. 2009-0006-DWQ).

For this General Permit, "recycled water" is limited to disinfected tertiary recycled water produced by a public entity at a municipal wastewater treatment plant, as defined in Water Code Section 13625(b)(1) and Section 13625(b)(2).

Specified uses of recycled water considered "landscape irrigation" under the General Permit include any of the following:

- Parks, greenbelts, and playgrounds;
- School yards;
- Athletic fields;
- Golf courses;
- Cemeteries;
- Residential landscaping, HOA maintained area, common areas (individual owned residences are not eligible for coverage under this General Permit);
- Commercial landscaping, except eating areas;
- Dust Suppression for Construction;
- Industrial landscaping, except eating areas; and
- Freeway, highway and street landscaping.

In order to obtain coverage under this General Permit, El Toro Water District has met the following treatment and use standards:

- a. As the “Producer”, the District is producing disinfected tertiary recycled water, as defined in CCR Title 22, Sections 60301.230 and 60301.320, at a municipal wastewater treatment plant;
- b. As the “Distributor”, the District will comply with the applicable uniform statewide reclamation criteria established pursuant to Water Code Section 13521 (i.e., CCR Title 22 Section 60301 et. Seq., hereafter “Title 22 Requirements”);
- c. The District, as the “Producer and Distributor” shall ensure that Users comply with the applicable uniform statewide reclamation criteria established pursuant to Title 22 Requirements; and
- d. The District, as the “Producer and Distributor” shall satisfy all applicable requirements of the Recycled Water Policy.

The use of recycled water for landscape irrigation has characteristics which can create water quality and public health problems if improperly treated and managed. It is necessary to establish requirements for landscape irrigation uses of recycled water that ensure protection of water resources and public health (e.g., pathogenic organisms, salinity and other waste constituents, and potential for unauthorized discharges). SWRCB General Permit established requirements to manage recycled water for landscape irrigation uses in a manner that is protective of public health and the environment.

#### **§10140      PURPOSE OF RULES AND REGULATIONS**

It is the intent of the District that recycled water be used in a manner that is in compliance with the SWRCB General Permit and with any and all applicable Federal, State, and local statutes, ordinances, regulations and other requirements. All recycled water produced by the District for irrigation meets, or exceeds, the stringent water quality requirements for California as established by the SWRCB General Permit and the California Department of Public Health.

These Rules and Regulations have several purposes:

1. Assure that the recycled water use in El Toro Water District conforms with SWRCB General Permit Order No. 2009-0006-DWQ.
2. Summarize the general requirements for the usage of recycled water.
3. Establish a process for acquisition and maintenance of a Recycled Water Use Permit.
4. Establish the technical requirements for on-site facilities to be constructed or provided by the customer for new sites or sites to be retrofitted to recycled water.
5. Establish general technical specifications and on-site testing procedures.



6. Establish specific operational and maintenance requirements for using recycled water including description of the determination of violations and enforcement procedures.

## **§10150      SUMMARY OF AUTHORITY**

The area within the District's boundary that has recycled water is located within the jurisdiction of the Santa Ana Regional Water Quality Control Board (RWQCB) Region 8. El Toro Water District is responsible as the "Producer and Distributor" of the recycled water for all monitoring and compliance reporting to the Santa Ana RWQCB as required by the above SRWQCB General Permit. El Toro Water District is responsible for issuing Use Permits within the District, as well as ensuring that all customers conform with the requirements of these Rules and Regulations. The District, acting as an agent of the Santa Ana RWQCB, is authorized to review, approve or disapprove, and initiate enforcement or mitigation actions for all actions or proposed actions relating to the production, distribution, or use of recycled water by the Users within the District' jurisdictional area.

Any User of recycled water shall allow Santa Ana RWQCB, El Toro Water District, or an authorized representative of these parties, or any representative from the State Water Resources Control Board Division of Drinking Water (DDW) or the Orange County Health Care Agency (OCHCA), upon presentation of proper credentials, to inspect the facilities and the Approved Use Area of any recycled water to ascertain whether the User is complying with these Rules and Regulations. The User, the Operator and any operations personnel, are obligated to cooperate with those making the inspection and to assist in the performance of any operational tests as requested.

It is the District's policy, if recycled water service is determined by the District to be economically, financially, and technically feasible in accordance with the requirements contained in these Rules and Regulations, the applicant, owner or customer will be required to utilize recycled water service. The use of potable water for landscape irrigation uses when recycled water is available is contrary to the District's policy, and shall not be considered the most beneficial use of a natural resource and shall be avoided to the maximum extent possible. If recycled water is available to a prospective customer and the on-site conversion or retrofit is not completed within a stipulated time period (see Section ~~3.13~~10365 of this document ("Recycled Water Non-Conformance") for additional information), the customer's irrigation consumption will be billed at the District's Tier III (Inefficient) rate for potable water.

## **§10200      DEFINITIONS**

For the purpose of these Rules and Regulations, the following terms, phrases, words and their derivations shall have the meaning given below. When not inconsistent with the context, words used in the present tense include the future, words in the plural include the singular number, and words in the singular include the plural number. The word "shall" is always mandatory and not merely directory.

1. *Air-Gap Separation*: a physical break between a supply pipe and a receiving vessel. The air gap shall be at least double the diameter of the supply pipe, measured vertically above the top rim of the vessel, and in no case less than one inch.
2. *Agronomic Rate*: the rate of application of recycled water to plants that is necessary to satisfy the plants' watering and nutritional requirements, considering supplemental water (e.g., precipitation) and supplemental nutrients (e.g., fertilizers), while preventing or strictly minimizing the amount of nutrients that pass beyond the plants' root zone.
3. *Applicant*: an owner, developer, builder, engineer, or authorized representative, firm, corporation, association, or agency that applies for recycled water service under the terms of the Rules and Regulations. A successful applicant becomes a recycled water customer.
4. *Application Rate*: the rate at which water is applied to an irrigation or construction area, expressed in inches per day or gallons per minute per acre.
5. *Approved backflow prevention assembly*: a device installed to protect the potable water supply from contamination; this device shall be approved by the DDW and the District in conformance with applicable portions of ~~Title 17 of the California Code of Regulations (Title 17)~~the Cross-Connection Control Policy Handbook.
6. *Approved use*: an authorized use of recycled water in a manner, and for a purpose, specifically designated in a Use Permit issued by the District and in compliance with any and all applicable regulatory agency requirements.
7. *Automatic System*: with reference to landscape irrigation systems, automatic controllers, valves, and associated equipment required for the programming of effective water application rates when using recycled water.
8. *ANSI*: American National Standards Institute.
9. *ASTM*: American Society for Testing and Materials.
10. *AWWA*: American Water Works Association.
11. *AWWA Guidelines*: AWWA's *Guidelines for Distribution of Non-potable Water*, California-Nevada Section, latest edition, or *Guidelines for the Onsite Retrofit for Facilities Using Disinfected Tertiary Recycled Water*, latest edition.
12. *AWWA Standards*: AWWA's *Standards for Construction Materials*, latest edition.
13. *Board*: Board of Directors of the El Toro Water District.
14. *Commercial use*: water used for toilets, urinals, decorative fountains, cooling towers, and other related uses.

15. *Construction use*: an approved use of recycled water to support construction activities such as soil compaction and dust control during grading.
16. *Contractor*: the person(s), firm, or corporation entering into a contract with the District, owner, or customer for the performance of work on all or any portion of facilities subject to the Rules and Regulations.
17. *Conversion*: changing onsite supply from potable water to recycled water in cases that sites were designed and installed to use recycled water. (see also “retrofit”).
18. *County of Orange Department of Public Health (COPDH)*: See Orange County Health Care Agency, Department of Environmental Health (OCHCA).
19. *Cross connection*: any unprotected actual or potential connection between a potable water system and any source or system containing unapproved water or a substance that is not or cannot be approved safe, wholesome, and potable; bypass arrangements, jumper connections, removable sections, swivel or change-over devices and other devices through which backflow could occur, shall be considered to be cross connections; cross connections shall be as defined in ~~Title 17, California Code of Regulations~~ the Cross-Connection Control Policy Handbook.
20. *Cross-Connection Control Policy Handbook (CCCPH)*: The primary objective of the Cross-Connection Control Policy Handbook (CCCPH) is the protection of public health through the establishment of standards intended to ensure a public water system’s (PWS) drinking water distribution system will not be subject to the backflow of liquids, gases, or other substances into the distribution system.
21. *Customer*: any person, group, firm, partnership, corporation, association or agency accepting recycled water from the District’s recycled water facilities for use in accordance with the Rules and Regulations.
22. *Design area*: a site, with well-defined boundaries, proposed to receive recycled water for an approved use as delineated in an application for a Use Permit.
23. *Design consultant*: any person or firm registered with the State as an engineer or landscape architect to provide site layout, landscaping, or irrigation system design services.
24. *Direct beneficial use*: the use of recycled water that has been transported from the point of production to the point of use without an intervening discharge to waters of the State.
25. *Direct overspray*: any discharge of water directly onto areas other than that for which the application of recycled water is approved.

26. *Discharge*: any release or distribution of recycled water to a use area or disposal site/mechanism (outfall, live stream discharge, municipal sewage system); all discharges of recycled water must be approved by the regulatory agencies.
27. *Discharge Permit*: a permit issued by the Santa Ana Regional Water Quality Control Board (SARWQCB) for the discharge of recycled water.
28. *Disinfected Tertiary Recycled Water*: filtered and subsequently disinfected wastewater that meets the criteria defined in CCR Title 22, Sections 60301.230 and 60301.320.
29. *Distributor*: any combination, either in whole or in part, of a Recycled Water Wholesaler, Recycled Water Supplier, or Recycled Water Retailer.
30. *District*: the El Toro Water District.
31. *Effluent*: treated wastewater discharged from a water recycling plant.
32. *Engineer*: a duly qualified, registered engineer authorized to act for the District.
33. *Engineering Report*: the report filed with DDW to produce or supply recycled water for direct reuse. The report shall clearly indicate the means for compliance with the Title 22 Requirements (Title 22 Section 60323).
34. *General public*: any person(s) at large who may come in contact with facilities and/or areas where recycled water is approved for use.
35. *GPM*: gallons per minute.
36. *HGL*: hydraulic grade line.
37. *Hose bib*: a faucet or similar device to which a common garden hose can be readily attached (Title 22 Section 60301.400).
38. *Incidental runoff*: unintended small amounts (volume) of runoff from recycled water use areas, such as over-spray from sprinklers that escapes the recycled water use area.

Water leaving a recycled water use area is not considered incidental if it is part of the facility design, if it is due to excessive application, if it is due to intentional overflow or application, or if it is due to negligence.

39. *Industrial use*: water used for industrial processes such as cooling, flushing, or construction, and other related uses.
40. *Infiltration rate*: the rate at which soil will accept water without overland flow, expressed in inches per hour.

41. *Inspection and testing:* District will perform regularly scheduled on-site visits with operational testing accompanied by customer representative. The inspection and testing schedule will be determined by the District. In no circumstance will the schedule be longer than every four years.
42. *Inspector:* any person(s) authorized by the District to perform inspection of either on-site or offsite facilities prior to construction, during construction, after construction and during operation.
43. *Installer:* a person(s) or firm performing work necessary to construct or install equipment or facilities subject to the Rules and Regulations.
44. *Irrigation Management Plan:* all applied nutrients from all sources (directly applied and as contained in the recycled water) and the agronomic application rate and seasonal need for the specific plants being grown to assure that nutrients are not applied beyond the vegetative uptake rate and discharged into the environment.
45. *Irrigation System:* all equipment and materials required for applying irrigation water to the design area from the service connection including all piping, valves, sprinkler heads, controllers, and appurtenances.
46. *Landscape impoundment:* a body of recycled water, which is used for aesthetic enjoyment, landscape irrigation or which otherwise, serves a function not intended to include public contact.
47. *Landscape irrigation:* use of recycled water for the propagation and maintenance of trees, shrubs, groundcover, and turf.
48. *Manager:* the General Manager of the District or the person authorized by the Board or the General Manager to act on his behalf.
49. *MGD:* million gallons per day.
50. *Non-potable water:* water that is not intended for human consumption in conformance with the standards referred to in the definition of Potable Water, below, such as potable water downstream of an approved backflow device within an irrigation system.
51. *Offsite facilities:* existing or proposed facilities under the control of the District, from the source of supply to the point of connection with the customer's onsite facilities, up to and including the District's meter and meter box.
52. *Offsite supervisor:* a qualified person designated by the District to be responsible for the safe and efficient operation of the District's recycled water distribution system; this person shall be knowledgeable in the construction and operation of recycled water distribution systems and in the application of State and local

guidelines, criteria, standards, and regulations governing the use of recycled water.

53. *On-site facilities*: existing or proposed facilities within property under the control of the customer or owner, normally downstream of the District's meter tailpiece.
54. *On-site supervisor*: a qualified person designated by a recycled water customer and approved by the District to be responsible for the safe and efficient operation of the customer's recycled water system; this person shall be knowledgeable in the construction and operation of recycled water and irrigation systems and in the application of State and local guidelines, criteria, standards and regulations governing the use of recycled water; this person shall be trained in cross-connection control to the satisfaction of the District.
55. *Operations personnel*: any employee of a customer, whether permanent or temporary, or any contracted worker whose/who's regular or assigned work involves the supervision, operation or maintenance of equipment on any portion of on-site facilities using recycled water.
56. *Operator*: any person(s) or firm, who by entering into an agreement with a customer is responsible for operating on-site facilities.
57. *Orange County Health Care Agency, Department of Health (OCHCA)*: the local health agency responsible for on-site public health issues and cross connection control.
58. *Owner*: any holder of legal title, contract purchaser, or lessee under a lease with an unexpired term of more than one (1) year, of property for which recycled water service has been requested or established.
59. *Pantone<sup>TM</sup>*: Also known as Pantone 512 is purple color standard system for recycled water.
60. *Permit*: the processed and approved application to and agreement with the District for recycled water service.
61. *Person*: any public or private individual, firm, partnership, corporation, agency, or association including homeowner's association.
62. *Plans*: the plans, working drawings, detail drawings, specifications, profiles, typical cross sections and supplemental drawings or reproductions thereof that show/show locations, character, dimensions or details of the work.
63. *Plan Check & Inspection Fees*: the fees to be paid to the District by the applicant at the time he submits improvement plans for District approval.
64. *POC*: point of connection.

65. *Ponding*: retention of recycled water on the surface of the ground or other natural or manmade surface that exceeds the surface infiltration rate and that is unable to runoff due to gravity such that a hazard or potential hazard to the public health results.
66. *Potable water*: water that conforms to the latest edition of the United States Public Health Service Drinking Water Standards, or other applicable standards.
67. *PPC*: positive pressure check.
68. *Producer*: an agency that produces recycled water.
69. *PSI*: pounds per square inch.
70. *Property Owner*: the holder of legal title, contract purchaser, or lessee under a lease with an unexpired term of more than one (1) year, of property for which recycled water service has been requested or established.
71. *Purple Book*: an aggregate of California health laws related to recycled water, including excerpts from the Health and Safety Codes, Water Code and Titles 22 and 17 of the California Code of Regulations, latest edition.
72. *PVC*: polyvinyl chloride.
73. *Quick Coupling*: For recycled water a quick coupler valve shall be one (1) piece 1-inch ACME thread with a vinyl locking effluent cover.
74. *Reclamation Plant*: the District treatment facilities that receive and treat wastewater for beneficial uses.
75. *Record Drawings*: the drawings that correctly show the completed facilities as constructed or modified (as-built).
76. *Recreational impoundment*: a body of recycled water used for recreational activities including, but not limited to, fishing, boating, and/or swimming; allowable uses will depend on ~~treatment~~the treatment level of the recycled water.
77. *Recycled Water*: the water served from the District's offsite facilities as a result of treatment of municipal wastewater, that is suitable for a direct beneficial use or a controlled use that would not otherwise occur. For El Toro Water District, it is disinfected tertiary recycled water which is produced from wastewater by District Water Recycling Plant and is suitable for direct beneficial uses in accordance with Title 22.
78. *Recycled Water Distribution System*: the recycled water pipelines constructed by the District to distribute the recycled water to the appropriate customers.

79. *Recycled Water Facilities*: the District facilities that produce, convey, supply and store recycled water.
80. *Recycled water service connection*: the point of connection of the customer's recycled water line with the recycled water service line of the District, which shall normally be the downstream end of the recycled water meter tailpiece.
81. *Recycled water service line*: the District's facility between its recycled water distribution system and the recycled water service connection.
82. *Recycled water use area (Use Area)*: an area where recycled water is to be used which is defined by its boundaries or project area (e.g. a golf course, residential neighborhood, school yard, park, etc.) so as to be consistent with these Rules and Regulations, SWRCB General Permit, and Title 22 Section 60301.920.
83. *Recycled water user (User)*: a person or entity that uses recycled water.
84. *Reduced pressure principle backflow prevention assembly*: a backflow prevention device incorporating not less than two check valves, an automatically-operated differential relief valve located between the two check valves, and a completely closing shut-off valve on each side of the check valve assembly, equipped with test cocks for testing.
85. *Regulatory agencies*: those public agencies legally constituted to protect the public health and water quality and having regulatory authority over the District, such as SARWQCB, DDW, and OCHCA, and others as may be appropriate.
86. *Regulations*: these "Rules and Regulations for Recycled Water," prepared pursuant to the SARWQCB General Permit and all rules and regulations of other local or State agency or other regulations referred to and incorporated herein.
87. *Retrofit*: modifying on-site facilities that were originally designed to accommodate potable water use so that they now accommodate recycled water use in compliance with the Regulations (see also "conversion").
88. *Runoff*: flow of water along the surface of the ground or other natural or man-made surface, including but not limited to, pedestrian walkways, streets, playground surfaces, and grassy slopes.
89. *SARWQCB*: the Santa Ana Regional Water Quality Control Board, See Discharge Permit.
90. *Secondary effluent*: wastewater that has been treated to a minimum level of effluent quality based on rules and regulations of the Environmental Protection Agency and defined with respect to biochemical oxygen demand, suspended solids, fecal coliform bacteria, and pH.



91. *Security Deposit*: the monies required to be deposited with the District for the purpose of guaranteeing payment of monthly or bimonthly utility bills rendered for recycled water service.
92. *Service*: the furnishing of recycled water to a customer through a metered connection to the on-site facilities.
93. *Service connection*: See Recycled Water Service Connection
94. *Standard specifications*: specifications adopted by the District for construction of potable water, sewer, and recycled water facilities, “*Standard Specifications and Plans*.”
95. *State*: State of California.
96. *State Water Resources Control Board, Division of Drinking Water (DDW)*: the primary State agency responsible for protection of public health and the regulation of drinking water. The Legislature has defined several specific regulatory responsibilities of DDW related directly or indirectly to recycled water use activities including establishment of statewide water reclamation criteria advising the Regional Water Boards in the drafting of water reclamation requirements; review and approval of certain proposed water reclamation projects; abatement of contamination resulting from use of recycled water where public health is seriously threatened; and control of cross-connections between potable and recycled water systems.
97. *Tenant*: any person, group, firm, partnership, corporation, association, or agency that pays rent to occupy and use land or a building.
98. *Tertiary effluent*: secondary effluent that has been disinfected and filtered consistent with provisions in *Water Recycling Criteria*.
99. *Terms*: all terms relating to matter of opinion or judgment, such as in regards to approvals, requirements, directions, or acceptances, denote the option or judgments of the District.
100. *Transfer*: the conveyance or movement of recycled water from one agency to another agency. Transfer includes the conveyance of control or responsibility of a volume of recycled water stored in a storage facility commonly owned or controlled by more than one agency.
101. *Treated wastewater*: wastewater treated in accordance with the requirements of “*Water Recycling Criteria*.”
102. *UL*: Underwriter’s Laboratory.

103. *Unauthorized discharge*: any release of recycled water that violates the Rules and Regulations or any applicable federal, state, or local statute, regulation, ordinance, contract, or other requirement. Per Water Code Section 1359.2, discharge of recycled water, without regard to intent or negligence, not authorized by waste discharge requirements issued pursuant to Water Code Sections 1360-13274 (e.g., RWD, WDRs, waiver, etc.), 13523 (i.e., WRRs), or 1323 (i.e., Master Reclamation Permit).
104. *UPC*: Uniform Plumbing Code.
105. *Use area*: the specific area contained within a use site, designated to be served with recycled water through on-site facilities.
106. *Use site*: the specific property, containing one or more use areas, designated by the legally recorded tract and lot or parcel map description.
107. *Use Permit*: a permit issued by the District to a recycled water service applicant after the satisfactory completion of the service application procedures set forth in the Regulations; this permit constitutes a service agreement that legally binds the customer/customer to all conditions in the Rules and Regulations and to any and all applicable regulatory agency requirements.
108. *User*: a person or entity that uses recycled water.
109. *Violation*: noncompliance with any condition or conditions of the Rules and Regulations and/or a Use Permit by any person, action or occurrence, whether willfully or by accident.
110. *Water reclamation*: the renovation of wastewater to produce a product that is approved for specific beneficial uses by the appropriate regulatory agency.
111. *Water Recycling Criteria*: the Uniform statewide recycling criteria established in California Code of Regulations Title 22 by DDW for each varying type of use of recycled water where the use involves the protection of public health (Water Code Section 13521).
112. *Water Recycling Plant*: the District treatment facilities that receive and treat wastewater for beneficial uses.
113. *Windblown spray*: dispersed, airborne recycled water capable of being transmitted through the air by natural or manmade wind to locations other than that for which the direct application of recycled water is approved.
114. *Work*: the entire improvement proposed to be constructed pursuant to a legal agreement and consistent with the Rules and Regulations.

**§10300      GENERAL REQUIREMENTS**

**§10305      APPROVED USE**

The Rules and Regulations for Recycled Water pertain to recycled water service to land or improvements, or both, lying within the boundaries of the District and within the areas where recycled water facilities are available. If the District has determined that recycled water shall be provided in accordance to the requirements contained in this section, such service shall be provided only if a permit for such recycled water service is obtained in the manner hereinafter provided.

The acceptable uses of recycled water include any of the following:

- Parks, greenbelts, and playgrounds;
- School yards;
- Athletic fields;
- Golf courses;
- Cemeteries;
- Residential landscaping, HOA maintained area, common areas (individual owned residences are not eligible for coverage under this General Permit);
- Commercial landscaping, except eating areas;
- Dust Suppression for Construction;
- Industrial landscaping, except eating areas; and
- Freeway, highway and street landscaping.

Each such use must be considered for approval by the District on a case-by-case basis, and the District may determine in its discretion whether it is feasible to furnish recycled water for the specific use involved. Prior to approving such uses, the District may, in its discretion, set forth specific requirements as conditions to providing such services and/or require specific prior approval from the appropriate regulatory agencies.

Recycled water may only be used for the acceptable uses in areas approved by the District. The District's determination of feasibility will be based on the following factors:

1. Whether recycled water may be furnished for the intended use at a reasonable cost to the customer and the District;
2. Whether recycled water use is in accordance with the standards of treatment and water quality requirements set forth in Title 22, Chapter 4, of the Code of California Regulations and with the SWRCB General Permit; and
3. Whether the use of recycled water can be made in a manner not detrimental to public health.

#### **§10310      REQUIREMENT TO USE RECYCLED WATER**

The District will identify customers who are located within an area identified as capable of receiving service from the District's recycled water system and will determine the feasibility of providing recycled water service to these customers. The District will also review applications for new permits to determine the feasibility of providing recycled water service to these applicants.

Potential recycled water customers identified by the District that elect not to use recycled water that is available but can use recycled water in compliance with State and County regulatory requirements, these Rules and Regulations and can meet the criteria identified in Section 13550 of the California Code of Regulations, may be subject to the provisions in Section ~~3.13~~10365 of this document ("Recycled Water Non-Conformance"). Potential recycled water customers that believe recycled water cannot be used at their site shall provide written justification to support their position. The District assumes identified customers meeting the above referenced criteria can use recycled water until or unless the potential recycled water customer can provide documentation otherwise.

If the District's recycled water distribution system has not yet been extended to the vicinity of the customer's property, the District may require a written commitment from the customer to use recycled water when the extension has been made. A customer that does not provide a written commitment may be subject to the provisions of Section ~~3.13~~10365 of this document ("Recycled Water Non-Conformance").

If the District does not require the use of recycled water service, the customer may obtain recycled water service upon request but only if the District has determined that recycled water service to the customer is feasible and authorizes such use.

#### **§10315      NEW DEVELOPMENT**

If recycled water service is determined by the District to be feasible, applicants for new recycled water service shall be required to install on-site facilities to accommodate both potable water and recycled water service in accordance with these Rules and Regulations. Applicants for new or expanded water service shall be responsible for the full capital cost of on-site recycled water facilities and applicant-furnished offsite distribution facilities required as a condition of service.

#### **§10320      RETROFIT/CONVERSION OF EXISTING SITE**

The District may also require existing customers to retrofit existing on-site water service facilities to accommodate recycled water service. Except as otherwise provided herein or approved by the District, when an existing customer is required by the District to convert to recycled water service, the customer will pay the reasonable capital costs of retrofitting the on-site water service facilities and the District will provide the offsite facilities necessary to deliver recycled water to the meter.

## **§10325      PROCESS OF DETERMINATION**

The following describes the process by which the District will determine which potential recycled water customers may be served, contact by District, response by potential recycled water customers, and appeal to the District's General Manager or Board.

The District staff will identify potential sites at which it believes recycled water may be used. Identified potential recycled water use sites must meet the following criteria:

1. The recycled water is to be served to an available location. "Available location" shall mean: the District's recycled water distribution system is in a street adjacent to the subject property; or the District has notified a customer that if a written commitment to use recycled water has been received from the customer, the District will complete an extension of the distribution system to a street adjacent to the customer's property, ~~and or~~ the customer has failed or refused to provide the written commitment, and any determination sought by the customer pursuant to these herein provisions has become a final and non-appealable determination that recycled water is feasible;
2. The District can provide recycled water in the needed volume, quality and flow rate at the pressure available from the existing recycled water distribution system;
3. The anticipated use(s) at the subject site are allowed for in the SWRCB General Permit;
4. The construction/retrofit can be accomplished in compliance with DDW, District, and OCHCA requirements;
5. The anticipated use(s) will not negatively impact public health; and
6. Recycled water is available at a reasonable cost, meaning; the commodity cost for recycled water is no more than the commodity cost for a like quantity of non-interruptible potable water.

The District will contact the recycled water use site representative to discuss the use of recycled water. Potential recycled water customers shall respond to District inquiries as to its ability to use recycled water. Customer and the District shall engage in dialogue to determine if recycled water can be used.

At the completion of the dialogue, the potential recycled water customer shall have sixty (60) calendar days to indicate its intent regarding the use of recycled water. If recycled water can be used, the customer shall work with the District toward the successful introduction and use of recycled water including obtaining regulatory approvals. If, according to the customer, recycled water cannot be used, customer shall provide written documentation to the District to support their position.

District staff will review documentation provided by the customer supporting why recycled water cannot be used. In the case of potential customers that provide sufficient evidence as to why recycled water cannot be used, the District shall consider the matter closed.

In the case of potential customers that elect not to respond to the District's inquiries or do not provide documentation as to why recycled water cannot be used, the District, with General Manager approval, will send a certified letter to the potential recycled water customer urging contact with the District to continue a meaningful dialogue regarding the potential use of recycled water. The potential recycled water customer shall have thirty (30) calendar days in which to contact the District.

If the potential recycled water customer does not respond within thirty days (30) calendar days, a second certified letter will be sent notifying the potential recycled water customer that the billing rate per Section ~~3.13~~10365 of this document ('Recycled Water Non-Conformance') will begin after sixty (60) calendar days after notification.

The potential recycled water customer who contends that recycled water is not feasible, based on the criteria noted above, may appeal to the General Manager by filing a written appeal within thirty (30) calendar days of the date of the notice described above. The General Manager shall consider the information provided and respond within thirty (30) calendar days to the potential recycled water customer.

The decision of the General Manager may be appealed to the Board in writing filed with the District's Board of Directors within thirty (30) calendar days of the General Manager's decision. The Board will conduct a hearing to consider the appeal at the next regularly scheduled Board meeting. The decision of the Board shall be transmitted in writing to the potential recycled water customer within the thirty (30) calendar days of the hearing. The decision of the Board is final.

#### **§10330      APPLICATION PROCEDURE**

The steps for obtaining recycled water service are summarized in Section ~~4.10~~400 of this document (Permitting Process). A prospective customer of recycled water must submit to the District an application for recycled water service using the forms presented in the Appendices of this document. The application shall include a preliminary package and plan with the application as summarized in Section ~~4.3.1~~10431 (Application for Recycled Water Service Process).

Based on the review of the application, the District shall determine if the property to be served is in a suitable area for recycled water use, and if the necessary quantity and quality of recycled water can be made available to the applicant. The District will notify the owner/customer if a preliminary approval is granted for the recycled water service application.

#### **§10335      USE PERMIT**

Once the preliminary approval is granted by the District, the owner or customer can proceed with the preparation of the plans and submittal of the Use Permit. The applicant shall agree to comply with the Rules and Regulations by signing the Use Permit form. The steps for obtaining the approved Use Permit are summarized in more

detail within Section 4-10400 of this document (Permitting Process) but are summarized below:

- Applicant/Owner/Customer submits plans, irrigation plans, work schedule and required fees along with Use Permit;
- District reviews and approves plans and finalizes Recycled Water Service Application;
- District obtains DDW and OCHCA approval; as necessary;
- Applicant/Owner/Customer has operator (installation contractor/maintenance contractor) complete Operation Certification portion of the User Permit;
- On-site pre-construction meeting (applicant begins construction/retrofit of on-site facilities);
- District issues recycled water Use Permit;
- On-site construction is completed;
- Potable water backflow prevention devices, where required, are installed and tested; District performs final inspection, operational testing, and cross-connection testing;
- Recycled water meter is installed; and
- District grants final approval for recycled water service and completes Use Permit.

#### **§10340      SERVICE CONNECTIONS AND SIZE OF SERVICE LINE**

The District reserves the right to determine the size of the recycled water service lines, the service connections, and the meters and shall also have the right to determine the kind and size of backflow protection devices for the potable water service, and any and all other appurtenances to the service.

The recycled water service lines shall be installed to a curb line or property line of the customer's property, abutting upon a public street, highway, alley, easement, lane, or road in which are installed the recycled water mains of the District.

The District reserves the right to limit the area of land under one ownership to be supplied by one recycled water service connection and recycled water meter. A recycled water service connection and recycled water meter shall not be used to supply adjoining property of a different owner. When property provided with a recycled water service connection and recycled water meter is subdivided, such connection and meter shall be considered as serving the lot or parcel of land that it directly or first enters. Additional recycled water mains and/or recycled water service lines will be required for all subdivided areas in accordance with these Rules and Regulations.

All recycled water used on any premises where a meter is installed must pass through the meter. Customers shall be held responsible and charged for all recycled water passing through the meters.

Every recycled water service line shall be equipped with an angle meter stop on the inlet side of the meter; such angle meter stop being intended exclusively for the use of the District in controlling the recycled water supply through the recycled water service line. If the angle meter stop is damaged by the customer's use to an extent requiring replacement, such replacement shall be at the customer's expense.

Should a recycled water service line installed pursuant to the request of the applicant, owner, or customer be of the wrong size or installed at a wrong location; the cost of all changes required shall be paid by the applicant, owner, or customer.

All recycled water services provided prior to final street improvements shall be considered temporary and the costs for all repairs or changes required to be performed by the District shall be paid by the applicant, owner, or customer.

No person shall make connection to the District's recycled water system facilities without a permit or except as provided in the permit issued by the District.

#### **§10345      BACKFLOW PROTECTION**

The purpose of these provisions is to protect the District's potable water supply against actual or potential cross-connections by isolating, within the premises, contamination or pollution that may occur because of undiscovered or unauthorized cross-connection on the premises. ~~These provisions are in accordance with the California Codes of Regulations, Title 17 (Public Health), entitled "Regulations Relating to Cross-Connections"~~ Additional information concerning backflow prevention may be obtained from the "Manual of Cross-Connection Control", Foundation for Cross-Connection Control and Hydraulic Research, University of Southern California, School of Engineering. These provisions shall comply in accordance with DDW's Cross-Connection Control Policy Control Handbook (CCCPH) ~~once adopted~~.

These provisions shall be in addition to and not in lieu of the controls and requirements of other regulatory agencies, such as local governmental agencies, DDW and OCHCA. These regulations are intended to protect the District's potable water supply and are not intended to provide regulatory measures for protection of users from the hazards of cross-connections within their own premises. Notwithstanding these provisions, the District accepts no responsibility for cross-connections or resulting hazards or contamination.

Backflow prevention devices, as required in these provisions, shall be provided, installed as close to the meter as practically possible, per District standards, tested, and maintained by the applicant, owner, or customer at their expense. The devices shall be located downstream of the meter at a location approved by the District. All devices shall be readily accessible for testing and maintenance and no device shall be submerged at any time or exposed to recycled water, direct overspray, or runoff at any time.

From time to time, representatives of DDW, District, and/or OCHCA may conduct surveys of any premises where recycled water service is provided by the District (Per California Health & Safety Code, Section 116800-116820). The purpose of such surveys is to determine if any actual or potential cross-connections exist. The applicant, owner, or customer shall provide reasonable cooperation in facilitating such surveys.



Backflow protection for the District's potable water supply shall be provided on each water service connection to:

1. Premises having an auxiliary water supply such as recycled or non-potable water. The only exception to this requirement is for homeowner association sites where recycled water is being proposed to irrigate common area on a portion of a single family residence. If the backflow protection of the District's potable water supply is not feasible or practicable, the District, with DDW's approval, may increase the required frequency of the cross connection testing in lieu of the construction of the backflow device at each residence. The waiving of the backflow protection will only be allowed on a case by case basis and only if approved in writing by DDW and the District.
2. Premises on which any substance is handled in such fashion that could permit entry into the water system. This shall include the handling of process waters and waters originating from the District's system that have been subject to deterioration in sanitary quality.
3. Premises that have internal cross-connections, unless such cross-connections are abated to the satisfaction of the District and approved by DDW and/or OCHCA.
4. Premises having intricate plumbing and piping arrangements or where not all portions of the premises are readily accessible for inspection purposes.
5. Premises having a repeated history of cross-connections being established or re-established.

The type of protection required is related to the degree of hazard that exists on the premises served. The type of protective device that may be required (listed in increasing level of protection) includes Double Check Valve (DC), Reduced Pressure Principle Backflow Prevention Device (RPPD), and an Air Gap Separation (AG). The water user may choose a higher level of protection than required by the District. The minimum types required, relative to various situations shall be as required by California Codes of Regulations, Title 17, DDW's Cross-Connection Control Policy Handbook (CCCPH) or to the extent not covered thereby, as determined by DDW, District and/or OCHCA. ~~These provisions shall comply with DDW's Cross-Connection Control Policy Control Handbook (CCCPH) once adopted.~~

It shall be the duty of the water user on any premises on which backflow prevention devices are installed to have competent inspections made at least once a year, or more often in those instances where successive inspections indicate repeated failure. All inspections and testing shall be performed by a tester certified by OCHCA the California-Nevada Section of the American Water Works Association (CA-NV AWWA) in accordance with ANSI standards. The devices shall also be tested immediately after they are installed, relocated or repaired and shall not be placed in service unless they are functioning as required.

The District will notify the applicant, owner, or customers when routine testing is needed and also supply them with the necessary forms that must be filled out each time a

device is tested or repaired. The notice will include the date when the test must be completed, generally 30 days after the date of the notice. Copies of the completed forms shall also be sent to OCHCA. The applicant, owner, or customer shall notify the District any time the device is repaired, replaced or relocated. A device shall be repaired or replaced by, and at the expense of the water user, whenever it is found to be defective. Records of all such tests and repairs shall be maintained by the water user. The District may request records regarding any backflow prevention device on the premises.

A tester shall not remove, replace, or relocate a backflow prevention device without the approval of Orange County Environmental Health and/or the District water agency in whose jurisdiction the device is located. When a device is installed, repaired, or relocated, it shall be tested prior to being placed into service.

A tester shall submit a test report to Orange County Environmental Health and the District water supplier in whose jurisdiction the backflow prevention device is located for every test that he/she performs. The test report shall be filled out completely with all required information. The test report shall indicate any failure of the device and any type of repair including cleaning. The test report shall be submitted within ten (10) days of testing the device. If there must be a delay in the submission of a report, the tester shall contact the District water agency Cross Connection Specialist in whose jurisdiction the device is located, or Orange County Environmental Health.

Where the premises other than single-family residences contain dual or multiple water systems and piping, the exposed portions of pipelines shall be painted, banded, or marked at sufficient intervals to distinguish clearly which water is safe for drinking purposes and which is not safe. All outlets intended for drinking purposes shall be plainly marked to indicate that fact.

In the event of contamination or pollution of the potable water system due to a cross-connection on the premises, DDW, District, and OCHCA shall be contacted within 24 hours by the person responsible for the water system so that appropriate measures may be taken to mitigate the contamination or pollution.

When the District determines that water uses or conditions encountered by the District represent a clear and immediate hazard to the District's water supply that cannot be immediately abated, the District shall institute the procedure for discontinuing water use. Conditions or water uses that create a basis for water service termination shall include, but are not limited to, the following:

1. Refusal to install a required backflow prevention device.
2. Refusal to test a backflow prevention device.
3. Refusal to repair or replace a faulty backflow prevention device.
4. Direct or indirect connection between the District's water system and a sewer.

5. Unprotected direct or indirect connection between the District's water system and a system or equipment containing contaminants, or an auxiliary water system.
6. A situation which presents an immediate health hazard to the District's water system, as determined by DDW, District, or OCHCA.

## **§10350      REGULATORY AGENCIES**

The following is a summary of the regulatory agencies that may be involved in the approval process or future inspections as the result of using recycled water within an approved property:

| <b><i>Regulatory Agency and Responsibility</i></b>                                                                                                                                        | <b><i>Address</i></b>                                                             | <b><i>Phone #</i></b> |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------|
| <b>El Toro Water District</b><br>"Producer and Distributor" of Recycled Water                                                                                                             | 24251 Los Alisos Boulevard<br>Lake Forest, CA 92630                               | (949) 837-7050        |
| <b>State Water Resources Control Board<br/>Division of Drinking Water</b><br>State agency responsible for protection of public health and regulation of drinking water and recycled water | Division of Drinking Water<br>2 MacArthur Place, Suite 150<br>Santa Ana, CA 92707 | (714) 558-4410        |
| <b>Orange County Health Care Agency</b><br>Local health agency responsible for on-site public health issues and cross connection control                                                  | 1241 E. Dyer Road, Suite 120<br>Santa Ana, CA 92705-5611                          | (714) 433-6266        |
| <b>Santa Ana RWQCB (Region 8)</b><br>SAWQCB General Permit                                                                                                                                | 3737 Main Street, Suite 500<br>Riverside, CA 92501-3348                           | (951) 782-4130        |

## **§10355      SCHEDULING AND EMERGENCY CONNECTIONS**

Recycled water shall be used in compliance with these Rules and Regulations. The District reserves the right to control and schedule the use of recycled water if, in the opinion of the District, scheduling is necessary for purposes including, but not limited to, the maintenance of an acceptable working pressure in the recycled water system and providing for reasonable safeguards in relation to public health.

Guidelines for such scheduling shall be as deemed appropriate by the District. The District reserves the right to supply potable water to the District's recycled water distribution system from time to time, as the District determines to be necessary or useful to augment the recycled water supply to such system. The supply of such other water to the system shall be at the District's discretion and shall not change the rates or charges billed for recycled water service nor relieve any recycled water customer of the applicable requirements of these Rules and Regulations.

If in the opinion of the District, an emergency exists whereby all or a portion of the recycled water system is not available, the District may approve a temporary connection to the potable water system. Before such temporary connection is made, the portion without recycled water shall be isolated by an air gap separation from the remainder of the recycled water system either at individual services or on the offsite system, as

determined by the District and an approved backflow prevention device or devices of the type determined in accordance with this document, shall be installed on the potable water line or lines in accordance with these Rules and Regulations and any and all applicable rules and regulations of DDW and OCHCA. Before the emergency connection or connections shall be removed, whether on-site or offsite, the customer shall notify the District's cross-connection department. This emergency connection or connections shall be removed before connection is re-established to the remainder of the recycled water system.

#### **§10360      MAINTENANCE**

The applicant, owner, or customer is responsible for maintaining all on-site water and recycled water facilities that are under the ownership of parties other than the District.

No person shall place, dispose, or deposit or permit the placement, disposal or deposit of oil, toxic, hazardous or contaminated liquid or waste, trash, dirt, building materials or other substances, objects or obstructions in, on or around water or recycled water meter boxes, and it shall be the responsibility of each applicant, owner, or customer to prevent meter boxes, or other District facilities from becoming obstructed or obscured by such applicant, owner, or customer's trees, shrubs, plants, or in any other manner so as to impede their use or access to them or make their location difficult to determine. If such substances, objects or obstructions are not cleaned or removed or permitted to obscure or impede such facilities, the District may, after providing reasonable notice to the applicant, owner, or customer, accomplish the cleaning and removal and charge the applicant, owner, or customer for the cost of doing so.

It is the desire of the District to effect conservation of water resources whenever possible, such measures being consistent with legal responsibilities to utilize the water resources of the State of California and the District. Facilities for irrigation of new and existing parks, median strips, landscaped public areas or landscaped areas, lawns, or gardens surrounding condominiums, townhouses, apartments, and industrial parks shall be designed and installed in such a way as to conserve water.

Recycled water is considered a water resource by the District, therefore, the same restrictions shall apply for all uses of recycled water as for potable water. Rate and extent of application of water shall be controlled by the user so as to minimize run-off from the irrigated areas.

#### **§10365      RECYCLED WATER NON-CONFORMANCE**

For potential recycled water customers that elect not to comply with Section ~~3-210310~~ of this document ("Requirements to Use Recycled Water") and fail to provide reason(s) why recycled water cannot be used, all metered potable water irrigation use at the site that could otherwise be served with recycled water shall be billed at the District's Tier III (Inefficient) rate for potable water until the site is converted or acceptable justification as to why the recycled water cannot be used is provided. No refunds will be provided unless a justification is accepted by the District.

Potential recycled water customers identified and contacted by the District that elect not to use recycled water or are not cooperating with the District as defined previously in this section of this document, will be billed as stated in the above paragraph. In cases, where the potential recycled water customer elects not to pay their bill, that customer will be subject to the provisions of ~~Schedule 2-B~~Section 7130 of the District's ~~Rules and Regulations~~Administrative Code.

If an end user that was previously accepting recycled water elects to suspend or terminate delivery of recycled water and use potable water for reasons other than those identified above, that end user may be subject to the provisions noted above. In addition, the end user will be responsible to pay all costs for the construction of the new potable water service as well as any and all corresponding on-site and off-site costs as the result of the new potable water service.

## **§10400      PERMITTING PROCESS**

### **§10410      PERMITTING PROCESS OVERVIEW**

The permitting process typically includes the following principal steps:

- Preliminary Determination Notice
- Notice of Objection (if necessary)
- Final Determination Notice
- Application for a Use Permit
- Approval of the Applicant's Plans
- Construction
- Final inspection, operational testing and cross-connection testing
- Final approval for recycled water service and complete Use Permit

Each of these principal steps is discussed in the following sections. A more detailed listing of each step of the process from application through final approval is shown in Appendix ~~43~~, Checklist/Action Request Form for Obtaining Recycled Water Service.

## **§10420      DETERMINATION NOTICE**

### **§10421      Preliminary Determination Notice**

When recycled water is available for a prospective customer, the District will mail a Notice of Determination to the prospective customer. A sample Preliminary Determination Notice is presented in Appendix ~~21~~. The Notice of Determination will include as a minimum: descriptive information about the District's recycled water system, indication of specific customer service(s) to which the Determination applies, customer responsibilities under the Rules and Regulations, current recycled water pricing information, descriptive information about on-site facilities requirements

necessitated by initial use or conversion to recycled water, the opportunity for objection to the Determination, and a proposed date for the subsequent Final Determination

Notice. The date of the Preliminary Determination Notice shall begin a time period of thirty (30) consecutive calendar days during which the prospective customer may file an objection to the Preliminary Determination Notice or any information presented in it.

#### **§10422      Notice of Objection**

The prospective customer(s) may file a notice of objection with the District within thirty (30) consecutive calendar days of the date of any preliminary determination notice to the prospective customer(s), and may request reconsideration of the determination or modification of the proposed conditions or schedule for conversion. The objection must be in writing and specify the reasons for the objection.

The preliminary determination shall become final if the prospective customer(s) does not file a timely objection. Staff shall review the objection and shall confirm, modify, postpone or abandon the preliminary determination.

#### **§10423      Final Determination Notice**

Upon issuance of a final determination by staff, the prospective customer(s) may appeal the determination to the General Manager of the District. The District shall issue a waiver to the prospective customer(s) where its objection or appeal is successful.

The District shall make final determination regarding recycled water service by written notice to the prospective customer(s). A sample Final Determination Notice is presented in Appendix 32. Such notice shall include as a minimum: reference to a predecessor preliminary determination notice, indication of specific customer service(s) to be affected by the determination, and the requirement of and timing for on-site facility construction. Upon receipt of final determination that a property shall be served with recycled water, the prospective customer(s), owner, or applicant shall obtain a Use Permit. The date of the final determination notice shall begin a 180 consecutive calendar day time period during which the prospective customer(s) must obtain the Use Permit, complete on-site facility construction and become ready to receive recycled water service.

#### **§10430      USE PERMIT**

#### **§10431      Application for Recycled Water Service Process**

A prospective customer of recycled water must submit to the District an application for recycled water service. An application form is included in Appendix 54. The application shall include a preliminary application package and plan with the application form. The prospective customer of recycled water shall contact the District to obtain information regarding HGL and pressure zone, water service and meter sizes, locations, use site

number, hydrologic subarea, and recycled water quality. The following items are to be included in an application package and plan:

- Completed application form.
- Required drawing(s) showing the specific recycled water use areas and the on-site irrigation systems, as a minimum, as required by Section ~~5.2.10~~10530 of this document (Plan Requirements).
- Required fees and deposits – due prior to approval.

The applicant shall agree to comply with the Rules and Regulations by signing the application form.

The District shall review the material and respond within two (2) weeks of receipt of a completed application package. The District may request additional information it deems necessary. The District shall determine if the property to be served is in a suitable area for recycled water use, and if the necessary quantity and quality of recycled water can be made available to the applicant.

#### **§10432      Use Permit Submittal Process**

Once the preliminary approval is granted by the District, the owner or customer can proceed with the preparation of the plans and submittal of the Use Permit. The Use Permit form is included in Appendix ~~65~~. Submitted along with the Use Permit form shall be: the completed irrigation plans for construction or retrofit; the work schedule for construction or conversion; and the required fees and deposits. The use site number (provided by the District) and customer account number shall be the Use Permit numbers for general reference purposes.

The following is a summary of the steps for obtaining the approved Use Permit:

- Applicant/Owner/Customer submits plans, irrigation plans, work schedule and required fees along with Use Permit;
- District reviews and approves plans and finalizes Recycled Water Service Application;
- District obtains DDW and OCHCA approval; as necessary;
- Applicant/Owner/Customer has operator (installation contractor/maintenance contractor) complete Operation Certification portion of the User Permit and submits form to District;
- On-site pre-construction meeting scheduled (applicant begins construction/retrofit of on-site facilities);
- District issues recycled water Use Permit;
- On-site construction is completed (except recycled meter is not installed);
- Potable water backflow prevention devices installed and tested (if applicable prior to water service activation);



- Applicant submit redline construction set of record drawings to the District for review;
- Applicant has a final set of record drawings prepared and submits all required documents to the District;
- Applicant requests final inspection by the District;
- District performs final inspection, operational testing, and cross-connection testing;
- Recycled water meter is installed; and
- District grants final approval for recycled water service and completes Use Permit.

The checklist/action request form summarizing the steps for obtaining recycled water service is included in Appendix [43](#).

The District will submit the following types of recycled water projects to the DDW and OCHCA for review and approval prior to their construction:

1. New recycled water infrastructure projects that are co-located adjacent to drinking water facilities (i.e. reservoirs, main trunk lines, etc.);
2. Recycled water treatment plant upgrades;
3. Retrofit recycled water use sites; and
4. New recycled water use sites.

#### **§10433      Use Permit Requirements and Force**

The customer who has obtained a Use Permit shall adhere to requirements prescribed by the Rules and Regulations and to additional and future requirements prescribed by the District or governing agencies pertaining to recycled water service.

The Use Permit shall come into force after the on-site project has begun construction and is being inspected by the involved regulatory agencies. The Use Permit shall be the binding agreement between the District and the customer.

A copy of the current Use Permit must be on file at the customer's office and available for review at all times.

#### **§10434      Use Permit Life**

The Use Permit shall stay in effect indefinitely, but may be temporarily or permanently revoked if:

- A change of customer occurs and the customer has not notified the District via the Recycled Water Service Application form Appendix [54](#) of the impending change thirty (30) consecutive calendar days prior to change;



- A change of operator occurs and the customer has not notified the District via the Recycled Water Use Permit form, Appendix ~~6~~5 of the pending change thirty (30) consecutive calendar days prior to the change;
- A change of recycled water use occurs inconsistent with the Use Permit; and
- A violation occurs and results in termination of service.

A new completed Recycled Water Service Application form, refer to Appendix ~~5~~4, must be submitted to the District to reinstate a Use Permit that has been cancelled.

## **§10440      SUBMITTALS AND RECORDS**

### **§10441      Facility Layout Documents**

Facility layout drawings shall be submitted as specified within Section ~~5~~10500 of this document (Technical Requirements) by the customer to the District and approved by the District prior to commencing any installation of facilities.

The drawings shall be signed by the design consultant and shall include the construction of the use area, and the on-site irrigation system, as a minimum. A materials list shall also be submitted to the District and it shall include the following:

*Off-site or On-site Distribution Facilities* - The diameter, approximate length, and construction material of all offsite or on-site distribution recycled water mains (pressurized).

*On-site Storage Facilities* - The estimated number and locations of fixed storage tanks or ponds and the approximate volume of each.

*Recycled Water Volume* – The maximum and average amounts in gpm that will be drawn from the District's recycled water distribution system, and the hours of operation.

### **§10442      On-site Irrigation Systems Design Documents**

On-site irrigation systems design criteria and plans shall be submitted as specified within Section ~~5~~10500 of this document (Technical Requirements) by the customer to the District and approved by the District prior to commencing any installation of facilities. The plans shall include the meter criteria and the District's Standard Notes as a minimum.

### **§10443      Final Record Drawings and Documents**

Final Record drawings shall be submitted to and approved by the District before a request for regular service start-up is made. The final record drawings shall include the following:

- *“As-Built” Changes* - All changes in the work constituting departures from the original design drawings, including changes in both pressure and non-pressure lines, number or location of spray heads, bubbler or drip systems, buildings or hardscape, shall be accurately recorded on one set of drawings. At the end of each working day, it shall be mandatory that the contractor record all work accomplished for that day on the set of drawings in red ink. The final set of record drawings shall

be professionally drafted, to the satisfaction of the District, in ink on Mylar for future photo processing and reproduction. Throughout the construction process, the red line copy shall be available to District upon request.

- *Dimensioning* - All dimensions shall be taken from two permanent points of reference such as buildings, monuments, sidewalks, curbs or hardscape.
- *Record Drawings* - For the purpose of reference, record drawings shall be available at all times.
- *Control Charts* - Shall be prepared and submitted with the record drawings, and approved by the District before a request for final inspection is made. The chart submittals shall include the following:
  - *Chart Requirement* - ~~60# bond paper 11" x 16" color control charts, one set for each point of connection. 60# bond paper 11" x 16" color control charts, hermetically sealed in a 6-mil-thick laminated pouch, one set for each point of connection.~~
  - *Chart Scale* - Each chart shall be a reduced record drawing of each sheet of all irrigation systems. The final controller sequence shall be clearly legible, as determined by the District, at the reduction chosen.
  - *Chart Coloring* - Each chart shall use a different color to show the area of coverage for each valve station/lateral system shown.

#### **§10444      Temporary Service Connection**

Prior to being placed into service, a temporary service connection using potable water (protected by a reduced pressure backflow device) may be used to supply water to on-site facilities to permit the testing of all or a portion of the facilities during installation. The temporary service connection must be approved by the District prior to its installation and is valid for 180 consecutive calendar days. The inspector shall be notified at least 48 hours in advance of such intended use of potable water.

No recycled or potable water use from offsite to on-site facilities is allowed for sites being designed for potable or recycled water until all water meters, meter boxes, and backflow prevention assemblies have been installed, tested, and inspected. On-site cross connection testing must be completed to the satisfaction of the District, prior to any meter releases.

Contact the District to energize the water service angle stop to facilitate the testing of the backflow assemblies for testing purposes only. Backflow assembly test results are to be submitted to the District.

#### **§10450      REPORTING**

Certain reporting or notification between the parties involved with the use of recycled water may be conducted in person or by telephone. The District must report any cross connection incident to the DDW, OCHCA, and the RWQCB within 24 hours of the incident.

The customer shall report any violation of the Rules and Regulations and/or noncompliance that may endanger public health or the environment. Any such information shall be provided orally to the District immediately after the customer becomes aware of

the circumstances. A written submission shall also be provided within five days of the time the customer becomes aware of the circumstances.

The written submission shall contain a description of the noncompliance and its cause; photographs documenting the non-compliance; the period of noncompliance, including exact dates and times; and if the noncompliance has not been corrected, the anticipated time it is expected to continue; and steps taken or planned to reduce, eliminate, and prevent recurrence of the noncompliance.

The District may waive the written report on a case-by-case basis if the oral report has been received within twenty-four (24) hours. The following occurrences(s) must be reported to the District immediately:

- Any situation that may endanger the public's health or the environment;
- Discovery of a cross connection of a recycled water system with a potable water system must be reported immediately to the District;
- More than minimum unplanned or uncontrolled discharge of recycled water resulting from water line breaks, malfunctioning control system, or any other circumstances;
- More than minimum discharge of recycled water outside of the approved use area due to on-site line breaks, runoff, direct spray, overspray or windblown spray, or outside the regular hours of operation for any reason; and
- Discharge of recycled water at a construction site in an unapproved manner or in an unapproved area.

#### **§10460      UPGRADES/ALTERATIONS/REPAIRS**

Upgrades or alterations to recycled water irrigation systems, non-potable irrigation systems, and potable water systems on recycled water use sites must be approved and inspected by the DDW, District, and/or OCHCA. Prior to commencement of work, record drawings must be revised and submitted to the District for approval. Any upgrades or alterations made to a recycled water irrigation system or potable water system on recycled water use sites, that are not inspected or follow stated notification procedures, places the customer/owner and the irrigation system in violation of the Rules and Regulations. Any upgrade or alterations performed and backfilled without District inspection shall be exposed at the customer/owner's expense for inspection and compliance. Penalties may apply, including, but not limited to, termination of service.

Repairs to irrigation systems and potable water systems on recycled water use sites, other than the typical sprinkler head repair, must be completed to the satisfaction of and inspected by the DDW, District, and OCHCA. The District must be notified immediately when a repair is made. Any repairs performed and backfilled without District inspection shall be immediately exposed at the customer/owner's expense for inspection and compliance. Any on-site repairs that are not immediately inspected or follow stated notification procedures, places the customer/owner and the irrigation system in violation of the Rules and Regulations. Penalties may apply, including, but not limited to, discontinuation/termination of service.

## **§10500      TECHNICAL REQUIREMENTS**

### **§10510      GENERAL**

All offsite and on-site recycled water facilities shall be designed and constructed according to the requirements, conditions, and specifications of these Rules and Regulations. The recycled water system, including both offsite and on-site facilities, shall be separate and independent of any potable water system. Any required backflow prevention devices on potable water services and flow or pressure control devices shall be downstream of the meter and provided by the applicant, owner, or customer at his expense.

Any recycled water distribution system facilities determined by the District to be required to provide service within developments of the property within the District shall be provided by the applicant, owner, or customer at his expense unless otherwise approved by the District.

The District will assume responsibility for providing water and recycled water service to the point of connection of such development upon transfer to the District of title of all offsite facilities in the required systems and any necessary easements therefore. All easements shall be in a form acceptable to the District and not subject to outstanding obligations to relocate such facilities or any deeds of trust, except in instances where such is determined by the Board or the General Manager to be in the best interests of the District.

Modification or relocation of the meter or other facility which results in nonconformance with the applicable provisions of these Rules and Regulations is prohibited and shall be corrected at the expense of the applicant, owner, or customer. Upon failure or refusal of the applicant, owner, or customer to make such correction, the District may, after providing reasonable notice to the applicant, owner or customer, make the correction and charge the applicant, owner or customer for the cost of doing so.

Any on-site recycled water facilities shall be provided by the applicant, owner, or customer at his expense. The applicant, owner, or customer shall retain title to all such on-site facilities.

### **§10520      ON-SITE IRRIGATION SYSTEMS**

#### **§10521      *Design Responsibility***

The design of an on-site irrigation system that will use recycled water, including the preparation of plans and construction specifications, shall be under the responsibility of a design consultant. On-site recycled water facilities, in addition to conforming to these Rules and Regulations, shall conform to local governing codes, rules and regulations. The Cities of Laguna Woods, Laguna Hills, Aliso Viejo, Lake Forest and Mission Viejo shall have authority over materials, equipment, design, and construction methods used for on-site recycled water facilities within their jurisdiction, provided that when the District's Rules and Regulations require a higher quality material, equipment, design or construction method than required by the above local governing codes, rules and regulations, the District's Rules and Regulations shall be controlling.

#### **§10522      Provisions for Recycled Water**

In those areas where recycled water is not immediately available for use when the area is ready for construction, an approved backflow prevention assembly shall be required for any potable water use. This assembly shall be provided, installed, and tested at least annually by the customer. All maintenance of the on-site backflow prevention assembly shall be the responsibility of the customer. In those cases where the District uses a master backflow prevention assembly at the intertie between the recycled water distribution system and the potable water system, the District may waive the requirement for the customer to install an on-site approved backflow prevention assembly.

Only the District, or the customer in accordance with District's requirements and under the approval and inspection of the District, shall remove said backflow prevention assembly and make the connection to the recycled water distribution system when recycled water becomes available. At such time, if the District removed the assembly, District shall return the assembly to the customer. The District shall determine all points of connection to the District's offsite facilities.

Backflow prevention assemblies are not required on recycled water irrigation systems after service has begun with recycled water. However, backflow prevention assemblies may be required on irrigation systems using recycled water, on a case-by-case basis as determined by the District. Backflow prevention assemblies required by the District on recycled water systems shall be clearly identified by painting the assemblies purple Pantone 512 and/or installed in protective enclosures. The District shall test these recycled water backflow prevention assemblies annually with dedicated testing equipment, used only for recycled water backflow prevention assemblies.

The District shall make notification of all action taken with backflow prevention assemblies to the DDW and/or OCHCA.

#### **§10523      Service Line**

The District reserves the right to specify the amount, size, and location and/or type of all offsite facilities. The recycled water service lines shall be extended to a location in compliance with the District's standard drawings or a curb line of the customer's property abutting upon a public street, highway, road or utility easement in which recycled water mains are installed.

#### **§10524      Service Pressure**

The pressure zone/hydraulic grade line shall be as provided by the District. The design consultant must prepare and submit a hydraulic worksheet indicating hydraulic constraints. When offsite system pressures are inadequate or exceed demands, the addition of booster pumps and/or pressure regulators shall be the responsibility of the owner.

#### **§10525      Design Application Rates**

The on-site irrigation system shall be designed to apply irrigation water in a manner compatible with the infiltration rates of the soil types within the approved use area. Evidence that infiltration rates have been assessed shall be included with the design. Where varying soil types are present to the extent that they cannot be adequately addressed by separate zones (hydrozone), the design of the irrigation system shall be compatible with the lowest infiltration rate present.

Average and maximum application rates. All irrigation systems must not exceed the District's values for flat and slope areas. The developer or applicant shall submit his calculations confirming that the irrigation system, as designed, meets the below requirements. The District will perform the necessary calculations to confirm the application rates meet these requirements:

|             |                          |             |
|-------------|--------------------------|-------------|
| Flat area:  | Average Application Rate | 15 gpm/acre |
|             | Maximum Application Rate | 20 gpm/acre |
| Slope area: | Average Application Rate | 10 gpm/acre |
|             | Maximum Application Rate | 15 gpm/acre |

#### **§10526      System Layout**

The irrigation system shall be designed based on peak-application rate requirements to prevent discharge onto areas that are not approved for use. Adjustable arc, adjustable radius sprinklers with anti-drain/check valves shall be used adjacent to roadways, boundary lines, and hardscape to confine the discharge from the irrigation system to the design area. Recycled water leaving the planting areas, whether by direct overspray, ponding, runoff, or windblown spray, shall be minimized. Drainage devices under control of the owner shall be installed at the toe of slope and shall not traverse or discharge unto adjacent single family residential lots. Drainage devices must stand-alone; slope drainage devices shall not be tied into any other drainage systems, e.g., private systems for single-family lots.

For new developments, the on-site irrigation system shall be required to automatically shut off in the event of a line break. Utilize all available equipment to prevent unauthorized discharge of recycled water. For sites being retrofitted, it is recommended but not required to have the irrigation system automatically shut off in the event of a line break. See Section [5.2.810528](#) of this document ("System Control Devices").

The irrigation system design shall avoid spray patterns that include obstructions that tend to concentrate recycled water to produce ponding and/or runoff, such as direct or indirect spraying against structures or objects.

No common trenching with other utilities of any kind is permitted.

The District reserves the right to limit the area of land under one ownership or homeowner's association to be supplied by one recycled water service connection and corresponding meter. A recycled water service connection and its corresponding meter shall not be used to supply adjoining property of a different owner, without the approval in

writing from the District stating conditions and restrictions; such as easements or MOU (memorandum of understanding).

Irrigation systems where landscaping around homes and in common areas served with one meter and owned by the same customer, e.g., a homeowner's association, may be allowed to cross roads, streets, or other public right-of-ways within the customer's property. When a property provided with a recycled water connection and corresponding meter is subdivided, such connection and meter shall be considered as serving the lot or parcel of land on which the meter is located. Additional recycled water mains and/or recycled water service lines shall be required for all subdivided areas in accordance with the Regulations.

For properties of the same customer, irrigation systems shall be allowed to cross roads, streets, or other public rights-of-way to serve medians and slopes along streets. For properties under the ownership and control of other parties, a recorded easement shall be mandatory. A copy shall be issued to the District.

All recycled water used on any property must pass through the meter. Customers shall be held responsible and charged for all recycled water passing through the water meters.

#### **§10527      On-site Separation Requirements**

Horizontal Separation: The pressurized recycled water piping shall maintain a minimum of a four (4) foot horizontal separation at all times from all potable water piping. If a four (4) foot horizontal separation is not possible, special construction requirements shall be considered, refer to District Standard Detail Drawing IRR-8. Common trench construction is prohibited.

Vertical Separation: Vertical separation of new construction shall be located from the ground surface in order of descending quality. Potable water shall be above recycled water. Minimum vertical separation shall be one (1) foot between the top and bottom surfaces of the pipes. Exceptions to this general rule are as follows:

- On irrigation systems where intermittently pressurized recycled water lines (laterals) serve sprinkler heads, the potable water may be placed under the recycled water lateral. No special construction requirements are necessary provided that one (1) foot vertical separation is maintained.
- On sites using pressurized irrigation laterals with valve-in-head sprinklers, the potable water line may be placed under the recycled water laterals if additional protection is provided for the potable water line. Common practices include sleeving the potable water line with PVC pipe a minimum of four (4) feet each side of the crossing.
- If the new potable water line must be installed below an existing constant pressure irrigation/recycled water line, then the potable water line shall be installed within a protective sleeve. The sleeve shall extend a minimum of four (4) feet each side of the centerline of the irrigation/recycled water line, for a total of ten (10) feet. The sleeve shall be identified as potable water (blue identification tape).

- If a constant pressure recycled water line must be installed above a potable water line or less than twelve (12) inches below a potable water line, then the recycled water line shall be installed within a protective sleeve. The sleeve shall extend a minimum of four (4) feet from each side of the centerline of the potable water line, for a total of ten (10) feet. The sleeve shall be identified as recycled water (either purple PVC or purple warning tape).

Non-Compliance Separations: All pressurized main constructions that do not meet the horizontal or vertical separations requirements of the California Waterworks Standards must be reviewed and approved by DDW.

### **§10528      System Control Devices**

Every newly constructed recycled water service line shall be equipped with an angle meter stop on the inlet side of the meter and ball valve on the discharge side of the meter, located within a District maintained meter box. The angle meter stop and ball valve are to be used only by District personnel to control the recycled water supply through the service line. If the angle meter stop, meter, ball valve, meter box, meter lid, or touch reader equipment is damaged by the customer or his use of recycled water to an extent requiring replacement, then the customer shall bear full financial responsibility for repair and replacement.

The newly constructed on-site irrigation system shall be required to automatically shut off in the event of a line break. A master valve in conjunction with an irrigation controller and flow sensor shall be used to provide automatic system shut down in the event of excessive flow. Retrofitted and converted onsite irrigation systems may be required to install this equipment, as described above, if there is a history of unauthorized discharges.

For retrofitted and converted irrigation systems, the District recommends the installation of a master valve and flow sensor to automatically shut off the irrigation system in the event of a pipeline break, but it is not a requirement.

### **§10529      Identification Requirements**

Any sites that contain multiple water systems within the site (i.e.: potable water for domestic purposes; potable water for fire systems; non-potable water for irrigation purposes; and recycled water for irrigation purposes) will require identification of the on-site facilities to clearly distinguish one from another. Colors and materials used for the identification of all water/recycled water piping, appurtenances, equipment, storage facilities, and approved used areas shall be in accordance with these Rules and Regulations ~~and the State of California Department of Public Health Purple Book.~~

Recycled Water Signs: All sites using recycled water shall have a minimum of two recycled water caution signs installed at locations agreeable to the site owner, the District, ~~and~~ DDW and OCHCA. The quantity of signs and their location are determined by the quantity and location of the general public's access to the recycled water use area. The



final quantity and location must be determined and approved by the District and DDW/OCHCA. Signage size and wording shall be in accordance with the specifications of these Rules and Regulations and shall be approved by the District and the site owner. Signs shall be a minimum of 9" by 12" in size, and at a minimum, include the wording "**Recycled Water – Do Not Drink**" and display the international symbol shown on Figure 60310-A in Title 22 of the California Code of Regulations. See the sign detail as part of the District's Standard Detail Drawing IRR-11.

**Identification of On-site Facilities:** On sites with recycled water or other water systems, all facilities will need to be identified in order to clearly distinguish one from another.

Therefore, the following, as a minimum, will be required:

- The exposed portion of recycled water pipelines, valves, and other appurtenances shall be painted purple, ~~and-or~~ installed with purple warning tags to distinguish clearly that it is a recycled water facility;
- All new unexposed recycled pipes shall be identified as well. PVC pipe shall be purple and metallic pipe shall be installed with purple warning tape;
- All recycled water outlets shall be posted with bilingual precautionary purple warning tags or labels with the wording "**Warning – Recycled Water – Do Not Drink**", and "**Aviso Agua Impura – No Tomar**";
- Main shut-off valves shall be clearly identified to distinguish between recycled water, potable water and non-potable water systems.
- The exposed portion of potable water pipelines, valves, and other appurtenances shall be painted blue, ~~and-or~~ installed with blue identification tags to distinguish clearly that it is a potable water facility;
- All new unexposed potable water pipes shall be identified as well. PVC pipe shall be blue or white with blue identification (warning) tape and metallic pipe shall be installed with blue identification (warning) tape;
- The exposed portion of non-potable water pipelines, valves, and other appurtenances shall be painted green, ~~and-or~~ installed with yellow warning tags to distinguish clearly that it is a non-potable water facility; and
- All new unexposed non-potable water pipes shall be identified as well. PVC pipe and metallic pipe shall be installed with green warning tape.

**Recycled Water On-site Identification Requirements:**

- All new buried on-site recycled water irrigation piping shall be marked as follows: PVC Pipe must be purple-colored PVC pipe with continuous wording "Caution – Recycled Water – Do Not Drink" printed on opposite sides of the pipe. The use of continuous lettering on 3-inch minimum width of purple tape with 1-inch black or white contrasting lettering bearing the continuous wording "Caution – Recycled Water – Do Not Drink" permanently affixed at five (5) foot intervals atop all horizontal piping, laterals and mains is an acceptable alternative to purple pipe.

- All new recycled water piping above ground or in vaults, including adapters and fittings, shall be installed with purple warning tags to distinguish clearly that it is a recycled water facility or painted purple in color (Color Code Pantone 512). ~~Black or white stenciling shall appear on both sides of the pipe with the marking "Caution—Recycled Water" in 5/8-inch letters repeated every three (3) feet.~~
- All new valve boxes (gate valves, manual control valves or electrical control valves) on the recycled water irrigation system shall be purple (Pantone 512) and have the words "Recycled Water" in white letters on top.
- Purple background warning labels stating "**Attention – Controller Unit for Recycled Water**", and "**Atencion – Unidad Controladora Del Agua Recuperada**", will need to be attached to the cover of all irrigation controller units.
- All recycled water appurtenances including the irrigation valve boxes (gate valves, quick coupler valves, manual control valves or electrical control valves) shall have a purple warning tag affixed to them.

Tags shall be weatherproof plastic, 3" by 4", with purple background and black lettering stating "**Warning – Recycled Water – Do No Drink**", and "**Aviso Agua - Impura No Tomar**", on one side and the "Do Not Drink" logo on the other side. One tag will be attached to each device with a nylon tie wrap.

#### Potable Water On-site Identification Requirements:

All new buried on-site potable water piping shall be identified as potable water using a blue color code differentiating them from recycled water piping. This identification shall be done by using blue PVC pipe or installing blue identification (warning) tape as described below:

- All PVC domestic water piping shall be blue colored PVC pipe or shall be white with blue stenciling appearing on both sides of the pipe with the marking "Domestic Water" in 5/8-inch letters repeated every twelve (12) inches. Blue identification (warning) tape identifying the PVC pipe as domestic water line and stating "Caution – Domestic Water" may be used as an alternative to the blue or stenciled PVC pipe. The tape shall be attached to the pipe with plastic tape banded around the warning tape and pipe every five (5) feet on center.
- All new copper or ductile iron piping carrying potable water shall be identified with blue identification (warning) tape. The identification (warning) tape shall be blue in color with the words "**Potable Water**" imprinted in minimum of one-inch high letters, black or white in color. Imprinting shall be continuous and permanent. Identification (warning) tape shall be a minimum of three (3) inches in width and shall run continuously for the entire length of all constant pressure piping. The tape shall be attached to the top of the pipe with plastic tape banded around the identification (warning) tape and the pipe every five (5) feet on center.
- All new potable water piping above ground or in vaults, including adapters and fittings, shall be painted blue in color. Black or white stenciling shall appear on both sides of the pipe with the marking "Caution – Domestic Water" in 5/8-inch letters repeated every three (3) feet.

- All potable water appurtenances including the potable water valves shall have a blue identification tag affixed to them. All potable water valves boxes (main valves or shut-off valves) shall have one tag placed on the valve within the valve box. Tags shall be weatherproof plastic, 3" by 4", with blue background and white or black lettering stating "**Potable Water**" on one side and "**Agua Para Tomar**" on the other side. One tag will be attached to each device with a nylon tie wrap.

Potable Water Used for Irrigation (Non-Potable Water) On-site Identification Requirements:

All new buried on-site non-potable water piping shall be identified as non-potable water using a green color code differentiating them from recycled water and potable water piping. This identification shall be done by installing green warning tape as described below:

- All new PVC or ductile iron piping carrying non-potable water shall be identified with warning tape. The warning tape shall be green in color with the words "**Non-Potable Water**" imprinted in minimum of one-inch high letters, black or white in color. Imprinting shall be continuous and permanent.

Warning tape shall be a minimum of three (3) inches in width and shall run continuously for the entire length of all constant pressure piping. The tape shall be attached to the top of the pipe with plastic tape banded around the warning tape and the pipe every five (5) feet on center.

- All non-potable water appurtenances including the non-potable water valves shall have a yellow warning tag affixed to them. All non-potable water valves boxes (gate valves, manual control valves or electrical control valves) shall have one tag placed on the valve within the valve box. Tags shall be weatherproof plastic, 3" by 4", with yellow background and white or black lettering stating "**Non-Potable Water**" on one side and "**Agua Impura No Tomar**" on the other side. One tag will be attached to each device with a nylon tie wrap.
- All non-potable water irrigation quick coupling valves shall be a one (1) piece 1-inch ACME thread with a vinyl locking effluent cover and shall have a tag affixed to them below the locking lid. Tags shall be weatherproof plastic, 3" by 4", with yellow background and white or black lettering stating "**Non-Potable Water**" on one side and "**Agua Impura No Tomar**" on the other side. One tag will be attached to each device with a nylon tie wrap.

**§10530      Plan Requirements**

Facility layout drawings shall be signed by the design consultant and shall include the construction of the use area, and the on-site irrigation system, as a minimum. This drawing shall indicate the exact boundaries of the site of the proposed recycled water use at a scale that includes the site and the nearest paved surface street containing a recycled

water distribution main. These drawings shall be submitted by the customer, or their representative, to the District and approved by the District prior to commencing any installation of facilities.

Plans shall include a vicinity index map, indexed site map for each sheet and shall include major street crossings, street names, and point of connection. The title sheet shall show the legal description of the property. Plans shall include the irrigation system design, notes, appurtenance details, and legends without separate attachments. The size of the plans shall be consistent for the project, and for new construction, shall be full size (24" by 36" or 22" by 34"). The plans shall be signed by the design consultant and shall be submitted to the District for review and approval. The District's signature block shall be included on the Title Sheet of the plans.

The following shall be shown on the plans, as a minimum:

- Potable and recycled water mainline and valve locations within the surrounding streets;
- All potable, fire, non-potable and recycled water lines;
- Specific recycled water use areas;
- Specific non-potable water use areas;
- Specifically state on the plans **if** there is no potable water on the site;
- Location of all wells;
- Location of all streams and water bodies;
- Location of all sewer facilities;
- Equipment legends;
- Locations and descriptions of all backflow prevention devices;
- Location and size of all service connections and meters, including fire protection;
- Show all fire hydrants and all fire protection facilities;
- Show all buildings;
- Show hardscape (including walls, fencing, drainage devices);
- Show all play areas and equipment, ball field layouts and courts;
- Designate all exterior eating areas, including tables, benches and barbeques;
- Location of all water features; and
- Location of drinking fountains and restrooms.

The following specific call-outs shall be shown on the irrigation plans:

- Points of connections;
- Routing of irrigation supply lines and all related appurtenances;
- Gate valves;

- Sprinkler control valves;
- Quick coupling valves;
- Routing of control wires;
- Irrigation controllers;
- Remote control valves;
- Irrigation pumps, piping and appurtenances; and
- All irrigation-related appurtenances.

#### **§10531      Meter and Irrigation Criteria**

The following irrigation meter criteria information shall be included in each set of plans adjacent to each recycled water meter:

- Tract and Lot Numbers or Parcel Map Number;
- User Site Number (to be provided by the District);
- Meter Size;
- Elevation (highest to the lowest elevation of the site to be irrigated);
- Zone/HGL of the property (to be provided by the District);
- Point of Connection Static Pressure (to be provided by the District);
- Required Dynamic Pressure On-site;
- Average Application Rate (gpm/acre);
- Maximum Application Rate (gpm/acre);
- Area Served (acres irrigated); and
- Annual Irrigation Water Use (acre ft/year).

A legend shall be included on the plans showing the irrigation criteria including the pertinent data for the materials used in the irrigation system. The legend shall include a pipe schedule listing pipe sizes, type of materials of construction, the quantity of quick coupling valves, and all related appurtenances including their size, model number and description. All controller timing charts shall show maximum hours of operation per day.

#### **§10532      Standard Recycled Water Notes**

As a minimum, the following standard notes shall be listed on the plans.

1. The design, installation, identification and use of all on-site potable water systems, fire protection systems, potable water used for irrigation systems (non-potable irrigation), and recycled water irrigation systems shall conform to the District's Rules and Regulations, all State and County guidelines, articles, and codes regarding the design, installation, identification, use and maintenance of

on-site systems and protection of the public's health. The Contractor shall have a copy of these plans and the District's Standard Specifications on the job at all times.

2. No construction shall take place without all required approvals and signatures on the plans.
3. The District shall be furnished with three (3) copies of the approved construction plans prior to the starting of construction. A mandatory pre-construction meeting shall be held on the jobsite a minimum of 24 hours prior to the start of construction. No work shall take place without a pre-construction meeting on-site.
4. The District's inspector shall be notified a minimum of two working days (48 hours) prior to construction, or any inspection.
5. All potable and recycled water meters, backflow assemblies, and related appurtenances shall be installed, inspected, and tested per the District's Specifications and/or Rules and Regulations before any recycled water use can take place.
6. All typical recycled water services shall be constructed per District's Standard Detail Drawing IRR-12. Downstream of the recycled water meter shall be a customer service valve. The customer service valve shall be "ball valve" type and provided with a lever-type turn handle.
7. On-site Separation Requirements, as specified within the District's Rules and Regulations, shall be maintained at all times. The following is a brief summary:

*Horizontal Separation:* The pressurized recycled water piping shall maintain a minimum of a four (4) foot horizontal separation at all times from all potable water piping. If a four (4) foot horizontal separation is not possible, special construction requirements shall be considered, refer to District Standard Detail Drawing IRR-8. Common trench construction is prohibited.

*Vertical Separation:* Vertical separation of new construction shall be located from the ground surface in order of descending quality. Potable water shall be above recycled water. Minimum vertical separation shall be one (1) foot between the top and bottom surfaces of the pipes. If a one foot vertical separation is not possible, special construction requirements shall be considered, refer to District Standard Detail Drawing IRR-8 for these requirements as well as for the exceptions to this general rule.

8. Quick coupling valves on the non-potable water system (potable water used for irrigation) shall be 3/4-inch and of the same type and manufacturer and shall not be interchangeable with quick couplers on the recycled water system which shall be 1-inch. The quick couplers will need to have yellow warning tags attached and the covers labeled (and/or yellow in color).

9. Quick coupling valves on the recycled water system shall be 1-inch and of the same type and manufacturer and shall not be interchangeable with quick couplers on the non-potable water system which shall be 3/4-inch. The quick couplers shall be a one (1) piece 1-inch ACME thread with a vinyl locking effluent cover and shall have a purple warning tag affixed to them below the locking lid. *For locations where 3/4-inch quick couplers were previously installed on a recycled water system, they shall be replaced with 1-inch upon failure or any other site improvement requiring replacement.*
10. All hose bibs on the potable water system shall be installed with a potable water identification tag and shall have a brass hose bib vacuum breaker device installed. No hose bibs will be allowed on the recycled water system.
11. Quick coupling valves on the recycled water irrigation mainline may be required to be removed at the end of the maintenance period, if requested by the District and/or OCHCA. If the quick coupling valves are required to be removed, the District shall determine the manner of removal.
12. All drinking fountains will need to be protected from contact with recycled water, whether by windblown spray or by direct application through irrigation. Some may be located to meet this requirement; others will need to be constructed with protective structure as required by DDW and OCHCA.
13. Adjust all sprinkler, impact and rotor heads and drip systems to minimize direct overspray, windblown spray, ponding and runoff, onto non-irrigated areas.
14. The installation of internal, external, or in-line anti-drain valves are mandatory to prevent low-head drainage immediately after the remote control valve has closed.
15. Any deviations from the signed and approved set of plans must be approved in writing prior to installation by the design consultant and the District.
16. Any revision must be submitted to the design consultant and the District for approval. Failure to comply will result in a "STOP WORK NOTICE".
17. Final coverage tests must be performed and passed before a final release will be issued. Direct overspray, windblown spray, ponding, and runoff onto non-irrigated areas are to be minimized.
18. Cross-connection tests shall be performed on all water systems, including existing and future recycled water irrigation systems, and all potable and non-potable water systems, as determined by the District prior to the use of recycled water. All cross-connection tests must be performed and passed before a final release will be issued.
19. The entire irrigation system and its appurtenances, as well as all on-site facilities and appurtenances shall be inspected and reviewed by the District. Final

inspections/site reviews must be performed and passed by the District and OCHCA before a final release will be issued.

20. Unless directed otherwise by the District, recycled water system regular hours of operation are as follows:

- Turf areas and center street medians: between 10:00 p.m. and 6:00 a.m.;
- Slopes and ground cover/shrub areas: any hour (if no potential public contact);
- Golf courses: between 9:00 p.m. and 5:00 a.m.
- Golf courses: fill impoundments between 5:00 a.m. and 6:00 p.m.

The consideration for potential public contact with recycled water shall take precedence over all recycled watering schedules. All irrigation systems run times shall be adjusted to minimize contact with recycled water on an individual lateral system basis. The District may require specific run times and durations where there is a history of public contact.

21. The following information must be submitted to the District before a final release will be issued:

- a. One complete set of District approved blueline or bond record plans. (NOTE: All record drawing information must be reviewed and approved in writing by the design consultant and the District before producing the final plans for submittal to the District.) Final record plans shall be professionally drafted as determined by the District.
- b. One complete set of District approved record ~~drawings~~blueline or bond plans. One complete set shall include cover sheet, irrigation sheets, and all irrigation details and note sheets.
- c. One ~~60# bond paper 11" x 16" color control charts, one set for each point of connection. One 60# bond paper 11" x 16" color control charts, hermetically sealed in a 6-mil thick laminated pouch, one set for each point of connection.~~
- d. Completed District backflow investigation and test reports for all backflow prevention assemblies on site. Submit to the District.
- e. Certificates of substantial compliance, calibration, acceptance and/or proper installation/ operation of the irrigation system and appurtenances as deemed necessary by the District.
- f. Completed District recycled water Use Permit for each recycled water point of connection.

22. Failure to comply with any of the prior provisions and/or any other of the Rules and Regulations will place the system in violation of the Rules and Regulations



and will result in a stop of work notice and/or termination of recycled water service until appropriate corrective steps have been taken.

The following Recycled Water General Notes for Site Owner Maintenance Staff shall be included on the plans:

1. It shall be the responsibility of the site owner's maintenance staff to ensure that all operations personnel are trained in and familiarized with the use of recycled water, and are familiar with the District's Rules and Regulations for Recycled Water Service. A copy of these Rules and Regulations shall be kept by the designated Site Supervisor on site at all times.
2. The operation and surveillance of the on-site recycled water system shall be under the management of the On-site Supervisor designated by the site owner.
3. Recycled water service area shall be restricted to those areas explicitly approved by DDW and OCHCA and as shown on these plans.
4. All recycled water irrigation sprinkler heads shall be adjusted by the site owner's maintenance staff to eliminate or to control to the greatest extent possible overspray onto non-landscaped areas including but not limited to buildings, sidewalks, parking lots, asphalt areas and roads.
5. Conditions that directly or indirectly cause a run-off of recycled water outside of the approved recycled water use area, or cause ponding of recycled water or permit windblown spray to pass outside of the approved use area, whether by design, construction practice, or system operation, shall be eliminated or controlled to the greatest extent possible with the use of the best practicable technology and methodology.
6. Cross-connections between the recycled water system and the potable or non-potable water systems are strictly prohibited.
7. Hose bibs on the recycled water system are strictly prohibited.
8. The operation of the recycled water system shall be during periods of minimal use of the recycled water service area by the general public (typically 10:00 p.m. to 6:00 a.m.), unless directed otherwise by the District.
9. The site owner's maintenance staff must obtain prior approval from the District's Cross-connection inspector for all proposed changes and modifications to any on-site facilities including modifying the recycled water service area.

#### **§10540      ON-SITE RECYCLED WATER RETROFIT PROCEDURES**

The District may require an existing customer to retrofit an existing on-site irrigation water service facility to accommodate recycled water service. This determination will require a comprehensive investigation to be performed by or for the District.

The facilities to be converted to recycled water shall be investigated on a case-by-case basis, in detail, including review of any record drawings, preparation of necessary field work, preliminary cross-connection and coverage testing, and determinations by the District of measures necessary to bring the facility into full compliance with these Rules and Regulations for Recycled Water Service. After District approval, DDW and OCHCA shall also review and approve all conversions in accordance with these Rules and Regulations and the Use Permit application process. No existing on-site potable water facilities shall be connected to or be incorporated into the recycled water system without the District and other regulatory agencies testing and approval.

As a minimum, the retrofit of a potable water system to a recycled water system shall require:

- Identification of all existing on-site above grade pressure pipelines, valves, and appurtenances in accordance with requirements of these Rules and Regulations for new construction of recycled water systems;
- Installation of an approved air gap in accordance with requirements of these Rules and Regulations and subject to cross-connection control tests required in order to prevent cross connection or contamination of a potable water system at any location where it is proposed to retain a connection to a potable system. If a connection to the potable system is proposed to supplement the recycled water system when needed, an air gap shall be installed. The air gap may be substituted by a swivel ell as described in the CCCPH;
- Performance of dye test or pressure tests to determine existence of cross connection with all on-site potable water systems;
- Submittal of as-built record drawings package; and
- Completion and submittal of Recycled Water Services Application and Use Permit.

The District also recommends installation of a master valve and flow sensor to automatically shut off system in the event of a pipeline break, but it is not a requirement.

#### **§10541      Recycled Water Retrofit Procedures**

The following are retrofit procedure requirements that shall be adhered to by the owner. The District will provide coordination and inspection assistance in retrofitting these irrigation systems. (All onsite retrofit costs/expenses shall be the owner's sole responsibility.)

1. Submit to the District a completed application for recycled water service.
2. Submit to the District one set of irrigation plans and/or a record drawing of the site showing irrigation system, and all potable water systems on-site. See Section

5.3.310543 of this document (“Retrofit Plan Requirements”) for specific requirements.

3. Preliminary site inspections are intended to inform the owner of the site identification, backflow prevention, on-site separation requirements, and other issues regarding the retrofit of the use site to recycled water.
4. Preliminary coverage tests are intended to assure compliance with District Rules and Regulations regarding direct spray, windblown spray, overspray, ponding, and runoff. Irrigation sprinkler heads may be required to be replaced and/or plant materials trimmed or removed to accomplish the Rules and Regulations.
5. Preliminary cross-connection tests are required to assure that no cross connections exist between the irrigation systems and any potable water sources. See Section 6.810690 of this document (“Cross-Connection Test”) for Cross-Connection Testing Procedures. Any cross connections found between potable water systems and future recycled water systems shall be eliminated prior to retrofit.
6. A recycled water point of connection and irrigation system(s) shall serve only one property as recorded with the County of Orange.
7. Remove existing quick-coupling valves per District regulations or change out to brass ACME thread recycled water style quick-coupling valves. The locking cover shall be purple rubber or vinyl with the following information stamped or molded into the cover:
  - “Recycled Water” in English and Spanish;
  - “Do Not Drink” in English and Spanish; and
  - The international “Do No Drink” symbol (glass of water in a circle with a slash through it).
8. Remove all existing hose bibs whose water source is supplied by the irrigation system to be retrofitted. (Hose bibs are prohibited on recycled water systems.)
9. Attach purple recycled water warning tags in English and Spanish to all recycled water appurtenances. (Remote control valves, quick couplers, gate valves, wye strainers, etc.)
10. Identify all above ground pressure and non-pressure recycled water piping, as recycled water by attaching purple recycled water identification labels to the piping at five foot intervals.
11. Identify all sprinkler, bubbler, or drip system risers with purple recycled water identification labels in English and Spanish.

12. Install check valves below any sprinkler head or bubbler head where run-off occurs after the control valve has been shut down. Note: The Owner has the option to replace affected sprinkler heads with recycled water style heads that have built in check valves and purple recycled water identification caps. Minimize runoff after the control valve has been shut down.
13. All on site pressurized recycled water mainlines are required to maintain minimum horizontal and vertical separations from all pressurized potable water piping, and sanitary sewer systems as specified directed by the District.
14. To locate irrigation and other potable water lines, wire tracing, electronic testing/tracing or other methods shall be required. Suspect piping shall be required to be exposed for verification of separation requirements.
15. All exposed potable and recycled water piping shall have appropriate identification/warning tapes attached to them, to the satisfaction of the District.
16. Sleeving of mainlines may be used under certain circumstances to address the separation issues in areas near fire hydrants, backflow assemblies, and potable water lines and services as directed and approved by the District.
17. Common trenching is prohibited. The relocation of pressurized potable water lines may be required to meet District separation requirements.
18. Pressurized potable water piping shall be required to be relocated if minimum separation requirements cannot be met. In some cases, the pressurized recycled water piping may be relocated in place of the potable water piping as determined and approved by the District.
19. Potable water service points of connection shall have backflow prevention assemblies as determined by the District. All backflow assemblies must be tested before recycled water is used on site. (Submit the completed test reports to the recycled water inspector.)

District minimum requirements for public water supply backflow protection are as follows: approved reduced pressure principal assemblies for all potable water points of connection; and double-check detector check assemblies for all potable water fire protection points of connection. Other backflow prevention devices may be required, to protect public health, as determined by the District.

The only exception, to the above requirements, is the retrofit of homeowner association sites where recycled water is being proposed to irrigate common area on a portion of a single family residence. If the backflow protection of the District's potable water supply is not feasible or practicable, the District, with DDW's approval, may increase the required frequency of the cross connection testing in lieu of the construction of the backflow device at each residence. The waiving of the backflow protection will only be allowed on a case by case basis and only if approved in writing by DDW and the District.

20. Mark or identify all valve box lids per District's Rules and Regulations to identify them as recycled water, potable water, or non-potable and type of appurtenance enclosed. Other valve boxes or enclosures shall be identified as "Recycled Water", "Potable Water", or "Non-Potable", and as directed by the District. Bolt down all valve box covers with stainless steel bolts and washers.

Green valve box covers utilizing recycled water shall be identified as recycled water use by attaching purple 1 1/4" x 5 3/4" recycled water identification valve box name plate (or changed out to purple recycled water valve box and covers).

21. Attach blue "Potable Water" identification tags or yellow "Non-Potable Water" warning tags, in English and Spanish, to all potable water exterior appurtenances and potable water used for irrigation appurtenances. (Remote control valves, gate valves, backflows, etc. and as directed by the District)
22. Identify all above ground potable water, potable water used for irrigation pressure piping, and potable water used for irrigation non-pressure piping, and irrigation system risers as "Non-Potable Water" by attaching yellow identification labels stating "Non-Potable Water" in English and Spanish, at five foot intervals, and as directed by the District)
23. Protect drinking fountains from recycled water by placing drinking fountains away from recycled water areas or protecting the drinking fountains to the satisfaction of DDW, the District, and OCHCA .
24. Drinking fountains, buildings and other potable water appurtenances shall be protected from potable water quick-coupling valves, if any, when they use the same main line by an approved RPPD backflow assembly, placed between the quick-couplers and drinking fountain or buildings. Backflow prevention assembly locations to be determined by the District.
25. All on-site exterior potable water hose bibs shall have brass hose bib vacuum breaker devices attached to them. Potable water identification (warning) tags shall also be attached to the hose bibs.
26. Any connections between potable water systems, non-potable water irrigation systems, and the recycled water systems are prohibited. It shall be mandatory to disconnect the irrigation system from the potable water meter and remove the backflow prevention assembly from the irrigation system prior to connecting the system to recycled water. This work shall be coordinated with the District's recycled water inspector who will coordinate with OCHCA.
27. Existing potable water used for irrigation meters will be removed from the potable water points of connection (POC) by the District following conversion. The owner of record is responsible for purchasing and installing new potable backflow public water supply protection, backflow assembly devices, at use sites where the

existing potable water will need to remain in place for on-site use, following District specifications and procedures for installation.

28. Make the connection to the recycled water meter using purple PVC recycled water piping. The customer service valve, downstream of the recycled water meter, shall be a "ball valve" type and be provided with a lever-type turn handle.
29. Install a full port ball valve and a line size 80 mesh wye strainer or basket strainer with 80-mesh monel screen after the recycled water meter after the customer ball valve. Locations to be determined by the District.
30. Attach recycled water warning labels to controller door face and controller enclosure face.
31. Place a minimum of two (2) recycled water identification signs (1/16" aluminum, 9" x 12") in locations designated by the District. Additional signage may be necessary due to site considerations and access.
32. The irrigation controller shall operate recycled water systems only. (Example: a single controller cannot operate a potable water irrigation system and a recycled water irrigation system). All systems must remain separate. The District may make special consideration(s) on a case-by-case basis.
33. Submit to the District record irrigation drawings and record drawing information for all irrigation systems receiving recycled water as well as any non-potable water systems, potable water systems and/or potable water used for irrigation systems within the same use site as required within Section [5.2.210530](#) of this document ("Plan Requirements").
34. Prior to activating recycled water service, the District will perform final inspection and final coverage tests to assure compliance with District Rules and Regulations. Included in the final inspection are cross connection tests to assure that no cross connections exist between the recycled water irrigation system and any potable water sources.
35. Operate and maintain the irrigation system in the same operating conditions as it was when the District issued its final release. Comply with all District's Rules and Regulations regarding the use of recycled water.
36. District's regulations require quarterly on-site testing and maintenance reports to be completed and available to the District. See Section [7.510770](#) (Recycled Water Irrigation System Maintenance Report) of this document for the specific requirements.
37. Notify the District when any revision, upgrade, alteration or repair is anticipated or performed to the recycled and potable water used for irrigation systems, on-site potable water systems, or their related components. The District must approve all plans concerning changes to on-site recycled water systems, potable water used

for irrigation systems, and all potable water systems. Inspections for all the above changes are mandatory.

38. Certain precautions should be taken when recycled water is used. Please see Section 7.2.910739 of this document ("On-site Notifications") for recommended on-site notifications that recycled water is in use on the site.
39. The District is required to monitor all recycled water use sites for compliance with District Rules and Regulations. If a violation occurs, a recycled water violation notice will be issued to the owner of record and/or the onsite supervisor, who is responsible for the particular use site. The District must be notified orally or in writing of the steps taken to correct the violation 48 hours within receipt of the report. Noncompliance with this regulation will result in termination of recycled water service and a re-connection fee will be charged in order to reestablish service.

On-site conditions that endanger the public's health will require immediate termination of all water services until corrections have been made to the satisfaction of the District and appropriate regulatory agencies. See Section 7 10700 of this document (Operational Requirements ~~for Recycled Water Use~~).

40. Any Homeowners Association shall notify its members advising them of the fact that recycled water is being used for irrigation in the area and to ask the members for their assistance in notifying the Association of any main line breaks, broken heads, direct spray, windblown, or overspray onto private property, ponding, run off, or any damage to the irrigation systems.
41. Any questions regarding on-site retrofits requirements should be addressed to the District's Recycled Water Coordinator at 949-837-0660.

#### **§10542      On-site Irrigation System Requirements**

The requirements included within 5.2 of this document ("On-site Irrigation Systems") shall apply to the on-site recycled water retrofits except as modified herein.

Within Section 5.2.910529 of this document ("Identification Requirements"), add the following requirements for retrofit projects:

- Existing valve boxes (gate valves, manual control valves, or electrical control valves) found on the recycled water system can be branded in the center of the cover with the letters "Recycled Water" in lieu of replacement with a purple cover. Letters must be a minimum of ½".
- All existing line valves located on the recycled water system shall have their covers painted purple in lieu of replacing with a new valve cover.
- Existing valve boxes (main valves or shutoff valves) found on the potable water system can be branded in the center of the cover with the letters "Potable Water" in

lieu of replacement with new covers identified for potable water. Letters must be a minimum of ½”.

- Existing valve boxes (gate valves, manual control valves, or electrical control valves) found on the non-potable water irrigation system can be branded in the center of the cover with the letters “Non-Potable Water”. Letters must be a minimum of ½”.
- On a case-by-case basis, the District will evaluate the existing quick coupling valves to determine if the quick coupling valves on the recycled water irrigation system will need to be replaced with the recycled water quick coupling valve specified within these Rules and Regulations. The key is that the existing quick coupling valves shall not be interchangeable with quick couplers on the non-potable water system and that only trained operations/maintenance personnel will be able to use the existing quick coupling valves.

#### **§10543      Retrofit Plan Requirements**

The retrofit plans shall be designed by the design consultant and shall include the on-site modifications required to accommodate the conversion of the existing irrigation facilities to recycled water. The plans shall indicate the exact boundaries of the site of the proposed recycled water use at a scale that includes the site and the nearest paved surface street containing the recycled water and potable water distribution mains. These drawings shall be submitted by the customer/owner to the District and approved by the DDW, District and OCHCA prior to commencing any installation of facilities.

Plans shall include a vicinity index map, indexed site map for each sheet and shall include major street crossings, street names, and point of connection. The title sheet shall show the legal description of the property. The size of the plans shall be consistent for the project and can be reduced in size (11” x 17”) but the various water/fire/recycled piping shall be distinguished from each other by having different colors. The plans shall be signed by the design consultant and shall be submitted to the District for review and approval. The District’s signature block shall be included on the Title Sheet of the plans.

The following shall be shown on the plans, as a minimum:

- Potable and recycled water mainline and valve locations within the surrounding streets;
- All potable, fire, non-potable and recycled water lines (color coded);
- Specific recycled water use areas;
- Specific non-potable water and recycled water use areas;
- Specifically state on the plans **if** there will be no longer any potable water on the site;
- Location of all wells;
- Location of all streams and water bodies;



- Location of all sewer facilities;
- Locations and descriptions of all backflow prevention devices;
- Location and size of all service connections and meters, including fire protection;
- Show all fire hydrants and all fire protection facilities;
- Show all buildings;
- Show hardscape (including walls, fencing, drainage devices);
- Show all play areas and equipment, ball field layouts and courts;
- Designate all exterior eating areas, including tables, benches and barbeques;
- Location of all water features; and
- Location of drinking fountains and restrooms.

The following specific call-outs shall be shown on the irrigation plans to the best possible understanding of the existing facilities:

- Points of connections;
- Routing of irrigation supply lines and all related appurtenances;
- Gate valves;
- Sprinkler control valves;
- Quick coupling valves;
- Routing of control wires;
- Irrigation controllers;
- Remote control valves;
- Irrigation pumps, piping and appurtenances; and
- All irrigation-related appurtenances.

The plans shall also include all of the meter and irrigation criteria stated in Section [5.2.1110531](#) of this document ("Meter and Irrigation Criteria") and the all of the Standard Recycled Water Notes stated in Section [5.2.1210532](#) of this document ("Standard Recycled Water Notes").

#### **§10544      Submittals**

The following information must be submitted to the District before a final release will be issued:

- One complete set of District approved record drawings;
- ~~60# bond paper 11" x 16" color control charts, one set for each point of connection;~~
- ~~60# bond paper 11" x 16" color control charts, hermetically sealed in a 6-mil laminated pouch,~~ one set for each point of connection (See Typical Retrofit Plan

Standard Drawing for minimum requirements to be shown, for sites with no existing record drawings or plans.) All record drawings shall be dimensioned. All dimensions shall be taken from two permanent points of reference, such as buildings, monuments, sidewalks, curbs, or hardscape. (Final record drawings shall be professionally drafted, to the satisfaction of The District.)

NOTE: (Submit Redlines for approval by District, prior to submitting the items listed above.)

#### **§10545      General Recycled Water Retrofit Construction Sequence**

The following is a summary of the general recycled water retrofit construction sequence:

1. Construct potable water meter protection, recycled water service lateral and meter facility (with no meter), recycled water tags, labels, quick couplers, remove and replace irrigation hose bibs with recycled water quick coupling valves, brand all irrigation valve box lids, and construct recycled water identification signs.
2. Perform cross-connection test. Notify the District to coordinate the cross-connection test with the on-site maintenance, operations personnel, the District staff, DDW and OCHCA. Provide the temporary connections required to perform this cross-connection test.
3. Obtain the DDW and OCHCA approval. The District will be the point of contact with these agencies.
4. Coordinate with the District the installation of the new recycled water meter within the meter box.
5. Remove the existing backflow protecting the irrigation system at each connection location and construct the pressure reducing valve assembly, if required, only after receiving direction from the District.
6. Perform the irrigation coverage test with the new recycled water system pressure.
7. Remove the existing service saddle at the potable water main and install a repair clamp. The potable water service abandonment requirements will be confirmed by the District on a case-by-case basis.

#### **§10546      Conversion from Recycled Water Use**

If, due to on-site failure of the recycled water system, or use violations, District determines it necessary to convert on-site facilities from a recycled water supply to a potable, or other water supply, it shall be the responsibility of the customer to perform conversion, unless determined otherwise by the District. Prior to District approval, the DDW and OCHCA shall review and approve all conversions. As part of the conversion effort, the customer shall:

- Isolate the recycled water supply. Service shall be removed and plugged at the recycled water main or abandoned in a manner approved by the District or his designated representative;
- Installation and testing approved backflow prevention assemblies. The customer shall install approved backflow prevention assemblies on all potable, recycled water, or other water meter connections;
- Remove any/all special recycled water quick couplers. The customer shall be responsible for replacement with quick couplers approved for potable water systems;
- Notify all on-site personnel involved;
- Remove all recycled water identification labels/signs, tags, and tapes where possible. Change out branded valve box lids, to the satisfaction of the District; and
- Provide required disinfection of all recycled water systems as mandated by appropriate regulatory agencies, and to the satisfaction of the District.

## **§10550      CONSTRUCTION WATER FACILITIES**

### **§10551      Service Connections**

Service connections for the construction use of recycled water may be provided by the District at locations as convenient as practicable to the customer, but at the discretion of the District.

The service shall include a valve connection to a recycled water distribution main and water meter whose capacity shall be determined by the District from information supplied by the customer in the application for recycled water service. The customer shall make the connection to the main in accordance with the District's requirements. The meter box, if applicable and the meter shall be supplied by the District and installed by the customer in accordance with District's requirements.

### **§10552      On-site Distribution Facilities**

Transmission lines for conveying recycled water from the metered service connection to a storage container or water distribution vehicle shall be of adequate size and structural integrity to ensure that leaks or ruptures will not occur during normal construction activity. The customer shall provide these on-site distribution transmission lines. Lines crossing construction roadways or other areas receiving regular vehicular traffic must be buried to a depth of at least 18 inches for pipes less than 2 inches in diameter or a minimum of 24 inches deep if pipe diameter is 2 inches or greater. All lines shall be sleeved with Class 200 pipe twice the diameter of the line. Rigid pipe able to withstand the planned vehicular loads shall be employed for such installations. All piping and appurtenances shall be identified as recycled water to the satisfaction of the District.

### **§10553      Storage Facilities**

Recycled water storage tanks and distribution vehicles shall be of adequate design and structural integrity to ensure that leaks or ruptures will not occur in the course of normal use. The customer shall provide these tanks or ponds. All storage ponds and any storage tanks not supported more than six feet above ground-level shall be contained within a fence or other enclosure that will restrict access by the general public to these facilities at all times when operations personnel are not present. Outlet control with positive shut-off shall be provided at each storage facility with mandatory District approved air gaps. All storage tanks shall be identified as recycled water to the satisfaction of the District.

All recycled water storage facilities owned and/or operated by the customer shall be protected against erosion, overland runoff, and other impacts unless it is a result of a 25-year frequency, 24-hour storm event, as defined by the Orange County Flood Control Agency.

#### **§10554      Distribution Vehicles**

Vehicles used for distributing recycled water for soil compaction and dust control shall be provided with adequate tanks and plumbing systems to ensure that leaks and ruptures will not occur in the course of normal use. A District-approved air gap is mandatory. Control valves shall be provided such that the recycled water can be applied in a controlled fashion on the approved use area and completely retained during transit in all other areas. Spray heads or nozzles shall be provided and configured such that the discharge is uniformly distributed and runoff, ponding, or windblown overspray conditions minimized. All distribution vehicles shall be identified as recycled water to the satisfaction of the District.

#### **§10555      Identification**

Identify all meters, valves, piping, storage tanks, water buffalos, distribution vehicles and impoundments utilizing recycled water shall be identified as recycled water to the satisfaction of the District.

#### **§10560      PROTECTIVE MEASURES**

The general backflow protection provisions are included within Section ~~3.9~~10345 (Backflow Prevention) of these Rules and Regulations.

During application for recycled water service, the applicant must provide sufficient information, including plumbing and building plans, to enable the District to determine the level of backflow protection required. The proper backflow protection, as determined by the District and approved by DDW and OCHCA, shall then be installed, inspected, and tested before recycled water service is provided.

The customer, on-site supervisor, owner, tenant, or operator shall notify the District not less than 30 days prior to a change of use regarding potable or recycled water. District will then reassess the level of protection required. Any and all proposed alterations or upgrades to existing on-site water facilities must be reported to and approved by the District prior to the proposed change.

At their discretion, representatives of the District, DDW, and OCHCA may conduct surveys of property where the District provides water service. These surveys are to determine if any actual or potential cross-connections exist. The customer shall provide full cooperation including manpower in facilitating these surveys.

Where protection is required, backflow protection in accordance with ~~Title 17~~the CCCPH and approved by DDW for potable water supplies shall be provided as follows:

- Each District water service connection that supplies potable water to a parcel having a recycled water supply shall be protected against backflow from the parcel into the potable water to the satisfaction of the District.

The only exception to the above requirement is the retrofit of homeowner association sites where recycled water is being proposed to irrigate common area on a portion of a single family residence. If the backflow protection of the District's potable water supply is not feasible or practicable, the District, with DDW's approval, may increase the required frequency of the cross connection testing in lieu of the construction of the backflow device at each residence. The waiving of the backflow protection will only be allowed on a case by case basis and only if approved in writing by DDW and the District.

- Backflow protection may be required at parcels where there has been a history of cross-connections to recycled water supply being re-established.

Water meters used for recycled water service shall be tagged, color-coded, or otherwise distinguished as such in accordance with these Rules and Regulations. These meters shall not be interchanged or used for potable water service after repairs and/or meter testing has been performed.

## **§10600      CONSTRUCTION SPECIFICATIONS**

## **§10610      GENERAL CONDITIONS**

All offsite water and recycled water facilities that will be ultimately owned by the District shall be designed and constructed according to the requirements, conditions, and standards of the District, including the District's Standard Specifications and/or Drawings.

All on-site irrigation facilities shall be designed by the design consultant for the owner and shall meet the requirements, as a minimum, of Section 212-2 of the Standard Specifications for Public Works Construction, latest edition. In addition to this minimum requirement, the design of the on-site irrigation facilities shall conform to local governing codes, rules, and regulations. The Cities of Laguna Hills, Laguna Woods, Aliso Viejo, Lake Forest and Mission Viejo shall have authority over the materials, equipment, design, and construction methods used for on-site recycled water facilities within their jurisdiction, provided that when the District's Rules and Regulations or Standard Specifications and/or Drawings require a higher quality material, equipment, design or construction method than that required by the above local governing codes, rules, and regulations, the District's Rules and Regulations or Standard Specifications and/or Drawings shall be controlling.

The following details and specifications for customer construction specifications that are use specific, such as for irrigation, are intended as examples of current use practice, and are not intended to preclude other approved uses, which may require case-by-case specifications.

All construction work for on-site recycled water facilities shall be in conformance with these Rules and Regulations, and addendums thereto. Work is to begin only after the contractor, installer, or customer has obtained approval in the form of signed plans or revisions for recycled water use from the District (issued a Use Permit) and the District has received approval from the DDW and/or OCHCA.

**§10611      Trade Names or Approved Equivalents**

The contractor shall be permitted to supply any of the specified materials or to offer for approval by the design consultant and the District equivalent materials in accordance with the appropriate section of the Rules and Regulations, and the District's Standard Specifications/Drawings.

**§10612      Permits and Licenses**

Except as otherwise provided, the contractor shall procure all permits and licenses, pay all charges and fees, and give all notices necessary and incidental to the due and lawful prosecution of the work.

**§10613      Liability**

Neither the District, the General Manager, the ~~Engineering Manager~~Director of Engineering, nor any other officer, member of the Board of Directors of the District, SARWQCB, DDW, OCHCA, employee or authorized agent of the said agencies shall be personally responsible for any liability arising out of the work performed. The customer shall procure and maintain for the duration of the construction period certificates of general liability insurance and workmanship insurance in forms and amendments approved by the District and naming the District, SARWQCB, DDW, OCHCA and all the agencies/individuals as additional insurers.

**§10614      Loss and Damage**

Neither the District, the SARWQCB, DDW, OCHCA, nor authorized representatives thereof shall be answerable or accountable in any manner for any loss or damage that may happen to the work or any part thereof; or for any material or equipment used in performing the work; or for injury or damage to any person(s), either workmen or the public; or for damage to adjoining property from any cause whatsoever during the progress of the work or at any time before or after final acceptance.

**§10615      Legal Responsibility**

The contractor shall keep fully informed of all laws, ordinances and regulations that in any manner affect those engaged or employed in the work or the materials used in the work, or that in any way affect the conduct of the work, and of all such orders and decrees of bodies or tribunals having any jurisdiction or authority over the same. If any discrepancy or inconsistency is discovered in the plans, drawings, specifications, or other documents in relation to any such law, ordinance, regulations, order, or decree, the contractor shall forthwith report the same to the design consultant and the District in writing.

The contractor shall observe and comply with and shall cause all of the contractor's agents and employees to observe and comply with all such existing and future laws, ordinances, resolutions, regulations, orders and decrees, and shall protect and indemnify the District, SARWQCB, DDW, OCHCA, and all their officers and agents against any claim or liability arising from or based on the violation of any such law, ordinance, regulation, order or decree, whether by the contractor or contractor's employees.

The contractor shall also indemnify and save the District, its officers, its employees or authorized agents harmless from all costs, losses, expenses, damages, attorneys' fees, and other costs of defense that the District may incur with respect to or on account of the work, and with respect to the failure, neglect or refusal of contractor to faithfully perform the work and all of contractor's obligations under the contract. Such costs, expenses, and damages shall include all costs incurred by the District to defend against any claims, stop notices or lawsuits based thereon in which the District is made a party.

The contractor shall observe the rules and regulations of the State, Department of Industrial Relations, Division of Industrial Safety, and, in particular, rules and regulations relating to shoring of trenches and excavations. All work shall be done in accordance with all directives, provisions and requirements pertaining to the method and manner of performing the work, in accordance with CAL-OSHA latest amendment or revision.

The contractor shall provide a job foreman present during working hours that can communicate effectively with District personnel both orally and in writing.

#### **§10616      Inspection Authority**

District shall at all times have access to all on-site work during construction and shall be furnished with such information as it may desire regarding location of facilities, the progress, workmanship and character of materials used in the work.

District shall have the authority to notify the customer of an apparent failure on the part of the contractor to carry out orders given or to perform any provisions of the plans or specifications. Upon its confirmation of the apparent failure, the customer shall be obligated to require the contractor to suspend the work wholly or in part. The contractor shall immediately comply with the written order of the District to suspend the work wholly or in part. Dependent on the nature of the non-compliance, it may require immediate action by the contractor via verbal order with a written order following. The work shall be resumed when methods or defective work are corrected as ordered and approved in writing by the District. Failure to comply with requests of the District will prevent further work, termination of all potable water and recycled water, and the final release of the entire project.

## **§10620      MATERIAL SPECIFICATIONS**

### **§10621      Identification Requirements**

Recycled water, potable water, and non-potable on-site identification requirements are specified in Section ~~5-2-9~~10529 ("Identification Requirements") of these Rules and Regulations.

For all buried offsite recycled water pipelines (PVC, ductile iron pipe or copper) and any on-site recycled water pipelines that cross public streets, the pipelines shall have purple colored warning tape, minimum of twelve (12) inches wide, placed in the trench 12-inches above the pipe with the wording, "CAUTION: RECYCLED WATER LINE BURIED BELOW". This is in addition to the identification on the recycled water pipeline required by Section ~~5-2-9~~10529 ("Identification Requirements") of these Rules and Regulations. This requirement is to provide additional warning for any excavation activities within the public streets to hopefully minimize the potential for damaging the recycled water pipeline.

### **§10622      Color**

The color for recycled water identification (warning) shall be purple, color code Pantone 512.

### **§10623      Buried Piping Identification (Warning) Tape**

The plastic warning tape shall be virgin low-density polyethylene specifically formulated for prolonged underground use. The minimum thickness shall be 4 mils and the overall width of the tape shall be 12-inches for 8-inch or larger diameter pipe and 6-inches for 6-inch and smaller diameter pipe.

### **§10624      Identification /Warning Tags**

Identification /warning tags shall be inert plastic film or polyurethane specifically formulated for prolonged exposure. The identification /warning tag shall incorporate an integral attachment neck and reinforced attachment hole. The size of the tag shall be 3-inch by 4-inch with a minimum thickness of 10 mils. Identification /warning tags shall be attached with heavy-duty nylon fasteners. The size, type of label and location will be dictated by each individual application and subject to acceptance by the District's representative. The minimum size shall be ½-inch letters. Tags shall be as manufactured by T. Christy Ent. (ID-Max-P2-RC009 for Recycled Water (purple) or ID-Max-B2-PW015 for Potable Water (blue) or ID-Max-Y2-NP012 for Non-Potable Water (yellow)) or approved equal. T. Christy Enterprises, Inc. is located at 655 E. Ball Road, Anaheim, CA 92805-3310 (phone: 800-258-4583; fax: 800-468-4583).

### **§10625      Warning Labels**



Warning labels shall be a minimum of 3.5 mil flexible vinyl base with a permanent acrylic adhesive backing on a 90# stayflat liner. Both the background and legend shall be printed with a UV cured vinyl ink. The entire decal shall be clear flood over-printed for superior weathering and UV protection. The size shall be 3.5 inch by 4.4 inch for controllers, 2.5 inch by 8.25 inch for pumping equipment, and 1.25 inch by 5.75 inch for potable water decals. The controller warning label shall be as manufactured by T. Christy Ent. (Christy's Part No. 4100) or approved equal. The pumping equipment warning label shall be as manufactured by T. Christy Ent. (Christy's Part No. 4200) or approved equal. The potable water decals shall be as manufactured by T. Christy Ent. (Christy's Part No. 4300) or approved equal.

#### **§10626      Identification Signs**

Recycled water identification signs shall be made of 1/16-inch thick, minimum, aluminum and its size shall be 12-inches wide by 9-inches high, minimum. The signage size and wording shall be approved by the District and the site owner. At a minimum the wording shall include "Recycled Water – Do Not Drink" and display the international symbol shown on Figure 60310-A in Title 22 of the California Code of Regulations. Submit the final verbiage including colors to the District for review and approval prior to ordering the identification signs. The location of the sign placement shall be determined in the field by the District, OCHCA and the site owner. An example of an approved sign is Christy's Part Number ID-Sign 4.5.

#### **§10627      Sprinkler Labeling/Tags**

For sprinkler risers located on slopes and/or in the vicinity of adjacent properties, the risers shall be installed with either sprinkler warning labels/warning tags or riser markers as is appropriate for each situation. The riser markers shall be Christy's Model #5100 for recycled water applications, and Christy's Model #5200 for non-potable water applications, or approved equal.

#### **§10628      Miscellaneous Irrigation Facilities**

- Recycled water identification products shall be used for irrigation piping, fittings and appurtenances where available.
- PVC sleeving shall be AWWA C-900 DR- 14 PVC pipe, or solvent weld joint, Class 200, 200 psi rated pipe or greater.
- All PVC pipe and fittings shall be installed below grade, except for ultra violet protected pipe and fittings.
- Water/garden hoses and hose appurtenances utilizing recycled water shall be purple in color with heavy-duty brass fittings. Hoses shall be continuously imprinted with "CAUTION: RECYCLED WATER – DO NOT DRINK" and rated at 150 psi working pressure. Hoses shall only be used for recycled water use. Potable water use at any time is strictly prohibited.
- Quick coupling valves may be required to be removed if they are used in contrary to District's Rules and Regulations or are located in an area that encourages

unauthorized use. The manner of removal shall be subject to approval by the District. Quick coupling valves shall conform to the following:

*Rating* – Quick coupling valves for recycled water shall be 1 piece one-inch nominal size with brass construction, acme thread body and key, and a normal working pressure of 125 psi. All quick coupling valves for recycled water shall be of a design that prevents the quick coupler key (spike) from being used in potable water or non-potable water quick couplers.

*Cover* – The cover shall be permanently attached to the quick coupling valve. It shall be purple in color and made of rubber or vinyl with the following information stamped or molded on the cover: “Recycled Water” in English and Spanish; “Do Not Drink” in English and Spanish; or the international “Do Not Drink” symbol (a glass of water in a circle with a slash through it); and a locking cover.

- Ball valves required directly behind the meter box or above ground before the strainer shall be full port ball valves.
- All remote control valves, gate valves, quick coupling, drip valve assemblies, flush valve assemblies, manual drain valves, and pressure relief valves shall be installed in suitable valve boxes, complete with locking and hinged cover, or other approved secure enclosure. Recycled water valve boxes and covers must be colored purple and have recycled water identification imprinted. All valve box covers shall be bolted down with stainless steel bolts and washers.
- Wye strainer/basket strainers shall have cast bronze or iron bodies. Screen shall be 80 mesh monel minimum, stainless steel screens. Automatic flushing is prohibited.
- Recycled water irrigation identification sprinkler heads shall be used whenever possible. All new irrigation heads shall have internal check valves.
- Adjustable-arc, adjustable-radius heads/nozzles shall be used whenever possible, and shall be mandatory at site perimeters, walks, play areas, along non-vegetated areas, hardscape, and near picnic tables/benches and drinking fountains.
- All risers shall be considered aboveground piping.
- All sprinkler heads shall be securely installed to minimize breakage utilizing sprinkler stabilizer systems and sprinkler ties.
- Install external check valves at all heads, bubblers, or lateral lines that exceed manufacture’s internal check valve requirements. Minimize all irrigation runoff at each head or bubbler immediately after valve has closed by installing appropriate inline check valves to the satisfaction of the District.
- District recommends that all irrigation controllers be equipped with a rain sensor module that shuts down the irrigation system during rainy conditions. Exceptions to the above would be centralized irrigation systems utilizing a centrally located weather station.
- District recommends moisture sensors/ tensiometers on all newly constructed or retrofitted irrigation systems.

- Inline pressure regulators smaller than 3-inches in diameter shall have a cast bronze body. The screens shall be stainless steel. Pressure regulators may be utilized in place of the pressure-regulating feature as part of the master valve requirement.
- Recycled water master valve shall be a cast bronze or iron (cast iron valves shall be epoxy coated) pressure regulating (manually and electrically) contamination proof, self-flushing-cleaning style valves, and normally closed position valve. Only valves that utilize reverse flow and fail in the closed position shall be utilized.
- The recycled water flow sensor must be compatible with the controller and master valve. The flow sensor must have high flow shut off capability for all remote control valves and irrigation system mainlines.
- Recycled water remote control valves can have purple plastic or brass bodies and bonnets. Purple valve handles shall be used. The valves shall be contamination proof, self flushing-cleaning style valves. It shall be pressure regulating (manually and electrically) where required due to elevation changes, normally closed positioned valve. Only valves that utilize reverse flow and fail in the closed position shall be utilized.

#### **§10629      Recycled Water Service Materials**

The recycled water service shall be constructed in accordance with the District's Standard Specifications and in accordance with the District's Standard Detail Drawing IRR-12. Copper pipe shall be Type "K" hard copper tubing. Copper fittings shall be copper conforming to ASTM B 75 and ANSI B16.22, with compression end joints ("Quick Joint Connections" manufactured by Ford. NO EQUAL). If bends are required, between the corporation stop and the 90 degree bend below the angle meter stop, due to vertical alignment or utility conflicts or if splices are required for long runs, solder end joints will be acceptable. Solder shall be tin-silver solder conforming to ASTM B32, latest revision, Grade Sn94, Sn95 or Sn96. This will be the only location where solder end joints will be acceptable. No splices shall be permitted between the 90 degree bend (compression grip bend) and the angle meter stop.

Corporation stops shall have a male iron pipe thread inlet and the outlet shall be a compression type connection with compression gasket and integral stainless steel gripper band (Quick Joint as manufactured by Ford, NO EQUAL). Corporation stops shall be of the "ball valve" type and rated for at a minimum 250 psi working pressure. Corporation stops shall as manufactured by Ford FB-1000-7-Q-NL style, NO EQUAL. Angle meter stops shall be "ball valve" type and shall be rated for a minimum 250 psi working pressure. The inlet connection of the angle meter stop shall be a compression type connection with compression gasket and integral stainless steel gripper band (Quick Joint as manufactured by Ford). The outlet fitting shall be a meter flange with an EPDM drop-in meter gasket. Two-inch angle meter stops shall be provided with "slotted" holes for 2-inch or 1-1/2" flanged meter connections. Angle meter stops shall be of the "ball valve" type as manufactured by Ford BFA43-777W-Q-NL Style, NO EQUAL.

The customer service valve, downstream of the meter, shall be manufactured with a lever-type turn handle. Customer service valve shall be "ball valve" type and shall be rated for a minimum of 250 psi working pressure. The valve inlet connection shall be meter flange and the outlet connection shall be female iron pipe thread. Recommended customer service valve manufacture is Ford.

The meter box shall be reinforced polymer/plastic mortar meter box (17" wide by 30" long by 12" deep) and shall be provided with a cover with reading lid in two separate rectangular pieces. The meter box shall be manufactured by J&R, Inc., Armorcast Products Company, or Quazite Corporation, NO EQUAL.

#### **§10630      Potable Water Plumbing**

In September 2006, the State Legislature passed Assembly Bill 1953 prohibiting the use of any pipe, pipe or plumbing fitting or fixture, solder or flux that is not lead free in the installation or repair of any fixture intended to convey or dispense water for human consumption. The prohibition has been in effect since January 1, 2010.

All potable water facilities shall be provided with materials that meet the lead free requirements as defined in AB 1953, and certified by an independent American National Standards Institute (ANSI) accredited third party, including but not limited to, NSF International, as being in compliance with Section 116875 (g) of the Health and Safety Code as amended by AB 1953. Each shipment shall contain a copy of the certification that the item is lead free as defined by AB 1953.

#### **§10631      Construction Water Facilities**

All piping employed for the transmission of recycled water for construction purposes shall be in serviceable condition and free from leaks and structural faults. All joints shall be structurally sound and free from leaks.

All valves employed with facilities using recycled water for construction purposes shall be in serviceable condition, provide positive shutoff, and be free from leaks.

All storage tanks used for recycled water, whether fixed or mounted on distribution vehicles, shall be structurally sound and free from leaks. Approved air gaps are mandatory.

All distribution vehicles used for recycled water, shall be structurally sound and free from leaks. Spray heads or nozzles shall be provided and configured such that the discharge is uniformly distributed and runoff, ponding, or windblown overspray conditions minimized. All distribution vehicles shall be identified as recycled water to the satisfaction of the District.

#### **§10640      METHODS OF CONSTRUCTION**

#### **§10641      Offsite Potable and Recycled Water Facilities**

All offsite water and recycled water facilities that will be ultimately owned by the District shall be constructed according to the requirements, conditions, and standards of the District, including the District's Standard Specifications and/or Drawings.

#### **§10642      On-site Irrigation Systems**

All on-site irrigation facilities shall be constructed per the requirements of the design consultant for the owner and shall meet the requirements, as a minimum, of Section 308-5 of the Standard Specifications for Public Works Construction, latest edition. In addition to this minimum requirement, the construction of the on-site irrigation facilities shall conform to local governing codes, rules, and regulations. The Cities of Laguna Hills, Laguna Woods, Aliso Viejo, Lake Forest, and Mission Viejo shall have authority over the construction methods used for on-site recycled water facilities within their jurisdiction, provided that when the District's Rules and Regulations or Standard Specifications and/or Drawings require a higher quality construction method than that required by the above local governing codes, rules, and regulations, the District's Rules and Regulations or Standard Specifications and/or Drawings shall be controlling.

All onsite valves, valve boxes, valve markers and power supplies shall be installed in accordance with the requirements in the Rules and Regulations and local building codes.

Separation between on-site recycled water lines, potable water lines and non-potable water lines shall be in conformance with the requirements specified in Section 5.2.710527 ("On-site Separation Requirements") of these Rules and Regulations. Common trenching with other utilities or any other systems is strictly prohibited.

Identification /warning tape shall be installed directly on the top of the pipe longitudinally and shall be centered. The warning tape shall be installed continuously for the length of the pipe and shall be fastened to each pipe length by plastic adhesive tape banded around the pipe and warning tape at no more than 5-foot intervals. Taping attached to the sections of pipe before installing in the trench shall have a 5-foot minimum overlap for continuous coverage.

Identification/warning tags shall be firmly attached to appurtenances using heavy-duty nylon fasteners. One warning tag shall be attached to each appurtenances as follows: attach to valve stem directly or with plastic tie wrap; attach to solenoid valve directly or with plastic tie wrap; attach to valve cover with existing valve cover bolt or attach to the body of the relative appurtenance with a plastic tie-wrap. Warning labels (decals) shall be placed on all controllers and pumping equipment.

Recycled water lines, 1-½ inches and less in diameter shall be buried below grade with a cover of at least 18 inches. Recycled water pipelines 2-inches and greater shall be buried with a cover of at least 24 inches or 36 inches when potable water is used on-site.

Recycled water lines laid above grade shall be protected from thrust motion if such protection is determined to be required by the design engineer or inspector. To achieve such protection, utilize stabilizer systems.

**§10643      On-site Construction Water Facilities**

All valves installed along the recycled water transmission pipeline and not attached to a rigid structure shall be protected from thrust motion if such protection is determined to be required by the engineer or inspector. To achieve such protection, metal stakes with wire or plumbers tape lashes shall be installed at all such valves. Alternative methods of protection from thrust motion may be approved by the engineer or inspector.

All distribution vehicles used for recycled water and not for drinking water, shall be structurally sound and free from leaks. All distribution vehicles shall be identified as recycled water to the satisfaction of the District.

All recycled water storage tanks shall be erected only on level ground. Provisions shall be made to prevent differential settling of the tank supporting structure. Approved air gaps are mandatory.

**§10650      INSPECTION INCLUDING INSPECTION ITEMS**

**§10651      General**

The inspection of the work shall not relieve the contractor of any obligations to complete the work as prescribed by the applicable specifications. Defective work shall be made good and unsuitable materials may be rejected notwithstanding the fact that such defective work and unsuitable materials or materials not as specified on the approved plans, that have been previously overlooked by the inspector and accepted. The installation and inspection of unsuitable materials or materials not as specified on the approved plans shall not be construed as acceptance, and modification to these specifications shall only be made by the District in writing.

**§10652      Inspection Items**

The following is a summary of the general items, as a minimum, that will be inspected by the District:

- Attend pre-construction meeting on-site;
- Prior to backfilling all trenches so the piping identification can be verified;
- Identification/ warning tape (recycled, potable and non-potable);
- Meter and meter box setting;
- Mainline record drawing;
- Pressure test of any offsite piping;

- Valves (master valves, control valves, pressure regulating valves, downstream ball valve);
- Backflows and all wye or basket strainers (verify 80 mesh monel screens);
- Irrigation pumps;
- Valve box and cover identification;
- Quick coupling valve – locations and installation;
- Required identification: piping, riser pipe, sprinkler heads, etc.;
- External check valves – as necessary to prevent drainage after valve is closed;
- Site Identification Signs;
- Complete review of site and irrigation system installation;
- Submittal and approval of all calibration/test reports, certificates and written approvals;
- Submittal of letters of project acceptance from the irrigation designer and landscape architect;
- Coverage Tests;
- Record drawings' package review, and approval;
- Controller installation, and hours of operation;
- Moisture sensor/automatic rain shutoff calibration and operation;
- Fertilizer injector operation;
- Pressure regulator setting (per plan specifications); and
- Cross-connection testing on all potable, non-potable and recycled water points of connections.

#### **§10653      Construction Schedule**

If required by the District, the contractor shall submit a schedule to the District outlining his proposed construction operation. The contractor shall conform to the Rules and Regulations of the District regarding prior notification for inspection and deviations from the approved schedule.

#### **§10654      Notification and Approvals**

All work, on-site and offsite, shall be subject to inspection and approval, as required by the District in these Rules and Regulations and the District Standard Specifications. The contractor shall schedule with the District, DDW, and OCHCA, and all other regulating agencies for inspection on all on-site irrigation, potable, and fire systems. The contractor shall give due notice to the inspector in advance of backfilling so that proper inspection may be provided. Unless the District expressly states otherwise, the contractor in advance of any and all inspection requirements shall give a minimum of two (2) working days (48 hours) notice, whether for materials or construction work.

**§10655      Inspection Intervals**

All work shall be subject to inspection by the District and shall be left open and uncovered until approved by the District and OCHCA. Potholing of piping is strictly prohibited.

The contractor shall not proceed with any subsequent phase of work until the previous phase has been inspected and approved by the District Inspector. Record drawings must be updated daily prior to inspection.

**§10656      Final Inspection**

Following the completion of all construction work and the submittal and approval of record documents, calibration reports, certificates, and installation approvals, the Contractor shall request final inspection of the work. This request shall include the scheduling of the cross-connection and operational testing.

Before final acceptance, the District, accompanied by the Contractor's superintendent or foreman, will make a final inspection of all work.

**§10657      Construction Water Facilities Inspection**

The contractor or operator shall give the District a construction schedule prior to initiation of construction work.

Unless the District expressly states otherwise, the contractor or operator in advance of any and all inspection requirements shall give a minimum of two (2) working days (48 hours) notice, whether for materials or installation work.

The contractor or operator shall request final inspection of the work. Prior to use of recycled water, District approval must be obtained. Signage, labels, and air gap on truck tank must be installed. The Use Permit must be onsite and in vehicle.

**§10660      REVIEWS**

**§10661      District Offsite Facilities**

The contractor shall furnish the District with such information, as is required by the District's Standard Specifications and these Rules and Regulations, regarding the character and quality of materials used for all offsite water and recycled water facilities that will be ultimately owned by the District. The contractor shall submit all shop drawings and certifications as specified within the District's Standard Specifications.

All pipe and accessories shall be carefully inspected by the District and contractor for damage in transit. Any damaged or degraded pipe or fittings delivered and unloaded at trench-site shall be rejected and removed immediately by the contractor from the site of the work.



All new piping systems shall be subjected to a hydrostatic pressure test and all potable water mains shall be chlorinated for disinfection as specified within the District's Standard Specifications.

**§10662      On-site Irrigation Systems**

For the on-site irrigation systems, the District will focus its review on the identification requirements and any other specific items that are specified by these Rules and Regulations. The character and quality of the materials used for the irrigation system will be the responsibility of the design engineer and/or applicant/customer/owner of the property.

The contractor shall furnish the District with such information, as it may desire, regarding the character and quality of materials used. When requested by District, the contractor shall submit a certification that the product meets the requirements of these Rules and Regulations.

The on-site irrigation system shall be tested as required by the design engineer and/or landscape architect for the applicant/customer/owner of the property and as is required by the DDW, District and OCHCA .

**§10663      Construction Water Facilities**

For construction water facilities, the District will focus its review on the identification requirements and any other specific items that are specified by these Rules and Regulations. The character and quality of the materials used for the construction water facilities will be the responsibility of the design engineer and/or developer/customer/owner of the property.

The contractor shall furnish the District with such information, as it may desire, regarding the character and quality of materials used for those portions of the work that are dealing with the District's concerns as stated in these Rules and Regulations.

Installed pressure piping systems for the construction water facilities shall be subjected to hydrostatic testing as specified in the District's Standard Specifications. The hydrostatic test shall be administered by the inspector with the cooperation of the contractor. Before testing, the pipe and valves shall be staked if such protection from thrust motion has been determined to be required by the engineer or inspector. Any noticeable leaks shall be stopped and defective materials shall be replaced. Valves shall be operated during the test period.

Prior to final acceptance by the District, all construction water facilities shall be required to successfully pass an operational test as administered by the design consultant in the presence of the District inspector. The hydrostatic test for installed pressure piping systems in conjunction with a leak test of all storage tank installations shall constitute the operational test.

Any required corrections shall be noted in the form of a punch list and submitted to the contractor by the District for correction. Service startup shall not be authorized until all corrections are made to the satisfaction of the District.

## **§10670      GENERAL TESTING**

### **§10671      Offsite Facilities**

Prior to final acceptance by the District, all offsite water and recycled water facilities that will be ultimately owned by the District shall pass all testing requirements specified within the District's Standard Specifications. All testing shall be conducted in accordance with the District's Standard Specifications. The tests shall be conducted by the contractor in the presence of the District inspector. The scheduling of these tests shall be the responsibility of the contractor. The contractor shall provide adequate manpower.

Upon the successful completion of the required testing, the District will perform the final inspection in accordance with the District's Standard Specifications. All identification requirements will be reviewed and field inspected. As-built package will be reviewed and finalized. The District will note all required corrections in the form of a punch list issued to the contractor. Final acceptance of the offsite facilities will not be authorized until all corrections are made to the satisfaction of the District.

### **§10672      On-site Facilities**

Prior to final acceptance by the District, all on-site recycled and potable water systems shall pass an operational test within 30 days of the completed irrigation system installation. The test shall be conducted by the contractor in the presence of the District inspector and OCHCA. The scheduling of these tests shall be the responsibility of the contractor. The contractor shall provide adequate manpower.

The following items shall be examined:

- All items as stated in the final inspection requirements as summarized in Section [6.4.210652](#) ("Inspection Items") of this section of the Rules and Regulations;
- Operation and programming/set-up of the automatic controllers and related appurtenances;
- General operation and coverage of the irrigation system;
- Required backflow protection and all backflow test reports of the on-site potable water systems;
- Site and appurtenance identification requirements as determined by the District inspector;
- Cross-connection testing for points of connection; and
- As-built package review and submittal.

The District shall note all required corrections in the form of a punch list issued to the contractor. Regular service startup shall not be authorized until all corrections are made to the satisfaction of the District. Punch list is valid for 30 days only.

## **§10680      ON-SITE TESTING**

The following is a summary of the on-site checking and testing that the District will perform:

1. The site will be reviewed for the following recycled water identification requirements:
  - Recycled water meter warning tag;
  - Recycled water site identification signs;
  - Recycled water controller charts;
  - Recycled water use site identification number on controller enclosure;
  - Recycled water controller and above ground piping labels;
  - Recycled water warning tags for all appurtenances;
  - Identification/warning tape on below ground piping;
  - Recycled water valve box identification (tags, branding, etc.)
  - Recycled water quick coupling valve locking purple cover and Acme thread; and
  - Recycled water sprinkler heads, bubblers, drip systems and riser identification labels.
2. Where potable water is used for irrigation (non-potable water), the following identification will be checked:
  - Blue potable water meter identification tag;
  - Yellow non-potable water tag on the backflow assembly downstream ball valve;
  - Green non-potable water labels for controller and above ground piping;
  - Yellow non-potable water warning tags for all appurtenances;
  - Green warning tape on below ground piping;
  - Non-potable water valve box identification (tags, branding, etc.)
  - Yellow non-potable water identification and tags for quick coupling valves; and
  - Green non-potable water sprinkler heads, bubblers, drip systems and riser identification labels.
3. Where potable water is used for domestic purposes, the following identification will be checked:

- Blue potable water meter identification tag;
  - Blue potable water tag on the backflow assembly upstream ball valve;
  - Blue potable water identification tag for all exterior hose bibs;
  - Blue potable water identification for all exposed exterior piping;
  - Blue potable water identification tags for all appurtenances;
  - Blue potable water identification tape on below ground piping;
  - Potable water valve box identification (tags, branding, etc.)
4. Where potable water fire protection is on-site, the following identification will be checked:
- Blue potable water meter identification tag; and
  - Blue potable water tag on the backflow assembly upstream ball valve.
5. Coverage Testing:
- Operate all recycled water irrigation valves to verify minimum runoff, ponding, misting, and overspray;
  - Eliminate direct spray onto all areas other than District approved irrigated area, especially those that there may be a possibility of public contact;
  - Identify and eliminate systems that irrigate areas not approved to utilize recycled water; and
  - All plant materials shall be trimmed, removed, or irrigation systems altered to prevent obstruction of the irrigation spray patterns, to the satisfaction of the District.
6. Cross connection testing:
- Follow all control testing procedures as summarized in Section [6-810690](#) ("Cross-connection Test") of these Rules and Regulations. Contact the District Cross Connection Specialist if there are questions.
7. Verify use site conforms to the most current District approved as-built drawings.
8. Review Use Permit for contact information and on-site supervisor information.
9. Review recycled water testing forms included in the Appendix for all quarterly tests since last routine on-site inspection and testing.
10. Inquire with the on-site supervisor or his designated representative if any upgrades, alterations, or repairs have taken place on the use site since the last site inspection.

11. The District shall note all corrections in the form of a punch list issued to the on-site supervisor. It shall be the on-site supervisor's responsibility to contact the District for all corrections noted on the punch list within thirty (30) consecutive calendar days after issuance to avoid termination of recycled water service. Recycled water service will not be reconnected until all punch list items have been completed to the satisfaction of the District.

**§10690      CROSS-CONNECTION TEST**

Case I applies to cases where recycled water is the only water supplied to a site. Case II applies to where recycled water and potable water are being supplied to a site. The following are the steps required to perform the cross-connection control testing for each of these cases.

**§10691      Case I (Recycled Water used for irrigation – no other water sources on site)**

1. Verify and record the following:
  - Owner address, site address, on-site supervisor, meter number, meter sizes and meter location;
  - Public and private backflow protection information, locations, and current test reports;
  - Identification tags and labels for all meters, vaults, backflow assemblies, and related appurtenances;
  - Use site number on controller enclosure; and
  - List of all personnel in attendance and participating in testing.
2. Verify full irrigation system operation and pressure for all valves and sprinklers on the recycled water irrigation system.
3. Deactivate Recycled Water System:
  - Turn off and lock service;
  - Customer shall open master valve manually (if any);
  - Attach "Cross Connection Testing in Progress" tag to water meter. Attach magnetic "cross connection testing in progress" label to controller door;
  - Run each control valve using irrigation controller, run all quick coupling valves; and
  - Customer shall turn off irrigation controller.
4. Drain System - Reduce pressure to an acceptable level (approved by regulatory agency).

5. Verify the water pressure does not exceed an acceptable level at the low points of the system.
6. Start 48-hour cross connection test. Record start date and time. Notify on-site personnel recycled water irrigation system is to remain off for testing.
7. Return to site a minimum of 48 hours after start of cross-connection test. Record end date and time.
8. Verify the following conditions:
  - Angle stop is off and locked;
  - Master valve is open (in manual position);
  - Irrigation controllers are still off; and
  - Verify the system water pressure does not exceed an ("acceptable level") (as approved by the regulatory agencies) at the low point of the recycled water irrigation system.
9. Complete report stating whether irrigation system passed or failed the cross connection test.

If system passed - District unlocks and turns on angle stop, the customer's on-site maintenance personnel are responsible for pressurizing the recycled water irrigation system, turning on controller, and returning the master valve back to the normal operating position.

If system fails - Angle stop shall remain off and locked. The District will notify customer, SARWQCB, DDW and OCHCA of cross connection. Locate source of cross connection. Eliminate cross connection. Retest all systems. Complete cross-connection report form. Other requirements may be required by the District as necessary on a case-by-case basis.

10. District will file cross-connection test report. Send copy to DDW and OCHCA and the owner, upon request.

**§10692      Case II (Recycled Water used for irrigation with potable water service on site)**

1. Verify and record the following:
  - Owner address, site address, on-site supervisor, meter number, meter sizes and meter location;
  - Public and private backflow protection information, locations, and current test reports;

- Identification tags and labels for all meters, vaults, backflow assemblies, and related appurtenances;
  - Use site number on controller enclosure; and
  - List of all personnel in attendance and participating in testing.
2. Test each system in the following order:
    - A. Recycled Water used for irrigation systems;
    - B. Recycled Water non-irrigation systems;
    - C. Potable water used for irrigation systems (non-potable);
    - D. Potable water fire protection systems; and
    - E. Potable water systems.

**A. *Recycled Water Used for Irrigation Cross-Connection Test***

1. Verify full irrigation system operation and pressure for all valves and sprinklers on the recycled water irrigation system. Customer shall manually open master valve, if any on the recycled water irrigation systems.
2. Verify full water pressure at all recycled water non-irrigated systems.
3. Verify full irrigation system operation and pressure for all valves and sprinklers on the potable water used for irrigation system (non-potable). Customer shall manually open master valve, if any on the non-potable water irrigation systems.
4. Verify full water pressure at potable water fire protection systems, as necessary.
5. Verify full water pressure at all potable water system outlets (buildings, restrooms, drinking fountains, sinks, hose bibs, and all other facilities and appurtenances).
6. Deactivate Recycled Water Irrigation System:
  - Turn off and lock angle stop;
  - Customer shall open master valve manually (if any);
  - Attach "Cross Connection Testing in Progress" tag to water meter. Attach magnetic "cross connection testing in progress" label to controller door; and
  - Customer shall turn off irrigation controller.

7. Drain System - Reduce pressure to an acceptable level as approved by the regulatory agencies on the recycled water irrigation system at the low point of the system.
8. Verify full water pressure on the following systems: recycled water systems not a part of the irrigation system; at the end of the potable water used for irrigation (non-potable) systems; potable water fire protection systems, as necessary; and all potable water outlets.
9. Start recycled water irrigation system cross-connection test. Record start date and time. Notify on-site personnel recycled water irrigation system is to remain off for testing.
10. Return to site within the time established by the regulatory agencies after start of cross-connection test. Record end date and time.
11. Verify the following conditions on the recycled water irrigation system:
  - Angle stop is off and locked;
  - Master valve is open (in manual position);
  - Irrigation controllers are still off; and
  - Verify the system water pressure does not exceed an "acceptable level" (as approved by the regulatory agencies) at the low points of the recycled water irrigation system.
12. Verify full water pressure on the following systems: recycled water systems not a part of the irrigation system; at the end of the potable water used for irrigation (non-potable) systems; potable water fire protection systems, as necessary; and all potable water outlets.
13. Complete section of the report stating whether recycled water irrigation system has passed or failed the cross connection test.

If system passed - District unlocks and turns on angle stop, the customer's on-site maintenance personnel are responsible for pressurizing the recycled water irrigation system, turning on controller, returning the recycled water master valve back to the normal operating position.

If system fails - Angle stop shall remain off and locked. Turn off and lock all potable water angle stops. Discontinue use of all systems until further notice. The District will notify customer, SARWQCB, DDW and OCHCA of cross connection. Locate source of cross connection. Customer will eliminate cross connection. Retest all systems. Complete cross-connection report form. Other requirements may be required by the District as necessary on a case-by-case basis, as determined by the District.

***B. Recycled Water System (Not Used for Irrigation) Cross-Connection Test***



1. Verify full water pressure on recycled non-irrigation water systems.
2. Verify full irrigation system operation and pressure for all valves and sprinklers on the recycled water irrigation system. Customer shall manually open master valve, if any on the recycled water irrigation system.
3. Verify full irrigation system operation and pressure for all valves and sprinklers on the potable water used for irrigation systems (non-potable). Customer shall manually open master valve, if any on the non-potable water irrigation systems.
4. Verify full water pressure at potable water fire protection systems, as necessary.
5. Verify full water pressure at all potable water system outlets (buildings, restrooms, drinking fountains, sinks, hose bibs, and all other facilities and appurtenances).
6. Deactivate Recycled Non-Irrigation Water System:
  - Turn off and lock angle stop; and
  - Attach "Cross Connection Testing in Progress" tag to water meter.
7. Drain recycled water non-irrigation system and reduce pressure to an acceptable level as approved by the regulatory agencies on the recycled water non-irrigation system.
8. Verify full water pressure on the following systems: at the end of the recycled water irrigation systems; at the end of the potable water used for irrigation (non-potable) systems; potable water fire protection systems, as necessary; and all potable water outlets.
9. Start recycled water non-irrigation system cross-connection test. Record start date and time. Notify on-site personnel recycled water non-irrigation system is to remain off for testing.
10. Return to site within the time established by the regulatory agencies after start of cross-connection test. Record end date and time.
11. Verify the following conditions on the recycled water non-irrigation system:
  - Angle stop is off and locked; and
  - The system water pressure does not exceed an acceptable level (as approved by the regulatory agencies) on the recycled water non-irrigation system.

12. Verify full water pressure on the following systems: at the end of the recycled water irrigation systems; at the end of the potable water used for irrigation (non-potable) systems; potable water fire protection systems, as necessary; and all potable water outlets.
13. Complete section of the report stating whether recycled water non-irrigation system has passed or failed the cross connection test.

If system passed - District unlocks and turns on service, the customer's on-site maintenance personnel are responsible for pressurizing the recycled water non-irrigation system, and returning both the recycled water irrigation and potable water irrigation (non-potable) master valves back to the normal operating position.

If system fails - Service remains off and locked. The District staff will turn off and lock all recycled water and potable water angle stops. Discontinue use of all systems until further notice. The District will notify customer, SARWQCB, DDW and OCHCA of cross connection. Locate source of cross connection. Customer will eliminate cross connection. Retest all systems. Complete cross-connection report form. Other requirements may be required by the District as necessary on a case-by-case basis, as determined by the District.

### ***C. Potable Water Used for Irrigation (Non-potable) Cross-Connection Test***

1. Verify full irrigation system operation and pressure for all valves and sprinklers on the potable water used for irrigation system (non-potable). Customer shall manually open master valve, if any on the potable water used for irrigation systems.
2. Verify full irrigation system operation and pressure for all valves and sprinklers on the recycled water irrigation system. Customer shall manually open master valve, if any on the recycled water irrigation systems.
3. Verify full water pressure at all recycled water non-irrigation systems.
4. Verify full water pressure at potable water fire protection systems, as necessary.
5. Verify full water pressure at all potable water system outlets (buildings, restrooms, drinking fountains, sinks, hose bibs, and all other facilities and appurtenances).
6. Deactivate Potable Water Irrigation System (Non-potable):
  - Turn off backflow at isolation valves;

- Verify master valve is manually open (if any);
  - Attach "Cross Connection Testing in Progress" tag to backflow. Attach magnetic "cross connection testing in progress" label to controller door; and
  - Customer shall turn off irrigation controller.
7. Drain System - Reduce pressure to an acceptable level as approved by the regulatory agencies on the potable water used for irrigation system (non-potable) at the low point of the system.
  8. Verify full water pressure on the following systems: at the end of the recycled water irrigation systems; recycled water non-irrigation system; potable water fire protection systems, as necessary; and all potable water outlets.
  9. Start potable water used for irrigation system (non-potable) cross-connection test. Record start date and time. Notify on-site personnel potable water used for irrigation system is to remain off for testing.
  10. Return to site within the time established by the regulatory agencies after start of cross-connection test. Record end date and time.
  11. Verify the following conditions on the potable water used for irrigation system:
    - Backflow isolation valves are off;
    - Verify that master valve is manually open (if any);
    - Irrigation controllers are still off; and
    - Verify the system water pressure does not exceed an "acceptable level" (as approved by the regulatory agencies) at the low points of the potable water used for irrigation system.
  12. Verify full water pressure on the following systems: at the end of the recycled water irrigation systems; recycled water systems not a part of the irrigation system; potable water fire protection systems, as necessary; and all potable water outlets.
  13. Complete section of the report stating whether potable water used for irrigation system (non-potable) has passed or failed the cross connection test.

If system passed - District turns on backflow isolation valves. The customer's on-site maintenance personnel are responsible for pressurizing the potable water used for irrigation system, turning on controller, returning the potable water used for irrigation master valve back to the normal

operating position and returning the recycled water irrigation master valve back in the normal operating position..

If system fails - Turn off and lock all potable water and recycled water angle stops. Discontinue use of all systems until further notice. The District will notify customer, SARWQCB, DDW and OCHCA of cross connection. Locate source of cross connection. Customer will eliminate cross connection. Retest all systems. Complete cross-connection report form. Other requirements may be required by the District as necessary on a case-by-case basis, as determined by the District.

***D. Potable Water Fire Protection Systems Cross-Connection Test, As Necessary***

1. **Owner** shall notify employees, tenants, and the Fire Department that fire protection system is under pressure testing. Verify full pressure at all potable water fire protection system outlets, as necessary. Check pressure gauge and record psi at the beginning of all cross connection testing.
2. Verify full irrigation system operation and pressure for all valves and sprinklers on the recycled water irrigation system. Customer shall manually open master valve, if any on the recycled water irrigation system.
3. Verify full water pressure on recycled non-irrigation water system outlets.
4. Verify full irrigation system operation and pressure for all valves and sprinklers on the potable water used for irrigation systems (non-potable). Customer shall manually open master valve, if any on the non-potable water irrigation systems.
5. Verify full water pressure at all potable water system outlets (buildings, restrooms, drinking fountains, sinks, hose bibs, and all other facilities and appurtenances).
6. Owner turns off fire protection system at backflow device.
7. Attach "Cross Connection Testing in Progress" tag to backflow device inlet handle.
8. Check pressure gauge and record psi on the potable water fire protection system.
9. Verify full water pressure on the following systems: at the end of the recycled water irrigation systems; recycled water non-irrigation systems; at the end of the potable water used for irrigation (non-potable) systems; and all potable water outlets.
10. Start potable water fire protection system cross-connection test. Record system psi at pressure gauge, start date and time.

11. Return to site within the time established by the regulatory agencies after start of cross-connection test. Record end date and time.
12. Verify potable water fire protection system pressure at the pressure gauge has not changed from previous reading.
13. Verify full water pressure on the following systems: at the end of the recycled water irrigation systems; recycled water non-irrigation systems; at the end of the potable water used for irrigation (non-potable) systems; and all potable water outlets.
14. Complete section of the report stating whether the potable water fire protection system has passed or failed the cross connection test.

If system passed - Customer's on-site maintenance personnel are responsible for opening backflow isolation valves, pressurizing the fire protection system, notifying the fire department that the system is back on-line. Returning both the recycled water irrigation and potable water irrigation (non-potable) master valves back to the normal operating position.

If system fails - Service remains off and isolated. The District staff will turn off and lock all recycled water and potable water angle stops. Discontinue use of all systems until further notice. The District will notify customer, SARWQCB, DDW and OCHCA of cross connection. Locate source of cross connection. Customer will eliminate cross connection. Retest all systems. Complete cross-connection report form. Other requirements may be required by the District as necessary on a case-by-case basis, as determined by the District.

#### ***E. Potable Water Cross-Connection Test***

1. Provide notification 48 hours in advance to impacted customers of the time, duration and purpose of the potable water cross connection test.
2. Verify full water pressure at all potable water system outlets (buildings, restrooms, drinking fountains, sinks, hose bibs, and all other facilities and appurtenances).
3. Verify full irrigation system operation and pressure for all valves and sprinklers on the recycled water irrigation system. Customer shall manually open master valve, if any on the recycled water irrigation system.
4. Verify full water pressure on recycled non-irrigation water system outlets.
5. Verify full irrigation system operation and pressure for all valves and sprinklers on the potable water used for irrigation systems (non-potable). Customer shall manually open master valve, if any on the non-potable water irrigation systems.

6. Verify full water pressure at potable water fire protection systems, as necessary.
7. Deactivate potable water system.
  - Turn off backflow at isolation valves; and
  - Attach "Cross Connection Testing in Progress" tag to isolation valve.
8. Drain and reduce pressure to an acceptable level (as approved by the regulatory agencies) on the potable water system. Verify the water pressure is at an acceptable low level at low point of system.
9. Verify full water pressure on the following systems: at the end of the recycled water irrigation systems; recycled water non-irrigation systems; at the end of the potable water used for irrigation (non-potable) systems; and potable water fire protection systems, as necessary.
10. Start potable water cross-connection test. Record start date and time.
11. Return to site within the time established by the regulatory agencies after start of cross-connection test. Record end date and time.
12. Verify potable water systems pressure does not exceed an acceptable level (as approved by the regulatory agencies) at the low points of the potable water system.
13. Verify full water pressure on the following systems: at the end of the recycled water irrigation systems; recycled water non-irrigation systems; at the end of the potable water used for irrigation (non-potable) systems; and potable water fire protection systems, as necessary.
14. Complete section of the report stating whether the potable water system has passed or failed the cross connection test.

If system passed - Customer's on-site maintenance personnel are responsible for opening backflow isolation valves, pressurizing the potable water system, returning both the recycled water irrigation and potable water irrigation (non-potable) master valves back to the normal operating position.

If system fails - Service remains off and isolated. The District staff will turn off and lock all recycled water and potable water angle stops. Discontinue use of all systems until further notice. The District will notify customer, SARWQCB, DDW and OCHCA of cross connection. Locate source of cross connection. Customer will eliminate cross connection. Retest all systems. Complete cross-connection report form. Other requirements may be required by the District as necessary on a case-by-case basis, as determined by the District.

**Note: All testing shall be done in conjunction with and the approval of the District Recycled Water Inspectors, Customer Service Cross-Connection Specialists, and DDW and OCHCA.**

**§10693      Site Specific Requirements**

The Owner of record shall be required to notify their employees and/or tenants when cross connection control testing may affect the water service to facilities under the Owner's control.

The Owner of record shall be required to notify their employees, tenants, and the fire department when the fire protection system is involved in the cross connection control testing process. (Fire watches and/or other related requirements are the sole responsibility of the Owner.)

For recycled water non-irrigation systems, testing requirements will be determined on a case-by-case basis by the District.

**§10700      OPERATIONAL REQUIREMENTS**

The operation and surveillance of all of the District's offsite water and recycled water facilities, up to and including the District's meter, shall be under the management and control of the District. No other persons except authorized employees and/or representatives of the District shall have any right to inspect, operate, adjust, change, alter, move, or relocate any portion of the District's facilities.

The operation and surveillance of on-site water and recycled water facilities are the responsibility of the applicant, owner, or customer. However, pursuant to these Rules and Regulations, the District shall monitor and inspect the on-site recycled water system and shall have the right to enter upon the customer's premises during reasonable hours.

**§10710      SPECIFIC LIMITATIONS**

The following is a summary of specific limitations on properties that are using recycled water.

**§10711      Runoff Conditions**

Conditions that directly or indirectly cause runoff outside of/or within the approved use area, whether by design, construction practice, or system operation, shall be minimized. The use of recycled water on water-saturated or frozen ground or during periods of precipitation such that runoff is induced, is prohibited.

**§10712      Ponding Conditions**

Conditions that directly or indirectly cause a ponding condition outside of or within the approved use area, whether by design, construction practice, or system operation, shall be

minimized. Temporary ponding in a vegetated area caused by draining of system or meter testing is allowed in District specified areas with prior District approval.

**§10713      Direct Overspray Conditions**

Any discharge of water directly onto areas other than that within the approved use area is strictly prohibited.

**§10714      Windblown Overspray Conditions**

Conditions that directly or indirectly permit windblown spray to pass outside of the approved use area, whether by design, construction practice, or system operation, shall be minimized.

**§10715      Unapproved Uses**

Use of recycled water for any purposes other than those explicitly approved in a Use Permit issued by the District and without the prior knowledge and approval of the District is strictly prohibited.

**§10716      Disposal In Unapproved Areas**

Disposal of recycled water for any purposes, including approved uses, in areas other than those explicitly approved in the Use Permit issued by the District and without the prior knowledge and approval of the District, is strictly prohibited. Discharge of water from flushing or draining of the recycled system shall be done either at the approved use site and in a manner that does not create ponding or runoff conditions, (See Section [7.4.210712](#) “Ponding Conditions” for special considerations.) or to a sanitary sewer manhole, with the approval of the agency responsible for operation of the sanitary sewer. In no case shall the discharge of recycled water to a sanitary sewer cause the sewer to overflow or otherwise create a public health hazard or nuisance. Air gap protocol shall be applied.

The direct or indirect discharge from use areas of recycled water to surface waters, either perennial or ephemeral, including wetlands, vernal pools, etc. is prohibited, unless otherwise authorized by an NPDES Permit.

**§10717      Cross Connections**

Cross connections, permanent or temporary, resulting from the use of recycled water or from the physical presence of a recycled water service, whether by design, construction practice, or system operation, are strictly prohibited.

**§10718      Unprotected Drinking Fountains**

Any drinking fountain located within the approved use area designated by the Use Permit shall be protected, by siting and/or a structure, from contact with recycled water. Lack of such protection, whether by design, construction practice, or system operation, is strictly prohibited.



**§10719      Unprotected Public Facilities**

Facilities that may be used by the general public, or on-site personnel, including but not limited to eating areas, eating surfaces/benches, pools, spas, hardscape, and playground equipment/play areas, and located within the approved use area designated by the Use Permit, shall be protected by siting and/or a structure from contact with mist, runoff or recycled water. Lack of such protection is prohibited until review and concurrence by the District, DDW, and OCHCA on a case-by-case basis.

**§10720      Hose Bibs**

Installation of hose bibs on any on-site system that presently operates or is designed to operate with recycled water, regardless of the hose bib construction or identification, is strictly prohibited.

**§10721      Fire Hydrants**

Use or installation of fire hydrants on any site that presently operates or is designed to operate with recycled water, regardless of the fire hydrant construction or identification, requires prior written approval by the District.

**§10722      Hours of Operation**

Irrigation with recycled water is restricted to particular hours that vary for the following application areas:

- Turf areas and center street medians – between ~~10~~8:00 p.m. and 6:00 a.m.;
- Slopes and groundcover/shrub areas - any hour (if no potential for public contact);
- Golf courses – between ~~9~~8:00 p.m. and ~~5~~6:00 a.m.; and
- Golf courses – fill impoundments - between 5:00 a.m. and 6:00 p.m..

Potential public contact with recycled water shall take precedence over recycled watering schedules. Irrigation system runtimes shall be adjusted to minimize public contact with recycled water, on an individual lateral system basis. The District shall require specific run times and durations where there is a history of public contact. Consideration shall also be given to allow maximum drying time prior to subsequent public use.

**§10723      Water/Garden Hoses and Hose Appurtenances**

Water/garden hoses and hose appurtenances utilizing recycled water shall be clearly identified purple in color with heavy-duty brass fittings. Hoses shall be continuously

imprinted with “Caution; Recycled Water – Do Not Drink” and rated at 150 psi working pressure. Hoses shall only be used for recycled water use. Use of these hoses for potable water use is strictly prohibited.

#### **§10724      Domestic Wells**

The application of recycled water within fifty (50) feet of a domestic well, and impoundment of recycled water within one hundred (100) feet of a domestic well, unless approved by DDW, is prohibited.

#### **§10725      Recycled Water Impoundments**

All recycled water impoundments shall be adequately protected from erosion, washout, and flooding such that no discharge occurs unless the discharge is a result of a 25-year, 24-hour storm event or greater.

Any storage facility or impoundment containing recycled water for reuse applications shall be managed in a manner to control odors, nuisance conditions or vectors such as mosquitoes. Should such problems develop, a management plan shall be devised and implemented to monitor, correct, and control future occurrences.

#### **§10730      ON-SITE IRRIGATION SYSTEMS**

##### **§10731      Supervision**

On-site irrigation systems at each use area under the customer's control shall be under the management of the on-site supervisor designated by the customer or the operator and approved by the District.

On-site supervisors shall be responsible for the installation, operation, and maintenance of the irrigation system; enforcement of the Rules and Regulations; prevention of potential hazards and cross connections; and maintenance of the recycled water system plans in record drawing form, including location of any on-site potable water features and facilities. The on-site supervisor, in the event of a contamination to the public potable water supply, shall be responsible for immediate notification to the District.

The on-site supervisor shall also have the following responsibilities: to make sure all operations personnel are trained and familiarized with the use of recycled water; to furnish their operations personnel with maintenance instructions, controller charts, and record drawings to ensure proper operation in accordance with these Rules and Regulations; to notify the District of any and all updates or proposed changes, modifications, or additions to the on-site facilities; to operate and control the irrigation system to be in compliance with the on-site limitations and these Rules and Regulations; and apply the recycled water at a rate that does not exceed the infiltration rate of the soil.

The District may, from time to time, require that an “On-site Recycled Water Supervisor” obtain instruction in the use of recycled water, such instruction being provided by or approved by the District.

The on-site supervisor or his representative shall check all appurtenances on the on-site irrigation system to ensure proper operation, and perform a coverage test of the system at least annually. Owner shall keep records of the annual on-site testing (refer to the form in ~~the~~ Appendix 76) for District review. Records must be kept for a period of five years as a minimum.

The on-site supervisor or his representative shall be available during normal working hours at an address listed with the District for the purpose of hosting an inspection tour or for discussing operational aspects of the system. The on-site supervisor shall be able to effectively communicate with District personnel orally and in writing. The on-site supervisor or his representative shall be available via telephone at a number listed with the District for emergency off-hours contact. Where necessary, keys and/or lock combinations shall be issued to the District to provide access upon request.

#### **§10732      Operator Certification Submittal**

Once the customer has selected the operator for an on-site recycled water system, the certification of recycled water service operation must be initiated. District shall evaluate this submittal and advise the operator of the need for any additional information or action. Operators must attend a training session coordinated by the District prior to receiving operation certification or within 180 consecutive calendar days after certification, as training sessions are scheduled. If the customer selects a new operator during the course of service, a new Use Permit form shall be submitted by the new operator to the District, within thirty (30) days of any change. The District shall update all Use Permits to confirm information accuracy.

#### **§10733      Temporary Service Connection**

A temporary service connection may be provided for on-site construction testing purposes. The temporary service connection consists of the permanent service connections and meter plus any backflow prevention assemblies, if required. Temporary service connection is valid for only 90 consecutive calendar days.

#### **§10734      Service Startup**

Following final District inspection and certification of the project, the customer shall request in writing regular service startup. District shall begin regular service within five working days of approval of service startup.

#### **§10735      Confinement of Irrigation**

The customer shall be responsible for maintaining and controlling the system in order to minimize human contact, prevent consumption of recycled water, and to control and eliminate direct spray, overspray, ponding and runoff. The customer shall be responsible for any subsequent uses of the recycled water.

**§10736      Dye Testing/Pressure Testing**

In order to determine the existence of any cross connections or backflow conditions into the potable water system, a customer may perform a pressure test where the recycled system is isolated for a period of 24 hours or as directed by the District.

**§10737      Contamination**

In the event of contamination or pollution of a potable water system due to a cross connection or other failure, the District shall be immediately notified, so that appropriate measures will be taken to correct the problem. The On-site supervisor shall submit a written report explaining the contamination within five working days. The District will contact SARWQCB, DDW and OCHCA within 24 hours from customer notifications.

**§10738      Maintenance**

A preventive maintenance program designed to ensure the continued operation of all system elements within the requirements of these Rules and Regulations shall be evidenced by the customer and open to inspection by The District. Records must be kept on file for five years as a minimum. See Section 7.2.110731 ("Supervision") for reporting requirements. See Appendix 7-6 for onsite testing report form.

**§10739      On-site Notifications**

The following are guidelines for the recommended on-site notifications that recycled water is in use on the site.

Workers shall be notified that recycled water is in use. Notification shall include the posting of conspicuous identification signs with proper working of sufficient size to be clearly read. It is recommended that these recommended notifications be issued to all workers who come in contact with recycled water or equipment utilizing recycled water.

In those locations where English is not the primary language of the workers, the signs and information shall be in the appropriate language as well as English.

Workers should be informed of the potential health concerns involved with the ingestion of recycled water.

Precautionary measures should be taken to minimize worker contact with recycled water. Workers should not be subjected to direct recycled water sprays. Workers should be provided with protective clothing (rain gear/gloves) when there will be more than casual contact with recycled water.

Safe drinking water should be supplied for the workers. Where bottle water is provided, the water should be in contamination-proof containers, and be protected from recycled water and dust.

Potable hand-washing facilities should be provided, where appropriate. It is strongly recommended that before ingesting food or drink, and at the end of the work period, all workers wash with soap and water any parts of their body that may have come in contact with recycled water.

Precautions should be taken to avoid the contamination of food taken into the recycled water use areas. Food should not be taken into areas still wet with recycled water. Edible plants, fruits and vegetables are prohibited to be grown in recycled water use areas.

An adequate first aid kit should be available on-site. It is recommended that any worker who receives a cut, abrasion, or scratch receive proper medical attention after the accident to prevent possible infection or other complications.

#### **§10740      Recycled Water Application**

Application of recycled water to the Use Area shall be at a reasonable agronomic rate and shall consider soil, climate, and nutrient demand. Application rates shall ensure that a nuisance is not created. The seasonal nutritive loading of the Use Area including the nutritive value of organic and chemical fertilizers and of the recycled water, shall not exceed the nutritive demand of the landscape.

#### **§10750      CONSTRUCTION WATER FACILITIES**

##### **§10751      Supervision**

The operation and surveillance of the construction water facility at each use area under the customer's control shall be under the management of an on-site supervisor designated by the customer or the operator and approved by the District. On-site supervisors shall be responsible for the installation, operation, and maintenance of the on-site facility, equipment, enforcement of these Rules and Regulations, and prevention of cross connections and potential hazards. The on-site supervisor or his representative shall be available via telephone at numbers listed with the District for contact during working hours and after hours.

##### **§10752      Identifying Equipment**

All equipment and facilities using recycled water shall be identified per District regulations.

##### **§10753      Application Control**

Recycled water used for the purpose of soil compaction and dust control shall not be stored or applied in a manner that causes runoff, ponding, windblown overspray conditions, or discharge in any way onto unapproved areas. If such conditions occur, the method of application shall be altered to correct them and prevent any further ponding, runoff, or windblown spray onto unapproved areas. Control valves on the water distribution vehicles and other controlling devices shall be properly employed to prevent the application of recycled water outside the approved use area onto surfaces including, but not limited to, street pavements, sidewalks, and drainage courses.

#### **§10754      Maintenance**

A preventive maintenance program designed to ensure the continued operation of all system elements within the requirements of these Rules and Regulations shall be evidenced by the customer and open to inspection by the District.

#### **§10755      Reuse of Equipment**

Any equipment, such as tanks, water trucks, temporary piping or valves and portable pumps that have been used with recycled water shall be drained, cleaned and disinfected before removal from the approved use area to another job site. This disinfection and cleaning shall ensure the protection of the public health in the event of any reuse of such equipment with higher quality water.

Methods of disinfection shall be approved by the District or the appropriate regulatory agency, and the disinfection process shall be performed in the District's presence. When storage tanks or distribution vehicle tanks are provided with an inlet air gap whose configuration is approved by the DDW and OCHCA, such on-site disinfection shall not be required.

#### **§10760      ROUTINE FOLLOW-UP TESTING AND INSPECTION**

Systems constructed to immediately begin using recycled water or systems constructed for recycled water use, but will be using potable water in the interim as recycled water becomes available in the area, are required to successfully pass cross-connection testing in order to continue recycled water service. A final report will be issued when these testing and other District requirements are met. No potable water other than for testing and no buildings or facilities using potable water, shall be utilized or occupied until all cross-connection testing and final inspection requirements have been performed and passed.

Any use site receiving recycled water and potable water shall be required to successfully pass routine follow-up inspection cross-connection testing in order to continue to receive potable and recycled water service.

For sites adjacent to recycled water use sites, cross-connection testing and site inspections may be required on a case-by-case basis, to ensure the protection of the public water supply and public health.

#### **§10761      Schedule**

The District will inspect at least annually and test at least every four years; each site utilizing recycled water and potable water for compliance with District, State, and County regulations regarding use of recycled water on-site. Sites with public exposure will be tested more frequently.

As stated in Section ~~3.9~~10345 ("Backflow Prevention") and Section ~~5.5~~10560 ("Protective Measures) of these Rules and Regulations, the District may waive, with approval from DDW, the requirement of constructing a backflow protection device at each single family residence within specific homeowner association sites. In lieu of the backflow protection, the District will perform recycled water irrigation system cross-connection shutdown testing (including pressure test) and potable water cross-connection shutdown testing annually at each single family residence without a backflow protection device.

The typical duration of the cross-connection shutdown testing is as follows:

- Recycled Water Irrigation System: 48 hours, including pressure test;
- Potable Water Used for Irrigation Systems: 2 hours;
- Potable Water System for Domestic Purposes: 1 hour; (positive pressure check if approved by DDW and/or OCHCA)
- Potable Water Fire Protection: Pressure Gauge Check

Any site that exceeds the inspection and testing schedule established by the District by sixty (60) consecutive calendar days will be subject to recycled water service termination if the delay is a result of lack of cooperation or coordination of the owner or their representatives.

Any recycled water site where recycled water service has been discontinued for a period of thirty (30) consecutive calendar days, or has exceeded the previous inspection and testing schedule established by the District, will be required to perform an inspection and cross connection testing prior to and in conjunction with regular service start-up. No recycled water shall be utilized onsite without the testing being performed.

#### **§10762      Procedures**

Section ~~6.7~~10680 ("On-site Testing") and Section ~~6.8~~10690 ("Cross-Connection Testing") of these Rules and Regulations are non-inclusive lists of standard inspection procedures. The District reserves the right to add to or alter testing procedures as necessary. Testing will review all on-site point of connections to verify proper identification and proper backflow protection with current test report as required by the District, DDW and OCHCA.

#### **§10770      RECYCLED WATER IRRIGATION SYSTEM MAINTENANCE REPORT**

The on-site supervisor or his representative, using the form ~~within the Appendices~~contained in Appendix 6, shall assess the on-site irrigation system at least annually to ensure full compliance to all current Rules and Regulations regarding the use of recycled water. The on-site supervisor or his representative of the use site shall maintain records for the annually assessment during the routine inspection and testing by the District and keep them on file for District review upon request. If the forms are not available for District review upon request, the District may terminate the recycled water service and reconnection fees will apply to restore recycled water service.

## **§10800      VIOLATIONS AND ENFORCEMENT**

### **§10810      DETERMINATION**

The District reserves the right to determine whether a violation of the Rules and Regulations has resulted from any action and/or occurrence that are the responsibility of the customer. Insofar as violation of the Rules and Regulations constitutes violation of any regulatory agency requirement, the District makes its determination on behalf of the concerned agency(s). However, this determination and any consequential penalties levied by the District do not derogate the opportunities available to the affected regulatory agency(s) to levy their own penalties.

### **§10820      VIOLATIONS**

Violations shall include those actions and/or occurrences that directly cause noncompliance with any one of the specific operational limitations as listed in the Rules and Regulations, such as runoff conditions, ponding conditions, direct and windblown overspray conditions, unapproved uses, disposal in unapproved areas, cross connections, unprotected drinking fountains, unprotected public facilities, hose bibs, fire hydrants, and hours of operation. However, by definition, noncompliance with any condition or conditions of the Rules and Regulations or Use Permit, whether willfully or by accident, shall constitute a violation. Pursuant to Section 35424 of the California Water Code, any violation of the Rules and Regulations is a misdemeanor. Customer reporting requirements in the event of a violation are outlined in Section ~~4.5~~10450 (Reporting) of these Rules and Regulations.

### **§10830      CORRECTIVE ACTION**

Any person, firm, corporation, association, or agency found to be violating any provision of the Rules and Regulations or the terms and conditions of the Use Permit, or applicable State or local statutes, regulations, ordinances, or other requirements shall be served by the District with written notice stating the nature of the violation and providing a reasonable time limit for the satisfactory correction thereof. The offender shall, within the period of time stated in such notice, permanently cease all violations. This provision is in addition to and not by way of derogation of any other remedies or procedures available to the District by law, regulation, or pursuant to any of the provisions of the Rules and Regulations.

### **§10840      PENALTIES PRIOR TO ISSUANCE OF THE USE PERMIT**



**§10841      Existing Potable Water Service Being Converted to Recycled Water Use**

If after one hundred and eighty (180) consecutive calendar days from the date of the District's final determination notice, the prospective customer has not completed required onsite retrofit construction work, then, in addition to any other penalties set forth in the Rules and Regulations, the customer's irrigation consumption will be billed at the District's Tier III (Inefficient) rate for potable water. If imposed, this rate will persist until remedy is achieved by the customer to the District's satisfaction.

**§10842      Recycled Water Service Temporarily Using Potable Water**

Where recycled water is available in offsite facilities, and where temporary use of potable water has been approved by the District for a recycled water service, if after thirty (30) consecutive calendar days from the date of the District's corrective action notice, the prospective customer has not completed required onsite facility corrective actions and achieved compliance, then, in addition to any other penalties set forth in the Rules and Regulations, the customer's irrigation consumption will be billed at the District's Tier III (Inefficient) rate for potable water. Said rate will be imposed on the service requiring compliance, and will persist until remedy is achieved by the customer to the District's satisfaction.

**§10843      Penalty For Lack Of Inspection During Installation**

Any work not inspected by the District shall be required to be exposed for District inspection by the District inspector, at the owner's expense. Failure to comply with this requirement will result in termination of potable and/or recycled water. (Reconnection fees shall apply.) Service shall only be restored when, in the opinion of the District, the inspection requirements have been met.

**§10850      PENALTIES AFTER ISSUANCE OF THE USE PERMIT**

Failure to permanently cease all violations within the time stated shall result in revocation of the Use Permit by the District and termination of water, sewer, and/or recycled water service. Violations regarding any one service may result, at the sole discretion of the Board or General Manager, in termination of any combination of or all water, sewer, and recycled water service in the following manner.

**§10851      Interim Revocation**

In cases where the serious nature of the violations described above require immediate action, the Board or General Manager may, in the sole discretion of the Board or General Manager, immediately revoke a Use Permit on an interim basis and thereupon cease water, sewer, and/or recycled water service, subject to a timely decision on permanent revocation of the Use Permit pursuant to a public hearing as provided herein. In cases of

sewer service termination, there shall be no discharge of any type by an applicant, owner, or customer into the District's sewer facilities.

#### **§10852      Permanent Revocation**

Permanent revocation of a Use Permit shall occur only subsequent to a public hearing held in the manner hereinafter provided. The applicant, owner, or customer shall be given written notice ten (10) consecutive calendar days prior to a hearing on the possible permanent revocation of any Use Permit by the District. The notice shall specify the grounds of the proposed revocation of any such Use Permit in reasonable detail. It may but need not describe suggestive corrective action acceptable to the District. Notice may be delivered personally to the applicant, owner, or customer or it may be given by depositing such in the United States mail with postage prepaid, addressed to the applicant, owner, or customer either at the current address of record.

Any such action to permanently revoke a Use Permit shall be effective ten (10) consecutive calendar days after notice of the Board's decision and shall be either personally delivered to the applicant, owner, or customer or placed in the United States mail, postage prepaid, addressed to the applicant, owner, or customer in the manner hereinabove specified.

In the alternative to such action, the District may establish a 50% surcharge on the continuation of water, sewer, and/or recycled water service by the District until such time as the applicant, owner, or customer has taken action to comply with all of the hereinabove described requirements for obtaining service from the District in its reasonable discretion. The foregoing provisions of the Rules and Regulations are a requirement of any Use Permit, and any application for recycled water service therefore shall be subject to such provisions. The Board, if it deems such to be in the best interest of the District, may on an interim basis or otherwise waive or modify any of the foregoing.

#### **§10860      APPEAL**

The customer may appeal the determination of the District to the Board. Such appeal must be presented in writing to the General Manager for presentation to the Board at one of its regular meetings. The appeal shall state the conditions that have been determined to be a violation and the customer's opinion to the contrary. The action of the Board shall be final.

#### **§10870      SERVICE RECONNECTION**

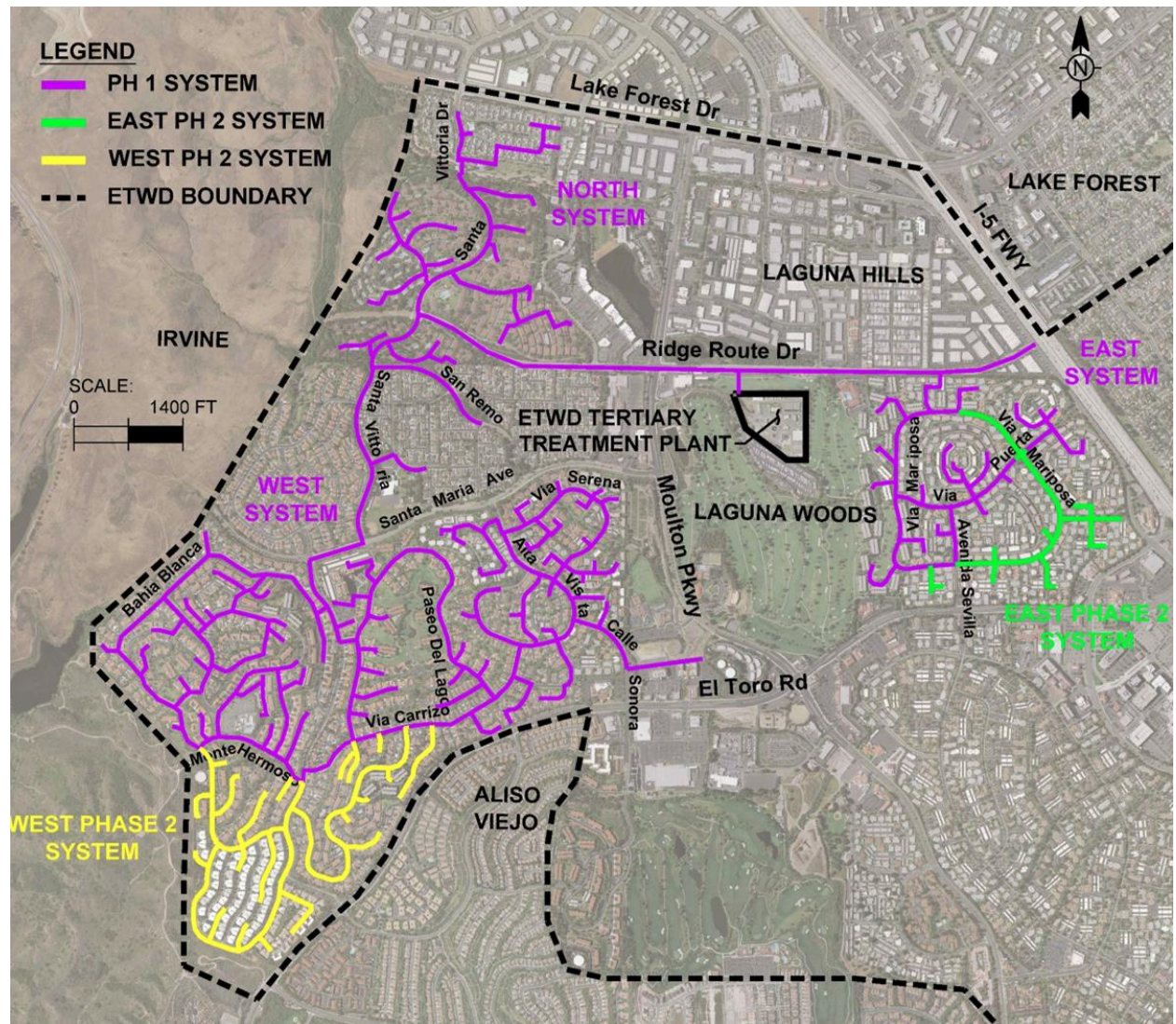
Any request to reestablish service subsequent to the revocation of a permit and the termination of water, sewer, and/or recycled water service shall be in the manner prescribed for initially obtaining service from the District, which may include the collection of a security deposit. However, in addition, the District may, in its discretion, require that an agreement including any special conditions and financial security

conditioned upon compliance with the District's Rules and Rules and Regulations be provided in an amount, manner, and for a period of time as determined by the Board.

~~§10900~~ ~~APPENDICES~~

**§10900**

**EXHIBITS**



## EXHIBIT 1

### EL TORO WATER DISTRICT RECYCLED WATER DISTRIBUTION SYSTEM

**§10950**

**APPENDICES**

**APPENDIX 1**  
**“SAMPLE”**  
**PRELIMINARY DETERMINATION NOTICE**

Date

Address

Regarding: Notice of Preliminary Determination for Recycled Water Use

Dear Customer:

The El Toro Water District has constructed a recycled water distribution system to reuse highly treated wastewater for irrigation purposes. This system has grown to include capacity in our water reclamation plant, a storage reservoir, pump station, and approximately 20 miles of distribution piping in the west side of the District. The system reduces the need to import a limited and valuable resource, potable water. Recycled water customers receive a 20 percent discount on our irrigation water rate and a reliable water source during drought times.

The District's goal is to serve as many sites that are economically reasonable within the vicinity of the existing recycled water distribution system. These sites can include golf courses, parks, school campuses, homeowner association greenbelts, arterial slopes, street medians, and highway landscaping. To reach this goal, the District will need to convert existing sites from potable water to recycled water use. The District has identified the following site(s) owned by you that are candidates for conversion:

| ID # | ACCOUNT | METER # | METER LOCATION |
|------|---------|---------|----------------|
|      |         |         |                |
|      |         |         |                |
|      |         |         |                |
|      |         |         |                |

In the near future, as the District prepares to construct facilities that will convey recycled water to your site(s), a Notice of Final Determination will be sent to you. From that date, you will have 180 days to complete your site construction work and be prepared to receive recycled water supply.

District employees are available to perform an on-site walk-through and provide a punch list for on-site mitigation to be performed by the owner to meet minimum conversion requirements. Typical conversion mitigation includes the following retrofit work: removing the backflow device and potable water meter; providing identification of recycled water use by branding valve boxes, tagging valves, and tagging perimeter sprinkler heads; changing quick couplers; and checking for overspray and cross-connections with the potable water system.

The District is offering a loan at 6 percent interest, up to a maximum to \$2,500 per irrigated acre, for on-site retrofit costs. Loans are repaid by a \$0.25 per billing unit (bu) surcharge on the recycled water rate. The surcharge is nearly equal to the difference between the potable water irrigation rates (\$1.20 and \$1.30 per bu) and the recycled water rates (\$0.96 and \$1.04 per bu). Therefore, your landscape irrigation bills during the loan period will remain approximately the same as your current bills. After the loan is repaid, you will be saving about 20 percent on your irrigation bill.

Owners of sites not converted within the above-noted 180-day time period could be subject to a 50 percent surcharge on their potable water irrigation rates for the sites, as stipulated in the District's Mandatory Use Resolution, adopted by the District's Board of Directors on \_\_\_\_\_. You may file a Notice of Objection with the District within 30 days by submitting a written request for reconsideration of the determination, modification of the proposed conditions, or adjustment of the conversion schedule.

Your support and cooperation during the conversion process is greatly appreciated. With your help, the District's recycled water system will be a success. Please contact \_\_\_\_\_, Recycled Water Coordinator, at (949) \_\_\_\_\_, for any additional information about the conversion process and loan, and to obtain a conversion schedule for your future sites.

Sincerely,

EL TORO WATER DISTRICT  
Hannah Ford, P.E.  
Director of Engineering



**APPENDIX 2**  
**“SAMPLE”**  
**FINAL DETERMINATION NOTICE**

Date

Address

Regarding: Notice of Final Determination for Recycled Water Use

Dear Customer:

The El Toro Water District has constructed a recycled water distribution system to reuse highly treated wastewater for irrigation purposes. A Notice of Preliminary Determination was submitted to you some months ago, whereby you were notified that one or more of your irrigation sites were candidates for conversion from potable water to recycled water use. Construction is now proceeding on District facilities that will convey recycled water to your site(s).

Accordingly, the District has identified the following site(s) owned by you that need to be converted to recycled water use within the next 180 days:

| ID # | ACCOUNT | METER # | METER LOCATION |
|------|---------|---------|----------------|
|      |         |         |                |
|      |         |         |                |
|      |         |         |                |
|      |         |         |                |

More of your sites may need to be converted to use recycled water in the future. You have the option of converting both the future sites and the sites listed in the table now, or you may wait until you receive notice for the future sites.

District employees will be performing inspections at various stages of the on-site retrofit work associated with your conversion mitigation. You will be contacted in the next several weeks to initiate this process.

The District is offering a loan at 6 percent interest, up to a maximum to \$2,500 per irrigated acre, for on-site retrofit costs. Loans are repaid by a \$0.25 per billing unit (bu) surcharge on the recycled water rate. The surcharge is nearly equal to the difference between the potable water irrigation rates (\$1.20 and \$1.30 per bu) and the recycled water rates (\$0.96 and \$1.04 per bu). Therefore, your landscape irrigation bills during the loan period will remain approximately the same as your current bills. After the loan is repaid, you will be saving about 20 percent on your irrigation bill.

Owners of sites not converted within the above-noted 180-day time period could be subject to a 50 percent surcharge on their potable water irrigation rates for the sites, as stipulated in the District's Mandatory Use Resolution, adopted by the District's Board of Directors on \_\_\_\_\_. Your opportunity to file a Notice of Objection with the District expired 30 days after the District's submittal of its Notice of Preliminary Determination, now past.

Your support and cooperation during the conversion process is greatly appreciated. With your help, the District's recycled water system will be a success. Please contact \_\_\_\_\_, Recycled Water Coordinator, at (949) \_\_\_\_\_, for any additional information about the conversion process and loan, and to obtain a conversion schedule for your future sites.

Sincerely,

EL TORO WATER DISTRICT  
Hannah Ford, P.E.  
Director of Engineering

**APPENDIX 3**  
**CHECKLIST / ACTION REQUEST FORM**  
**FOR OBTAINING RECYCLED WATER SERVICE**

Owner/Customer: \_\_\_\_\_ Use Site #: \_\_\_\_\_ Account #: \_\_\_\_\_

Project Name: \_\_\_\_\_ Tract No. \_\_\_\_\_ Lot No. \_\_\_\_\_

Date: \_\_\_\_\_ Specific Action Requested: \_\_\_\_\_

Location/Cross Streets \_\_\_\_\_ New Construction \_\_\_\_ Retrofit \_\_\_\_ Conversion \_\_\_\_

Completed

- \_\_\_\_\_ 1. Applicant submits a preliminary package and plan to the District.
- \_\_\_\_\_ 2. District reviews for approval the preliminary package and plan.
- \_\_\_\_\_ 3. Preliminary approval granted, customer proceeds with project, plan, and Use Permit submittals.
- \_\_\_\_\_ 4. District reviews plans.
- \_\_\_\_\_ 5. The applicant submits to the District: completed irrigation plans for construction or retrofit; work schedule for construction or conversion; and required fees.
- \_\_\_\_\_ 6. District approves and signs plans, Complete Application (Appendix 5).
- \_\_\_\_\_ 7. District requests DDW and OCHCA approval. (As necessary)
- \_\_\_\_\_ 8. DDW and OCHCA approval granted. (As necessary)
- \_\_\_\_\_ 9. Applicant/owner has operator (installation contractor/maintenance contractor) complete operation certification (Use Permit) and submits form to District (Appendix 6).
- \_\_\_\_\_ 10. Onsite pre-construction meeting date (applicant begins construction/retrofit of onsite facilities.)
- \_\_\_\_\_ 11. The District issues recycled water Use Permit. (Copies issued to owner and onsite supervisor.)
- \_\_\_\_\_ 12. Potable water backflow prevention devices installed and tested (if applicable prior to recycled water service activation).
- \_\_\_\_\_ 13. Applicant submits redline construction set of record drawings to the District for review.
- \_\_\_\_\_ 14. Applicant has a final set of record drawings prepared/submits all required documents to District.
- \_\_\_\_\_ 15. Applicant requests final inspection by the District.
- \_\_\_\_\_ 16. District performs final inspection, operational testing, and cross-connection testing.
- \_\_\_\_\_ 17. Recycled water meter is installed.
- \_\_\_\_\_ 18. District grants final approval for recycled water service; District completes User Permit.

**HOW TO USE THIS FORM:** This form can be used by the applicant, District, DDW, and OCHCA to request specific action or items needed to complete the process for obtaining recycled water service. Complete each step in the sequence shown. Make sure the form is dated and initials included as each item is completed. This checklist keeps all entities informed of the application process and the steps remaining to provide recycled water service.

**APPENDIX 4**  
**EL TORO WATER DISTRICT**  
**RECYCLED WATER SERVICE APPLICATION**  
**(Please type)**

OWNER/CUSTOMER NAME: \_\_\_\_\_

ADDRESS: \_\_\_\_\_

\_\_\_\_\_

CONTACT PERSON: \_\_\_\_\_ TITLE: \_\_\_\_\_

TELEPHONE: \_\_\_\_\_ FAX: \_\_\_\_\_ E-MAIL: \_\_\_\_\_

PROJECT/USE SITE NAME: \_\_\_\_\_

PROJECT/USE SITE ADDRESS OR LOCATION: \_\_\_\_\_

\_\_\_\_\_

TRACT NO \_\_\_\_\_ PARCEL/LOT NO. \_\_\_\_\_

NEAREST ARTERIAL STREET NAMES: \_\_\_\_\_

LANDSCAPE ARCHITECT/ENGINEER NAME: \_\_\_\_\_

ADDRESS: \_\_\_\_\_

\_\_\_\_\_

CONTACT PERSON: \_\_\_\_\_ TITLE: \_\_\_\_\_

TELEPHONE: \_\_\_\_\_ FAX: \_\_\_\_\_ E-MAIL: \_\_\_\_\_

THIS WILL BE A: ☐ NEW SYSTEM ☐ CONVERTED SYSTEM ☐ RETROFITTED SYSTEM

TYPE OF USE (CHECK ONE):

- |                                                   |                                                 |                                           |
|---------------------------------------------------|-------------------------------------------------|-------------------------------------------|
| <input type="checkbox"/> NURSERY/SOD CROPS        | <input type="checkbox"/> LANDSCAPE-MISC         | <input type="checkbox"/> PLAYGROUND/PARKS |
| <input type="checkbox"/> COMMERCIAL               | <input type="checkbox"/> CEMETERIES             | <input type="checkbox"/> SCHOOL YARDS     |
| <input type="checkbox"/> GROUNDWATER RECHARGE     | <input type="checkbox"/> FREEWAY/HIGHWAY        | <input type="checkbox"/> ONSITE PLANT USE |
| <input type="checkbox"/> INDUSTRIAL-MISCELLANEOUS | <input type="checkbox"/> GOLF COURSES           | <input type="checkbox"/> RECREATION       |
| <input type="checkbox"/> INDUSTRIAL-COOLING WATER | <input type="checkbox"/> SLOPES, GREEN BELTS    | <input type="checkbox"/> WILD HABITAT     |
| <input type="checkbox"/> CONSTRUCTION             | <input type="checkbox"/> IMPOUNDMENTS/FOUNTAINS |                                           |
| <input type="checkbox"/> OTHER: _____             |                                                 |                                           |

SPECIAL CONDITIONS: \_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

Please include the following items on all plans:

- Potable/recycled water mainline and valve locations
- All on-site potable, fire, and recycled water lines
- Specific recycled water use areas
- Specific non-potable water use areas
- Location of all water features
- Location of drinking fountains and restrooms
- Show hardscape (walls, fencing, drainage devices)
- Show all play areas and equipment, ball field layouts and courts
- Designate all exterior eating areas, including tables, benches and barbeques
- Locations and descriptions of all backflow prevention devices
- Location and size of all service connections and meters, including fire protection
- Show all fire hydrants and all fire protection facilities
- Specifically state on the plans **if** there is no potable water on the site
- All sewer facilities
- Buildings
- Equipment Legends
- Location of all wells
- Location of all streams/water bodies
- District signature block
- District Standard Detail Drawings

Please also include a site location and vicinity maps.

I, the applicant have read and understand the District Rules and Regulations for Recycled Water and agree to restrict recycled water use for the purposes described in this application. I agree to use recycled water in accordance with the Regulations and all other applicable documents. I understand that recycled water may not be compatible with certain types of vegetation because of its composition. I agree that the District will not be liable for damages that may occur to vegetation or for damages that may occur due to uses of recycled water. I hereby acknowledge and consent to the District's use at its option of recycled water in lieu of potable water for the purposes herein mentioned in accordance with the Rules and Regulations for Recycled Water and in conformance with the State Water Resources Control Board General Permit Order No. 2009-0006-DWQ.

Applicant's Name: \_\_\_\_\_ Title: \_\_\_\_\_

Applicant's Signature: \_\_\_\_\_ Date: \_\_\_\_\_

**APPENDIX 5**  
**EL TORO WATER DISTRICT**  
**RECYCLED WATER USER PERMIT**  
**(Please type)**

USE SITE NUMBER: \_\_\_\_\_ ACCOUNT NO: \_\_\_\_\_ METER NO: \_\_\_\_\_  
(Completed by District)

USE SITE NAME: \_\_\_\_\_

USE SITE ADDRESS OR LOCATION: \_\_\_\_\_

NEAREST ARTERIAL STREET NAMES: \_\_\_\_\_

OWNER/CUSTOMER NAME: \_\_\_\_\_

ADDRESS: \_\_\_\_\_

CONTACT PERSON: \_\_\_\_\_ TITLE: \_\_\_\_\_

TELEPHONE NO: \_\_\_\_\_ FAX NO: \_\_\_\_\_ E-MAIL: \_\_\_\_\_

PROPERTY MANAGEMENT COMPANY: \_\_\_\_\_

ADDRESS: \_\_\_\_\_

CONTACT PERSON: \_\_\_\_\_ TITLE: \_\_\_\_\_

TELEPHONE NO: \_\_\_\_\_ FAX NO: \_\_\_\_\_ E-MAIL: \_\_\_\_\_

SPECIAL CONDITIONS: \_\_\_\_\_

Under penalty of perjury, I, the owner/customer swear that I have read and understand the District Rules and Regulations for Recycled Water and agree to restrict recycled water use for the purposes described in this permit. I agree to use recycled water in accordance with the Regulations and all other applicable documents. I understand that recycled water may not be compatible with certain types of vegetation because of its composition. I agree that the District will not be liable for damages that may occur to vegetation or for damages that may occur due to uses of recycled water. I hereby acknowledge and consent to the District's use at its option of recycled water in lieu of potable water for the purposes herein mentioned in accordance with the Rules and Regulations for Recycled Water and in conformance with the State Water Resources Control Board General Permit Order No. 2009-0006-DWQ.

Owner/Customer's Signature: \_\_\_\_\_ Date: \_\_\_\_\_

MAINTENANCE COMPANY NAME: \_\_\_\_\_

ADDRESS: \_\_\_\_\_

ONSITE SUPERVISOR'S NAME: \_\_\_\_\_ TITLE: \_\_\_\_\_

TELEPHONE NO: \_\_\_\_\_ FAX NO \_\_\_\_\_ E-MAIL: \_\_\_\_\_

AFTER HOURS TELEPHONE NO \_\_\_\_\_

I have reviewed the District's Rules and Regulations for Recycled Water and certify that the operation and documentation of this recycled water system and other on-site water systems will be in accordance with all applicable requirements contained therein, including certification of the on-site supervisor, who is directly responsible for the education and training of all employees under his control and of any individuals performing work at a use site under his control.

Onsite Supervisor's Signature: \_\_\_\_\_ Date: \_\_\_\_\_

DISTRICT USE ONLY

I certify the recycled water system described above and the certification of the on-site supervisor who's name is shown above is in accordance with all applicable requirements contained in the District's Rules and Regulations for Recycled Water.

Name: \_\_\_\_\_ Title: \_\_\_\_\_

Signature: \_\_\_\_\_ Date: \_\_\_\_\_

COPY OF USE PERMIT ISSUED TO OWNER/RESPONSIBLE  
PARTY, ON-SITE SUPERVISOR

| <b>OWNER/RESPONSIBLE PARTY</b>     | <b>ON-SITE SUPERVISOR</b>          |
|------------------------------------|------------------------------------|
| DATE:                              | DATE:                              |
| BY: <input type="checkbox"/> MAIL  | BY: <input type="checkbox"/> MAIL  |
| <input type="checkbox"/> FAX       | <input type="checkbox"/> FAX       |
| <input type="checkbox"/> E-MAIL    | <input type="checkbox"/> E-MAIL    |
| <input type="checkbox"/> IN PERSON | <input type="checkbox"/> IN PERSON |





# ~~EL TORO WATER DISTRICT~~

## ~~Rules and Regulations for Recycled Water~~

ETWD Representative: \_\_\_\_\_

Notes:

H.O A. Representative (If Present):

### Site Description and Notes (continued)

[illegible]

|                                                                                       |  |                                                                                                           |  |
|---------------------------------------------------------------------------------------|--|-----------------------------------------------------------------------------------------------------------|--|
| <u>Owner/Dueño:</u>                                                                   |  | <u>Phone /Teléfono #:</u>                                                                                 |  |
| <u>Address/Domicilio:</u>                                                             |  | <u>Fax #:</u>                                                                                             |  |
| <u>Date of Test</u><br><u>Fecha de Prueba</u>                                         |  | <u>Time of Test</u><br><u>Hora de Prueba</u> _____ <u>From/De:</u> _____<br>_____ <u>To/A:</u> _____      |  |
| <u>Association/Asociacion:</u>                                                        |  | <u>Phone /Teléfono #:</u>                                                                                 |  |
| <u>Address/Domicilio:</u>                                                             |  | <u>Fax #:</u>                                                                                             |  |
| <u>Account ### de Cuenta:</u>                                                         |  | <u>Use Site #/Numero de Sito:</u>                                                                         |  |
| <u>Identificación:</u>                                                                |  | <u>Identification Letter/Letra de</u>                                                                     |  |
| <u>Maintenance Contractor/Contratista de Mantenimiento:</u>                           |  | <u>Phone /Teléfono #:</u>                                                                                 |  |
| <u>Onsite Supervisor/Supervisor del Lugar:</u>                                        |  | <u>Fax #:</u>                                                                                             |  |
| <u>Address/Domicilio:</u>                                                             |  |                                                                                                           |  |
| <u>Site Location/Direccion del Sitio o Lugar:</u>                                     |  |                                                                                                           |  |
| <u>Two Major Cross Streets/Calles Principales Que Pasen Cerca:</u>                    |  |                                                                                                           |  |
| <u>1. _____ Controller Operational</u><br><u>_____ Reloj Trabajando</u>               |  | <u>12. _____ Moisture Sensors Operational</u><br><u>_____ Sensor de Humedad Trabajando</u>                |  |
| <u>2. _____ Hours of Operation</u><br><u>_____ Horas de operación</u>                 |  | <u>13. _____ RW Identification Tags Attached</u><br><u>_____ Etiquetas de advertencia de RW</u>           |  |
| <u>3. _____ Strainer Operational</u><br><u>_____ Coladera Trabajando</u>              |  | <u>14. _____ All Valve Box Lids Branded</u><br><u>_____ Tapaderas de cajas marcadas</u>                   |  |
| <u>4. _____ Master Valve Operational</u><br><u>_____ Válvula Maestra Trabajando</u>   |  | <u>15. _____ All Valve Box Lids Bolted Down</u><br><u>_____ Tapaderas de cajas atornilladas</u>           |  |
| <u>5. _____ Flow Sensor Operational</u><br><u>_____ Sensor de Coriente Trabajando</u> |  | <u>16. _____ RW Identification Sign On Site</u><br><u>_____ Anuncios de Advertencia de RW en el Lugar</u> |  |
| <u>6. _____ Booster Pump Operational</u><br><u>_____ Bomba Auxiliar Trabajando</u>    |  | <u>17. _____ Backflows Operational</u><br><u>_____ Backflows Trabajando</u>                               |  |

**EL TORO WATER DISTRICT**  
Rules and Regulations for Recycled Water

|                                                                                                       |                                                                                             |
|-------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------|
| <u>7. Pressure Regulator Operational</u><br><u>Regulador de Presión Trabajando</u>                    | <u>18. Drinking Fountains Protected</u><br><u>Fuentes de agua protegidas</u>                |
| <u>8. PSI Static/Dynamic</u>                                                                          | <u>19. Potable Identification Tags Attached</u><br><u>Etiquetas de agua potable puestas</u> |
| <u>9. Fertilizer Injector Operational</u><br><u>Injector de Fertilizante Trabajando</u>               | <u>20. Any Cross Connections</u><br><u>Alguna conexión cruzada</u>                          |
| <u>10. Quick Coupling Valve Operational</u><br><u>Quik Cupling ttapaderas trabajando</u>              | <u>21. Approximate Temperature</u><br><u>Temperatura aproximada</u>                         |
| <u>11. QC Identification Tags Attached</u><br><u>Etiquetas de advertencia pegadas a los QC</u>        | <u>22. Approximate Wind Speed</u><br><u>Velocidad del viento aproximado</u>                 |
| <u>Repairs or Adjustments Performed/Reparaciones o Ajustes Hechos:</u>                                |                                                                                             |
|                                                                                                       |                                                                                             |
|                                                                                                       |                                                                                             |
| <u>Print name of person performing test</u><br><u>Nombre impreso de la persona que hizo la prueba</u> |                                                                                             |
| <u>Signature of person performing test</u><br><u>Firma de la persona que hizo la prueba</u>           |                                                                                             |

**APPENDIX 7 (Continued)**

**EL TORO WATER DISTRICT**

**RECYCLED WATER TESTING FORM / AGUA RECICLADA**

**Coverage Test / Prueba de Cubrimiento**

Controller Identification Letter/Letra de Identificación del Reloj: \_\_\_\_\_

Place a YES or NO in each box as needed/Ponga SI or NO en la cada cuadro según sea necesario

| <u>Control Valve</u>      | <u>Overspray</u>    | <u>Corrected</u> | <u>Run-Off</u>            | <u>Corrected</u> | <u>Ponding</u>        | <u>Corrected</u> | <u>Check Valves at Base of Heads</u> | <u>(Anti Drain Valves) Operational</u> | <u>Minutes of Run Time</u> | <u>Cycles Per Day</u>               |
|---------------------------|---------------------|------------------|---------------------------|------------------|-----------------------|------------------|--------------------------------------|----------------------------------------|----------------------------|-------------------------------------|
| <u>Válvula de Control</u> | <u>Cubra de mas</u> | <u>Corregida</u> | <u>Se tira Mucha Agua</u> | <u>Corregida</u> | <u>Agua Estancada</u> | <u>Corregida</u> |                                      |                                        | <u>Minutos Que Riega</u>   | <u>Tiempos Que Prende en un Día</u> |
| <u>1</u>                  |                     |                  |                           |                  |                       |                  |                                      |                                        |                            |                                     |
| <u>2</u>                  |                     |                  |                           |                  |                       |                  |                                      |                                        |                            |                                     |
| <u>3</u>                  |                     |                  |                           |                  |                       |                  |                                      |                                        |                            |                                     |
| <u>4</u>                  |                     |                  |                           |                  |                       |                  |                                      |                                        |                            |                                     |
| <u>5</u>                  |                     |                  |                           |                  |                       |                  |                                      |                                        |                            |                                     |
| <u>6</u>                  |                     |                  |                           |                  |                       |                  |                                      |                                        |                            |                                     |
| <u>7</u>                  |                     |                  |                           |                  |                       |                  |                                      |                                        |                            |                                     |
| <u>8</u>                  |                     |                  |                           |                  |                       |                  |                                      |                                        |                            |                                     |
| <u>9</u>                  |                     |                  |                           |                  |                       |                  |                                      |                                        |                            |                                     |
| <u>10</u>                 |                     |                  |                           |                  |                       |                  |                                      |                                        |                            |                                     |
| <u>11</u>                 |                     |                  |                           |                  |                       |                  |                                      |                                        |                            |                                     |
| <u>12</u>                 |                     |                  |                           |                  |                       |                  |                                      |                                        |                            |                                     |
| <u>13</u>                 |                     |                  |                           |                  |                       |                  |                                      |                                        |                            |                                     |
| <u>14</u>                 |                     |                  |                           |                  |                       |                  |                                      |                                        |                            |                                     |

EL TORO WATER DISTRICT  
Rules and Regulations for Recycled Water

|                    |  |  |  |  |  |  |  |  |  |  |
|--------------------|--|--|--|--|--|--|--|--|--|--|
| <a href="#">15</a> |  |  |  |  |  |  |  |  |  |  |
| <a href="#">16</a> |  |  |  |  |  |  |  |  |  |  |
| <a href="#">17</a> |  |  |  |  |  |  |  |  |  |  |
| <a href="#">18</a> |  |  |  |  |  |  |  |  |  |  |
| <a href="#">19</a> |  |  |  |  |  |  |  |  |  |  |
| <a href="#">20</a> |  |  |  |  |  |  |  |  |  |  |
| <a href="#">21</a> |  |  |  |  |  |  |  |  |  |  |
| <a href="#">22</a> |  |  |  |  |  |  |  |  |  |  |
| <a href="#">23</a> |  |  |  |  |  |  |  |  |  |  |
| <a href="#">24</a> |  |  |  |  |  |  |  |  |  |  |
| <a href="#">25</a> |  |  |  |  |  |  |  |  |  |  |
| <a href="#">26</a> |  |  |  |  |  |  |  |  |  |  |
| <a href="#">27</a> |  |  |  |  |  |  |  |  |  |  |
| <a href="#">28</a> |  |  |  |  |  |  |  |  |  |  |
| <a href="#">29</a> |  |  |  |  |  |  |  |  |  |  |
| <a href="#">30</a> |  |  |  |  |  |  |  |  |  |  |

**APPENDIX 7**  
**EL TORO WATER DISTRICT**  
**RECYCLED WATER SPILL REPORT**  
**(Please type)**

USE SITE NUMBER: \_\_\_\_\_ ACCOUNT NO: \_\_\_\_\_ METER NO: \_\_\_\_\_  
(Completed by District)

USE SITE NAME: \_\_\_\_\_

USE SITE ADDRESS OR LOCATION: \_\_\_\_\_

OWNER/CUSTOMER NAME: \_\_\_\_\_

ADDRESS: \_\_\_\_\_

CONTACT PERSON: \_\_\_\_\_ TITLE: \_\_\_\_\_

TELEPHONE NO: \_\_\_\_\_ FAX NO: \_\_\_\_\_ E-MAIL: \_\_\_\_\_

ON-SITE SUPERVISOR: \_\_\_\_\_

***INFORMATION ON SPILL OR UNAUTHORIZED DISCHARGE***

Date/time spill or discharge began: \_\_\_\_\_

Date/time spill or discharge ended: \_\_\_\_\_

Location of spill or discharge: \_\_\_\_\_

Did recycled water enter or will it enter storm drains or receiving waters (e.g., creek, stream, lake);  
\_\_\_\_\_ If so identify: \_\_\_\_\_

Estimated volume of spill or discharge: \_\_\_\_\_

Estimated time of repair: \_\_\_\_\_

If still ongoing, estimate flow rate (gallons/minute): \_\_\_\_\_

Agencies/entities involved with repair and/or clean-up: \_\_\_\_\_

Cause of the spill or discharge: \_\_\_\_\_

Corrective actions taken and when, or plan to correct spill/discharge: \_\_\_\_\_

## **APPENDIX 8**

### **EL TORO WATER DISTRICT**

#### **“ON-SITE” SUPERVISOR DO’S AND DON’TS**

##### **DO’S**

- Educate/train operations personnel on the safe use and restrictions of recycled water.
- Install and maintain signs at all points of entry (pedestrian and vehicular).
- Install and maintain labels and tags on recycled, potable, and non-potable water systems.
- Use quick coupling valves instead of hose bibs on recycled water systems.
- Operate irrigation system:
  - Between 10:00 p.m. and 6:00 a.m., if automatically controlled (unless other restrictions apply);
  - At other times, if manually controlled and supervised (someone present) to make sure the recycled water does not come in contact with the public;
  - At any time, if public access to the reuse site is restricted.
- Prevent runoff from reuse sites due to overspray from sprinklers, overflow of ponds that contain recycled water, over watering, or broken sprinklers or irrigation lines.
- Quickly repair any breaks in recycled water irrigation lines and broken sprinklers.
- Be familiar with all notification requirements if any of the following has occurred:
  - A recycled water line break, spill or offsite discharge of recycled water;
  - A noncompliance of the District’s Requirements or Use Permit;
  - A cross-connection between the recycled water and potable water systems;
  - Any safety or health issues.
- Schedule all required backflow prevention required annually
- Schedule all cross-connection testing required at least annually
- Assist and cooperate during cross-connection testing.
- Assist and cooperate during periodic site inspections conducted by the District.
- Thoroughly wash tools used for the recycled water system if used for the potable water system.
- Contact the District if any water system (recycled or potable) modifications are anticipated.
- Keep records and as-built drawings up-to-date and accessible.
- Submit all required information and maintenance reports.

## **DON'Ts**

- Don't drink recycled water.
- Don't use recycled water to wash hands or any other part of body.
- Don't remove recycled water identification signs, tags or labels.
- Don't cross-connect two dissimilar water systems (recycled or potable).
- Don't allow recycled water to contact drinking fountains or eating areas.
- Don't allow recycled water to pond or puddle.
- Don't allow recycled water to runoff the use site property or either overspray or overwater.
- Don't use recycled water on an unapproved site.
- Don't put hose bibs on recycled water systems (unless approved by the District and public access is restricted).
- Don't use the same equipment on both recycled water and domestic water systems (for example: quick coupling valves, hoses, tools, etc.).
- Don't significantly modify the recycled or potable water systems without prior approval of the District, State Water Resources Control Board Division of Drinking Water (DDW) and/or Orange County Health Care Agency (OCHCA).

**RULES AND REGULATIONS  
FOR  
RECYCLED WATER**

**CLEAN DOCUMENT**

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- App 8 "On-site" Supervisor Do's and Don'ts

## **§10100      INTRODUCTION AND PURPOSE**

### **§10110      INTRODUCTION**

El Toro Water District (District) serves recycled water to a portion of its service area via its recycled water distribution system. Recycled water service by the District is provided subject to the availability of facilities or adequate capacity in facilities, funds, or financing for the construction thereof, or all of the foregoing, and is available on the following terms and conditions, including all terms, conditions, and charges hereinafter established and provided for. Neither these rules nor any other act of or on behalf of the District shall create a right to service of any kind until a "Will Serve" letter has been issued by the District, and all fees and charges imposed by the District have been paid. This is a declaration of existing policy and not intended as a change by District of any of its policies or requirements. The availability of such service on the basis herein set forth is intended to be furnished to each member of the public or each segment of the public on the same basis to the extent all such applicants, owners, or customers are similarly situated and desire to be served, and may be served in an equal and comparable manner as determined by the Board to be in the best interest of the District.

The District's existing recycled water distribution system is depicted on Exhibit 1. Exhibit 1 is by this reference incorporated herein and may be changed by the District from time to time. In such instances, the revised Exhibit 1 or portions thereof will be substituted to these Rules and Regulations. Each applicant shall verify the location of the existing recycled water facilities relative to its property and confirm with the District if there is available capacity in that portion of the recycled water system. Facts necessary for such verification may be obtained from the District. However, the fact that the District provides such information is not a commitment to provide recycled water or a guarantee that capacity will be available at the time of application therefore.

All recycled water service from the District shall be available in accordance with the following Rules and Regulations, and on the basis of the charges established therefore from time to time and subject to all penalties and charges for violations thereof, or any statutes applicable to the District.

### **§10120      BENEFITS OF RECYCLED WATER USE**

As it is the mandate of the State of California to effect conservation of water resources whenever possible, the District's goal has always been directed toward collecting, treating, and reclaiming sewage and wastewater and beneficially reusing the resulting recycled water. Using recycled water for landscape irrigation uses provides the following benefits:

- Reduce dependence on imported water by using potable water for household consumption, sanitary uses and recycled water for irrigation;
- Enhance local supplies and reliability by using the water more than once;
- Create a more self-reliant water system, particularly important in times of unplanned service interruptions such as drought and emergencies; and
- Reduce treated wastewater discharge to the ocean.

Like most water districts in south Orange County, El Toro Water District relies on imported water from the Sacramento-San Joaquin Bay Delta and the Colorado River to meet the majority of its customer demands. By expanding the recycled water usage, the District will reduce the dependency on imported potable water for irrigation and therefore, enhance overall supply reliability while reducing the amount of treated wastewater discharged into the ocean.

## **§10130      RECYCLED WATER REGULATORY REQUIREMENTS**

The California Legislature has declared its intent to promote the use of recycled water. Recycled water is a valuable resource and a significant component of California's water supply. Landscape irrigation with recycled water is a viable strategy to reduce potable water demand and to reduce the volume of water wasted after a single use. When used in compliance with the Recycled Water Policy, adopted by State Water Board Resolution No. 2009-001 in 2009, California Code of Regulations (CCR) Title 22, and all applicable state and federal water quality laws, the State Water Board finds that recycled water is safe for approved uses, and strongly supports recycled water as a safe alternative to potable water for landscape irrigation uses.

In July 2009, the State Water Resources Control Board (SWRCB) adopted General Waste Discharge Requirements for Landscape Irrigation Uses of Municipal Recycled Water (Water Quality Order No. 2009-0006-DWQ) in order to satisfy the requirements of California Water Code (Water Code) Section 13552.5. El Toro Water District, being the "Producer and Distributor" of the recycled water for landscape irrigation uses, has obtained coverage under the above General Permit (Order No. 2009-0006-DWQ).

For this General Permit, "recycled water" is limited to disinfected tertiary recycled water produced by a public entity at a municipal wastewater treatment plant, as defined in Water Code Section 13625(b)(1) and Section 13625(b)(2).

Specified uses of recycled water considered "landscape irrigation" under the General Permit include any of the following:

- Parks, greenbelts, and playgrounds;
- School yards;
- Athletic fields;
- Golf courses;
- Cemeteries;
- Residential landscaping, HOA maintained area, common areas (individual owned residences are not eligible for coverage under this General Permit);
- Commercial landscaping, except eating areas;
- Dust Suppression for Construction;
- Industrial landscaping, except eating areas; and
- Freeway, highway and street landscaping.

In order to obtain coverage under this General Permit, El Toro Water District has met the following treatment and use standards:

- a. As the “Producer”, the District is producing disinfected tertiary recycled water, as defined in CCR Title 22, Sections 60301.230 and 60301.320, at a municipal wastewater treatment plant;
- b. As the “Distributor”, the District will comply with the applicable uniform statewide reclamation criteria established pursuant to Water Code Section 13521 (i.e., CCR Title 22 Section 60301 et. Seq., hereafter “Title 22 Requirements”);
- c. The District, as the “Producer and Distributor” shall ensure that Users comply with the applicable uniform statewide reclamation criteria established pursuant to Title 22 Requirements; and
- d. The District, as the “Producer and Distributor” shall satisfy all applicable requirements of the Recycled Water Policy.

The use of recycled water for landscape irrigation has characteristics which can create water quality and public health problems if improperly treated and managed. It is necessary to establish requirements for landscape irrigation uses of recycled water that ensure protection of water resources and public health (e.g., pathogenic organisms, salinity and other waste constituents, and potential for unauthorized discharges). SWRCB General Permit established requirements to manage recycled water for landscape irrigation uses in a manner that is protective of public health and the environment.

#### **§10140      PURPOSE OF RULES AND REGULATIONS**

It is the intent of the District that recycled water be used in a manner that is in compliance with the SWRCB General Permit and with any and all applicable Federal, State, and local statutes, ordinances, regulations and other requirements. All recycled water produced by the District for irrigation meets, or exceeds, the stringent water quality requirements for California as established by the SWRCB General Permit and the California Department of Public Health.

These Rules and Regulations have several purposes:

1. Assure that the recycled water use in El Toro Water District conforms with SWRCB General Permit Order No. 2009-0006-DWQ.
2. Summarize the general requirements for the usage of recycled water.
3. Establish a process for acquisition and maintenance of a Recycled Water Use Permit.
4. Establish the technical requirements for on-site facilities to be constructed or provided by the customer for new sites or sites to be retrofitted to recycled water.
5. Establish general technical specifications and on-site testing procedures.

6. Establish specific operational and maintenance requirements for using recycled water including description of the determination of violations and enforcement procedures.

## **§10150      SUMMARY OF AUTHORITY**

The area within the District's boundary that has recycled water is located within the jurisdiction of the Santa Ana Regional Water Quality Control Board (RWQCB) Region 8. El Toro Water District is responsible as the "Producer and Distributor" of the recycled water for all monitoring and compliance reporting to the Santa Ana RWQCB as required by the above SRWQCB General Permit. El Toro Water District is responsible for issuing Use Permits within the District, as well as ensuring that all customers conform with the requirements of these Rules and Regulations. The District, acting as an agent of the Santa Ana RWQCB, is authorized to review, approve or disapprove, and initiate enforcement or mitigation actions for all actions or proposed actions relating to the production, distribution, or use of recycled water by the Users within the District' jurisdictional area.

Any User of recycled water shall allow Santa Ana RWQCB, El Toro Water District, or an authorized representative of these parties, or any representative from the State Water Resources Control Board Division of Drinking Water (DDW) or the Orange County Health Care Agency (OCHCA), upon presentation of proper credentials, to inspect the facilities and the Approved Use Area of any recycled water to ascertain whether the User is complying with these Rules and Regulations. The User, the Operator and any operations personnel, are obligated to cooperate with those making the inspection and to assist in the performance of any operational tests as requested.

It is the District's policy, if recycled water service is determined by the District to be economically, financially, and technically feasible in accordance with the requirements contained in these Rules and Regulations, the applicant, owner or customer will be required to utilize recycled water service. The use of potable water for landscape irrigation uses when recycled water is available is contrary to the District's policy, and shall not be considered the most beneficial use of a natural resource and shall be avoided to the maximum extent possible. If recycled water is available to a prospective customer and the on-site conversion or retrofit is not completed within a stipulated time period (see Section 10365 of this document ("Recycled Water Non-Conformance") for additional information), the customer's irrigation consumption will be billed at the District's Tier III (Inefficient) rate for potable water.

## **§10200      DEFINITIONS**

For the purpose of these Rules and Regulations, the following terms, phrases, words and their derivations shall have the meaning given below. When not inconsistent with the context, words used in the present tense include the future, words in the plural include the singular number, and words in the singular include the plural number. The word "shall" is always mandatory and not merely directory.

1. *Air-Gap Separation*: a physical break between a supply pipe and a receiving vessel. The air gap shall be at least double the diameter of the supply pipe, measured vertically above the top rim of the vessel, and in no case less than one inch.
2. *Agronomic Rate*: the rate of application of recycled water to plants that is necessary to satisfy the plants' watering and nutritional requirements, considering supplemental water (e.g., precipitation) and supplemental nutrients (e.g., fertilizers), while preventing or strictly minimizing the amount of nutrients that pass beyond the plants' root zone.
3. *Applicant*: an owner, developer, builder, engineer, or authorized representative, firm, corporation, association, or agency that applies for recycled water service under the terms of the Rules and Regulations. A successful applicant becomes a recycled water customer.
4. *Application Rate*: the rate at which water is applied to an irrigation or construction area, expressed in inches per day or gallons per minute per acre.
5. *Approved backflow prevention assembly*: a device installed to protect the potable water supply from contamination; this device shall be approved by the DDW and the District in conformance with applicable portions of the Cross-Connection Control Policy Handbook.
6. *Approved use*: an authorized use of recycled water in a manner, and for a purpose, specifically designated in a Use Permit issued by the District and in compliance with any and all applicable regulatory agency requirements.
7. *Automatic System*: with reference to landscape irrigation systems, automatic controllers, valves, and associated equipment required for the programming of effective water application rates when using recycled water.
8. *ANSI*: American National Standards Institute.
9. *ASTM*: American Society for Testing and Materials.
10. *AWWA*: American Water Works Association.
11. *AWWA Guidelines*: AWWA's *Guidelines for Distribution of Non-potable Water*, California-Nevada Section, latest edition, or *Guidelines for the Onsite Retrofit for Facilities Using Disinfected Tertiary Recycled Water*, latest edition.
12. *AWWA Standards*: AWWA's *Standards for Construction Materials*, latest edition.
13. *Board*: Board of Directors of the El Toro Water District.
14. *Commercial use*: water used for toilets, urinals, decorative fountains, cooling towers, and other related uses.



15. *Construction use*: an approved use of recycled water to support construction activities such as soil compaction and dust control during grading.
16. *Contractor*: the person(s), firm, or corporation entering into a contract with the District, owner, or customer for the performance of work on all or any portion of facilities subject to the Rules and Regulations.
17. *Conversion*: changing onsite supply from potable water to recycled water in cases that sites were designed and installed to use recycled water. (see also “retrofit”).
18. *County of Orange Department of Public Health (COPDH)*: See Orange County Health Care Agency, Department of Environmental Health (OCHCA).
19. *Cross connection*: any unprotected actual or potential connection between a potable water system and any source or system containing unapproved water or a substance that is not or cannot be approved safe, wholesome, and potable; by-pass arrangements, jumper connections, removable sections, swivel or change-over devices and other devices through which backflow could occur, shall be considered to be cross connections; cross connections shall be as defined in the Cross-Connection Control Policy Handbook.
20. *Cross-Connection Control Policy Handbook (CCCPH)*: The primary objective of the Cross-Connection Control Policy Handbook (CCCPH) is the protection of public health through the establishment of standards intended to ensure a public water system’s (PWS) drinking water distribution system will not be subject to the backflow of liquids, gases, or other substances into the distribution system.
21. *Customer*: any person, group, firm, partnership, corporation, association or agency accepting recycled water from the District’s recycled water facilities for use in accordance with the Rules and Regulations.
22. *Design area*: a site, with well-defined boundaries, proposed to receive recycled water for an approved use as delineated in an application for a Use Permit.
23. *Design consultant*: any person or firm registered with the State as an engineer or landscape architect to provide site layout, landscaping, or irrigation system design services.
24. *Direct beneficial use*: the use of recycled water that has been transported from the point of production to the point of use without an intervening discharge to waters of the State.
25. *Direct overspray*: any discharge of water directly onto areas other than that for which the application of recycled water is approved.

26. *Discharge*: any release or distribution of recycled water to a use area or disposal site/mechanism (outfall, live stream discharge, municipal sewage system); all discharges of recycled water must be approved by the regulatory agencies.
27. *Discharge Permit*: a permit issued by the Santa Ana Regional Water Quality Control Board (SARWQCB) for the discharge of recycled water.
28. *Disinfected Tertiary Recycled Water*: filtered and subsequently disinfected wastewater that meets the criteria defined in CCR Title 22, Sections 60301.230 and 60301.320.
29. *Distributor*: any combination, either in whole or in part, of a Recycled Water Wholesaler, Recycled Water Supplier, or Recycled Water Retailer.
30. *District*: the El Toro Water District.
31. *Effluent*: treated wastewater discharged from a water recycling plant.
32. *Engineer*: a duly qualified, registered engineer authorized to act for the District.
33. *Engineering Report*: the report filed with DDW to produce or supply recycled water for direct reuse. The report shall clearly indicate the means for compliance with the Title 22 Requirements (Title 22 Section 60323).
34. *General public*: any person(s) at large who may come in contact with facilities and/or areas where recycled water is approved for use.
35. *GPM*: gallons per minute.
36. *HGL*: hydraulic grade line.
37. *Hose bib*: a faucet or similar device to which a common garden hose can be readily attached (Title 22 Section 60301.400).
38. *Incidental runoff*: unintended small amounts (volume) of runoff from recycled water use areas, such as over-spray from sprinklers that escapes the recycled water use area.

Water leaving a recycled water use area is not considered incidental if it is part of the facility design, if it is due to excessive application, if it is due to intentional overflow or application, or if it is due to negligence.

39. *Industrial use*: water used for industrial processes such as cooling, flushing, or construction, and other related uses.
40. *Infiltration rate*: the rate at which soil will accept water without overland flow, expressed in inches per hour.

41. *Inspection and testing:* District will perform regularly scheduled on-site visits with operational testing accompanied by customer representative. The inspection and testing schedule will be determined by the District. In no circumstance will the schedule be longer than every four years.
42. *Inspector:* any person(s) authorized by the District to perform inspection of either on-site or offsite facilities prior to construction, during construction, after construction and during operation.
43. *Installer:* a person(s) or firm performing work necessary to construct or install equipment or facilities subject to the Rules and Regulations.
44. *Irrigation Management Plan:* all applied nutrients from all sources (directly applied and as contained in the recycled water) and the agronomic application rate and seasonal need for the specific plants being grown to assure that nutrients are not applied beyond the vegetative uptake rate and discharged into the environment.
45. *Irrigation System:* all equipment and materials required for applying irrigation water to the design area from the service connection including all piping, valves, sprinkler heads, controllers, and appurtenances.
46. *Landscape impoundment:* a body of recycled water, which is used for aesthetic enjoyment, landscape irrigation or which otherwise, serves a function not intended to include public contact.
47. *Landscape irrigation:* use of recycled water for the propagation and maintenance of trees, shrubs, groundcover, and turf.
48. *Manager:* the General Manager of the District or the person authorized by the Board or the General Manager to act on his behalf.
49. *MGD:* million gallons per day.
50. *Non-potable water:* water that is not intended for human consumption in conformance with the standards referred to in the definition of Potable Water, below, such as potable water downstream of an approved backflow device within an irrigation system.
51. *Offsite facilities:* existing or proposed facilities under the control of the District, from the source of supply to the point of connection with the customer's onsite facilities, up to and including the District's meter and meter box.
52. *Offsite supervisor:* a qualified person designated by the District to be responsible for the safe and efficient operation of the District's recycled water distribution system; this person shall be knowledgeable in the construction and operation of recycled water distribution systems and in the application of State and local

guidelines, criteria, standards, and regulations governing the use of recycled water.

53. *On-site facilities*: existing or proposed facilities within property under the control of the customer or owner, normally downstream of the District's meter tailpiece.
54. *On-site supervisor*: a qualified person designated by a recycled water customer and approved by the District to be responsible for the safe and efficient operation of the customer's recycled water system; this person shall be knowledgeable in the construction and operation of recycled water and irrigation systems and in the application of State and local guidelines, criteria, standards and regulations governing the use of recycled water; this person shall be trained in cross-connection control to the satisfaction of the District.
55. *Operations personnel*: any employee of a customer, whether permanent or temporary, or any contracted worker who's regular or assigned work involves the supervision, operation or maintenance of equipment on any portion of on-site facilities using recycled water.
56. *Operator*: any person(s) or firm, who by entering into an agreement with a customer is responsible for operating on-site facilities.
57. *Orange County Health Care Agency, Department of Health (OCHCA)*: the local health agency responsible for on-site public health issues and cross connection control.
58. *Owner*: any holder of legal title, contract purchaser, or lessee under a lease with an unexpired term of more than one (1) year of property for which recycled water service has been requested or established.
59. *Pantone*<sup>TM</sup>: Also known as Pantone 512 is purple color standard system for recycled water.
60. *Permit*: the processed and approved application to and agreement with the District for recycled water service.
61. *Person*: any public or private individual, firm, partnership, corporation, agency, or association including homeowner's association.
62. *Plans*: the plans, working drawings, detail drawings, specifications, profiles, typical cross sections and supplemental drawings or reproductions thereof that show locations, character, dimensions or details of the work.
63. *Plan Check & Inspection Fees*: the fees to be paid to the District by the applicant at the time he submits improvement plans for District approval.
64. *POC*: point of connection.

65. *Ponding*: retention of recycled water on the surface of the ground or other natural or manmade surface that exceeds the surface infiltration rate and that is unable to runoff due to gravity such that a hazard or potential hazard to the public health results.
66. *Potable water*: water that conforms to the latest edition of the United States Public Health Service Drinking Water Standards, or other applicable standards.
67. *PPC*: positive pressure check.
68. *Producer*: an agency that produces recycled water.
69. *PSI*: pounds per square inch.
70. *Property Owner*: the holder of legal title, contract purchaser, or lessee under a lease with an unexpired term of more than one (1) year, of property for which recycled water service has been requested or established.
71. *Purple Book*: an aggregate of California health laws related to recycled water, including excerpts from the Health and Safety Codes, Water Code and Titles 22 and 17 of the California Code of Regulations, latest edition.
72. *PVC*: polyvinyl chloride.
73. *Quick Coupling*: For recycled water a quick coupler valve shall be one (1) piece 1-inch ACME thread with a vinyl locking effluent cover.
74. *Reclamation Plant*: the District treatment facilities that receive and treat wastewater for beneficial uses.
75. *Record Drawings*: the drawings that correctly show the completed facilities as constructed or modified (as-built).
76. *Recreational impoundment*: a body of recycled water used for recreational activities including, but not limited to, fishing, boating, and/or swimming; allowable uses will depend on the treatment level of the recycled water.
77. *Recycled Water*: the water served from the District's offsite facilities as a result of treatment of municipal wastewater, that is suitable for a direct beneficial use or a controlled use that would not otherwise occur. For El Toro Water District, it is disinfected tertiary recycled water which is produced from wastewater by District Water Recycling Plant and is suitable for direct beneficial uses in accordance with Title 22.
78. *Recycled Water Distribution System*: the recycled water pipelines constructed by the District to distribute the recycled water to the appropriate customers.

79. *Recycled Water Facilities*: the District facilities that produce, convey, supply and store recycled water.
80. *Recycled water service connection*: the point of connection of the customer's recycled water line with the recycled water service line of the District, which shall normally be the downstream end of the recycled water meter tailpiece.
81. *Recycled water service line*: the District's facility between its recycled water distribution system and the recycled water service connection.
82. *Recycled water use area (Use Area)*: an area where recycled water is to be used which is defined by its boundaries or project area (e.g. a golf course, residential neighborhood, school yard, park, etc.) so as to be consistent with these Rules and Regulations, SWRCB General Permit, and Title 22 Section 60301.920.
83. *Recycled water user (User)*: a person or entity that uses recycled water.
84. *Reduced pressure principle backflow prevention assembly*: a backflow prevention device incorporating not less than two check valves, an automatically-operated differential relief valve located between the two check valves, and a completely closing shut-off valve on each side of the check valve assembly, equipped with test cocks for testing.
85. *Regulatory agencies*: those public agencies legally constituted to protect the public health and water quality and having regulatory authority over the District, such as SARWQCB, DDW, and OCHCA, and others as may be appropriate.
86. *Regulations*: these "Rules and Regulations for Recycled Water," prepared pursuant to the SARWQCB General Permit and all rules and regulations of other local or State agency or other regulations referred to and incorporated herein.
87. *Retrofit*: modifying on-site facilities that were originally designed to accommodate potable water use so that they now accommodate recycled water use in compliance with the Regulations (see also "conversion").
88. *Runoff*: flow of water along the surface of the ground or other natural or man-made surface, including but not limited to, pedestrian walkways, streets, playground surfaces, and grassy slopes.
89. *SARWQCB*: the Santa Ana Regional Water Quality Control Board, See Discharge Permit.
90. *Secondary effluent*: wastewater that has been treated to a minimum level of effluent quality based on rules and regulations of the Environmental Protection Agency and defined with respect to biochemical oxygen demand, suspended solids, fecal coliform bacteria, and pH.

91. *Security Deposit*: the monies required to be deposited with the District for the purpose of guaranteeing payment of monthly or bimonthly utility bills rendered for recycled water service.
92. *Service*: the furnishing of recycled water to a customer through a metered connection to the on-site facilities.
93. *Service connection*: See Recycled Water Service Connection
94. *Standard specifications*: specifications adopted by the District for construction of potable water, sewer, and recycled water facilities, "*Standard Specifications and Plans*."
95. *State*: State of California.
96. *State Water Resources Control Board, Division of Drinking Water (DDW)*: the primary State agency responsible for protection of public health and the regulation of drinking water. The Legislature has defined several specific regulatory responsibilities of DDW related directly or indirectly to recycled water use activities including establishment of statewide water reclamation criteria advising the Regional Water Boards in the drafting of water reclamation requirements; review and approval of certain proposed water reclamation projects; abatement of contamination resulting from use of recycled water where public health is seriously threatened; and control of cross-connections between potable and recycled water systems.
97. *Tenant*: any person, group, firm, partnership, corporation, association, or agency that pays rent to occupy and use land or a building.
98. *Tertiary effluent*: secondary effluent that has been disinfected and filtered consistent with provisions in *Water Recycling Criteria*.
99. *Terms*: all terms relating to matter of opinion or judgment, such as in regard to approvals, requirements, directions, or acceptances, denote the option or judgments of the District.
100. *Transfer*: the conveyance or movement of recycled water from one agency to another agency. Transfer includes the conveyance of control or responsibility of a volume of recycled water stored in a storage facility commonly owned or controlled by more than one agency.
101. *Treated wastewater*: wastewater treated in accordance with the requirements of "*Water Recycling Criteria*."
102. *UL*: Underwriter's Laboratory.

103. *Unauthorized discharge*: any release of recycled water that violates the Rules and Regulations or any applicable federal, state, or local statute, regulation, ordinance, contract, or other requirement. Per Water Code Section 1359.2, discharge of recycled water, without regard to intent or negligence, not authorized by waste discharge requirements issued pursuant to Water Code Sections 1360-13274 (e.g., RWD, WDRs, waiver, etc.), 13523 (i.e., WRRs), or 1323 (i.e., Master Reclamation Permit).
104. *UPC*: Uniform Plumbing Code.
105. *Use area*: the specific area contained within a use site, designated to be served with recycled water through on-site facilities.
106. *Use site*: the specific property, containing one or more use areas, designated by the legally recorded tract and lot or parcel map description.
107. *Use Permit*: a permit issued by the District to a recycled water service applicant after the satisfactory completion of the service application procedures set forth in the Regulations; this permit constitutes a service agreement that legally binds the customer/customer to all conditions in the Rules and Regulations and to any and all applicable regulatory agency requirements.
108. *User*: a person or entity that uses recycled water.
109. *Violation*: noncompliance with any condition or conditions of the Rules and Regulations and/or a Use Permit by any person, action or occurrence, whether willfully or by accident.
110. *Water reclamation*: the renovation of wastewater to produce a product that is approved for specific beneficial uses by the appropriate regulatory agency.
111. *Water Recycling Criteria*: the Uniform statewide recycling criteria established in California Code of Regulations Title 22 by DDW for each varying type of use of recycled water where the use involves the protection of public health (Water Code Section 13521).
112. *Water Recycling Plant*: the District treatment facilities that receive and treat wastewater for beneficial uses.
113. *Windblown spray*: dispersed, airborne recycled water capable of being transmitted through the air by natural or manmade wind to locations other than that for which the direct application of recycled water is approved.
114. *Work*: the entire improvement proposed to be constructed pursuant to a legal agreement and consistent with the Rules and Regulations.



**§10300      GENERAL REQUIREMENTS**

**§10305      APPROVED USE**

The Rules and Regulations for Recycled Water pertain to recycled water service to land or improvements, or both, lying within the boundaries of the District and within the areas where recycled water facilities are available. If the District has determined that recycled water shall be provided in accordance to the requirements contained in this section, such service shall be provided only if a permit for such recycled water service is obtained in the manner hereinafter provided.

The acceptable uses of recycled water include any of the following:

- Parks, greenbelts, and playgrounds;
- School yards;
- Athletic fields;
- Golf courses;
- Cemeteries;
- Residential landscaping, HOA maintained area, common areas (individual owned residences are not eligible for coverage under this General Permit);
- Commercial landscaping, except eating areas;
- Dust Suppression for Construction;
- Industrial landscaping, except eating areas; and
- Freeway, highway and street landscaping.

Each such use must be considered for approval by the District on a case-by-case basis, and the District may determine in its discretion whether it is feasible to furnish recycled water for the specific use involved. Prior to approving such uses, the District may, in its discretion, set forth specific requirements as conditions to providing such services and/or require specific prior approval from the appropriate regulatory agencies.

Recycled water may only be used for the acceptable uses in areas approved by the District. The District's determination of feasibility will be based on the following factors:

1. Whether recycled water may be furnished for the intended use at a reasonable cost to the customer and the District;
2. Whether recycled water use is in accordance with the standards of treatment and water quality requirements set forth in Title 22, Chapter 4, of the Code of California Regulations and with the SWRCB General Permit; and
3. Whether the use of recycled water can be made in a manner not detrimental to public health.

#### **§10310      REQUIREMENT TO USE RECYCLED WATER**

The District will identify customers who are located within an area identified as capable of receiving service from the District's recycled water system and will determine the feasibility of providing recycled water service to these customers. The District will also review applications for new permits to determine the feasibility of providing recycled water service to these applicants.

Potential recycled water customers identified by the District that elect not to use recycled water that is available but can use recycled water in compliance with State and County regulatory requirements, these Rules and Regulations and can meet the criteria identified in Section 13550 of the California Code of Regulations, may be subject to the provisions in Section 10365 of this document ("Recycled Water Non-Conformance"). Potential recycled water customers that believe recycled water cannot be used at their site shall provide written justification to support their position. The District assumes identified customers meeting the above referenced criteria can use recycled water until or unless the potential recycled water customer can provide documentation otherwise.

If the District's recycled water distribution system has not yet been extended to the vicinity of the customer's property, the District may require a written commitment from the customer to use recycled water when the extension has been made. A customer that does not provide a written commitment may be subject to the provisions of Section 10365 of this document ("Recycled Water Non-Conformance").

If the District does not require the use of recycled water service, the customer may obtain recycled water service upon request but only if the District has determined that recycled water service to the customer is feasible and authorizes such use.

#### **§10315      NEW DEVELOPMENT**

If recycled water service is determined by the District to be feasible, applicants for new recycled water service shall be required to install on-site facilities to accommodate both potable water and recycled water service in accordance with these Rules and Regulations. Applicants for new or expanded water service shall be responsible for the full capital cost of on-site recycled water facilities and applicant-furnished offsite distribution facilities required as a condition of service.

#### **§10320      RETROFIT/CONVERSION OF EXISTING SITE**

The District may also require existing customers to retrofit existing on-site water service facilities to accommodate recycled water service. Except as otherwise provided herein or approved by the District, when an existing customer is required by the District to convert to recycled water service, the customer will pay the reasonable capital costs of retrofitting the on-site water service facilities and the District will provide the offsite facilities necessary to deliver recycled water to the meter.

## **§10325      PROCESS OF DETERMINATION**

The following describes the process by which the District will determine which potential recycled water customers may be served, contact by District, response by potential recycled water customers, and appeal to the District's General Manager or Board.

The District staff will identify potential sites at which it believes recycled water may be used. Identified potential recycled water use sites must meet the following criteria:

1. The recycled water is to be served to an available location. "Available location" shall mean: the District's recycled water distribution system is in a street adjacent to the subject property; or the District has notified a customer that if a written commitment to use recycled water has been received from the customer, the District will complete an extension of the distribution system to a street adjacent to the customer's property, or the customer has failed or refused to provide the written commitment, and any determination sought by the customer pursuant to these herein provisions has become a final and non-appealable determination that recycled water is feasible;
2. The District can provide recycled water in the needed volume, quality and flow rate at the pressure available from the existing recycled water distribution system;
3. The anticipated use(s) at the subject site are allowed for in the SWRCB General Permit;
4. The construction/retrofit can be accomplished in compliance with DDW, District, and OCHCA requirements;
5. The anticipated use(s) will not negatively impact public health; and
6. Recycled water is available at a reasonable cost, meaning; the commodity cost for recycled water is no more than the commodity cost for a like quantity of non-interruptible potable water.

The District will contact the recycled water use site representative to discuss the use of recycled water. Potential recycled water customers shall respond to District inquiries as to its ability to use recycled water. Customer and the District shall engage in dialogue to determine if recycled water can be used.

At the completion of the dialogue, the potential recycled water customer shall have sixty (60) calendar days to indicate its intent regarding the use of recycled water. If recycled water can be used, the customer shall work with the District toward the successful introduction and use of recycled water including obtaining regulatory approvals. If, according to the customer, recycled water cannot be used, customer shall provide written documentation to the District to support their position.

District staff will review documentation provided by the customer supporting why recycled water cannot be used. In the case of potential customers that provide sufficient evidence as to why recycled water cannot be used, the District shall consider the matter closed.

In the case of potential customers that elect not to respond to the District's inquiries or do not provide documentation as to why recycled water cannot be used, the District, with General Manager approval, will send a certified letter to the potential recycled water customer urging contact with the District to continue a meaningful dialogue regarding the potential use of recycled water. The potential recycled water customer shall have thirty (30) calendar days in which to contact the District.

If the potential recycled water customer does not respond within thirty days (30) calendar days, a second certified letter will be sent notifying the potential recycled water customer that the billing rate per Section 10365 of this document ("Recycled Water Non-Conformance") will begin after sixty (60) calendar days after notification.

The potential recycled water customer who contends that recycled water is not feasible, based on the criteria noted above, may appeal to the General Manager by filing a written appeal within thirty (30) calendar days of the date of the notice described above. The General Manager shall consider the information provided and respond within thirty (30) calendar days to the potential recycled water customer.

The decision of the General Manager may be appealed to the Board in writing filed with the District's Board of Directors within thirty (30) calendar days of the General Manager's decision. The Board will conduct a hearing to consider the appeal at the next regularly scheduled Board meeting. The decision of the Board shall be transmitted in writing to the potential recycled water customer within the thirty (30) calendar days of the hearing. The decision of the Board is final.

#### **§10330      APPLICATION PROCEDURE**

The steps for obtaining recycled water service are summarized in Section 10400 of this document (Permitting Process). A prospective customer of recycled water must submit to the District an application for recycled water service using the forms presented in the Appendices of this document. The application shall include a preliminary package and plan with the application as summarized in Section 10431 (Application for Recycled Water Service Process).

Based on the review of the application, the District shall determine if the property to be served is in a suitable area for recycled water use, and if the necessary quantity and quality of recycled water can be made available to the applicant. The District will notify the owner/customer if a preliminary approval is granted for the recycled water service application.

#### **§10335      USE PERMIT**

Once the preliminary approval is granted by the District, the owner or customer can proceed with the preparation of the plans and submittal of the Use Permit. The applicant shall agree to comply with the Rules and Regulations by signing the Use Permit form. The steps for obtaining the approved Use Permit are summarized in more

detail within Section 10400 of this document (Permitting Process) but are summarized below:

- Applicant/Owner/Customer submits plans, irrigation plans, work schedule and required fees along with Use Permit;
- District reviews and approves plans and finalizes Recycled Water Service Application;
- District obtains DDW and OCHCA approval; as necessary;
- Applicant/Owner/Customer has operator (installation contractor/maintenance contractor) complete Operation Certification portion of the User Permit;
- On-site pre-construction meeting (applicant begins construction/retrofit of on-site facilities);
- District issues recycled water Use Permit;
- On-site construction is completed;
- Potable water backflow prevention devices, where required, are installed and tested; District performs final inspection, operational testing, and cross-connection testing;
- Recycled water meter is installed; and
- District grants final approval for recycled water service and completes Use Permit.

#### **§10340      SERVICE CONNECTIONS AND SIZE OF SERVICE LINE**

The District reserves the right to determine the size of the recycled water service lines, the service connections, and the meters and shall also have the right to determine the kind and size of backflow protection devices for the potable water service, and any and all other appurtenances to the service.

The recycled water service lines shall be installed to a curb line or property line of the customer's property, abutting upon a public street, highway, alley, easement, lane, or road in which are installed the recycled water mains of the District.

The District reserves the right to limit the area of land under one ownership to be supplied by one recycled water service connection and recycled water meter. A recycled water service connection and recycled water meter shall not be used to supply adjoining property of a different owner. When property provided with a recycled water service connection and recycled water meter is subdivided, such connection and meter shall be considered as serving the lot or parcel of land that it directly or first enters. Additional recycled water mains and/or recycled water service lines will be required for all subdivided areas in accordance with these Rules and Regulations.

All recycled water used on any premises where a meter is installed must pass through the meter. Customers shall be held responsible and charged for all recycled water passing through the meters.

Every recycled water service line shall be equipped with an angle meter stop on the inlet side of the meter; such angle meter stop being intended exclusively for the use of the District in controlling the recycled water supply through the recycled water service line. If the angle meter stop is damaged by the customer's use to an extent requiring replacement, such replacement shall be at the customer's expense.

Should a recycled water service line installed pursuant to the request of the applicant, owner, or customer be of the wrong size or installed at a wrong location; the cost of all changes required shall be paid by the applicant, owner, or customer.

All recycled water services provided prior to final street improvements shall be considered temporary and the costs for all repairs or changes required to be performed by the District shall be paid by the applicant, owner, or customer.

No person shall make connection to the District's recycled water system facilities without a permit or except as provided in the permit issued by the District.

#### **§10345      BACKFLOW PROTECTION**

The purpose of these provisions is to protect the District's potable water supply against actual or potential cross-connections by isolating, within the premises, contamination or pollution that may occur because of undiscovered or unauthorized cross-connection on the premises. Additional information concerning backflow prevention may be obtained from the "Manual of Cross-Connection Control", Foundation for Cross-Connection Control and Hydraulic Research, University of Southern California, School of Engineering. These provisions are in accordance with DDW's Cross-Connection Control Policy Control Handbook (CCCPH).

These provisions shall be in addition to and not in lieu of the controls and requirements of other regulatory agencies, such as local governmental agencies, DDW and OCHCA. These regulations are intended to protect the District's potable water supply and are not intended to provide regulatory measures for protection of users from the hazards of cross-connections within their own premises. Notwithstanding these provisions, the District accepts no responsibility for cross-connections or resulting hazards or contamination.

Backflow prevention devices, as required in these provisions, shall be provided, installed as close to the meter as practically possible, per District standards, tested, and maintained by the applicant, owner, or customer at their expense. The devices shall be located downstream of the meter at a location approved by the District. All devices shall be readily accessible for testing and maintenance and no device shall be submerged at any time or exposed to recycled water, direct overspray, or runoff at any time.

From time to time, representatives of DDW, District, and/or OCHCA may conduct surveys of any premises where recycled water service is provided by the District (Per California Health & Safety Code, Section 116800-116820). The purpose of such surveys is to determine if any actual or potential cross-connections exist. The applicant, owner, or customer shall provide reasonable cooperation in facilitating such surveys. Backflow protection for the District's potable water supply shall be provided on each water service connection to:

1. Premises having an auxiliary water supply such as recycled or non-potable water. The only exception to this requirement is for homeowner association sites where recycled water is being proposed to irrigate common area on a portion of a single family residence. If the backflow protection of the District's potable water supply is not feasible or practicable, the District, with DDW's approval, may increase the required frequency of the cross connection testing in lieu of the construction of the backflow device at each residence. The waiving of the backflow protection will only be allowed on a case by case basis and only if approved in writing by DDW and the District.
2. Premises on which any substance is handled in such fashion that could permit entry into the water system. This shall include the handling of process waters and waters originating from the District's system that have been subject to deterioration in sanitary quality.
3. Premises that have internal cross-connections, unless such cross-connections are abated to the satisfaction of the District and approved by DDW and/or OCHCA.
4. Premises having intricate plumbing and piping arrangements or where not all portions of the premises are readily accessible for inspection purposes.
5. Premises having a repeated history of cross-connections being established or re-established.

The type of protection required is related to the degree of hazard that exists on the premises served. The type of protective device that may be required (listed in increasing level of protection) includes Double Check Valve (DC), Reduced Pressure Principle Backflow Prevention Device (RPPD), and an Air Gap Separation (AG). The water user may choose a higher level of protection than required by the District. The minimum types required, relative to various situations shall be as required by DDW's Cross-Connection Control Policy Handbook (CCCPH) or to the extent not covered thereby, as determined by DDW, District and/or OCHCA.

It shall be the duty of the water user on any premises on which backflow prevention devices are installed to have competent inspections made at least once a year, or more often in those instances where successive inspections indicate repeated failure. All inspections and testing shall be performed by a tester certified by the California-Nevada Section of the American Water Works Association (CA-NV AWWA) in accordance with ANSI standards. The devices shall also be tested immediately after they are installed, relocated or repaired and shall not be placed in service unless they are functioning as required.

The District will notify the applicant, owner, or customers when routine testing is needed and also supply them with the necessary forms that must be filled out each time a device is tested or repaired. The notice will include the date when the test must be completed, generally 30 days after the date of the notice. Copies of the completed forms shall also be sent to OCHCA. The applicant, owner, or customer shall notify the District any time the device is repaired, replaced or relocated. A device shall be

repaired or replaced by, and at the expense of the water user, whenever it is found to be defective. Records of all such tests and repairs shall be maintained by the water user. The District may request records regarding any backflow prevention device on the premises.

A tester shall not remove, replace, or relocate a backflow prevention device without the approval of Orange County Environmental Health and/or the District. When a device is installed, repaired, or relocated, it shall be tested prior to being placed into service.

A tester shall submit a test report to Orange County Environmental Health and the District for every test that he/she performs. The test report shall be filled out completely with all required information. The test report shall indicate any failure of the device and any type of repair including cleaning. The test report shall be submitted within ten (10) days of testing the device. If there must be a delay in the submission of a report, the tester shall contact the District Cross Connection Specialist

Where the premises other than single-family residences contain dual or multiple water systems and piping, the exposed portions of pipelines shall be painted, banded, or marked at sufficient intervals to distinguish clearly which water is safe for drinking purposes and which is not safe. All outlets intended for drinking purposes shall be plainly marked to indicate that fact.

In the event of contamination or pollution of the potable water system due to a cross-connection on the premises, DDW, District, and OCHCA shall be contacted within 24 hours by the person responsible for the water system so that appropriate measures may be taken to mitigate the contamination or pollution.

When the District determines that water uses or conditions encountered by the District represent a clear and immediate hazard to the District's water supply that cannot be immediately abated, the District shall institute the procedure for discontinuing water use. Conditions or water uses that create a basis for water service termination shall include, but are not limited to, the following:

1. Refusal to install a required backflow prevention device.
2. Refusal to test a backflow prevention device.
3. Refusal to repair or replace a faulty backflow prevention device.
4. Direct or indirect connection between the District's water system and a sewer.
5. Unprotected direct or indirect connection between the District's water system and a system or equipment containing contaminants, or an auxiliary water system.
6. A situation which presents an immediate health hazard to the District's water system, as determined by DDW, District, or OCHCA.



## **§10350      REGULATORY AGENCIES**

The following is a summary of the regulatory agencies that may be involved in the approval process or future inspections as the result of using recycled water within an approved property:

| <b><i>Regulatory Agency and Responsibility</i></b>                                                                                                                                        | <b><i>Address</i></b>                                                             | <b><i>Phone #</i></b> |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|-----------------------|
| <b>El Toro Water District</b><br>"Producer and Distributor" of Recycled Water                                                                                                             | 24251 Los Alisos Boulevard<br>Lake Forest, CA 92630                               | (949) 837-7050        |
| <b>State Water Resources Control Board<br/>Division of Drinking Water</b><br>State agency responsible for protection of public health and regulation of drinking water and recycled water | Division of Drinking Water<br>2 MacArthur Place, Suite 150<br>Santa Ana, CA 92707 | (714) 558-4410        |
| <b>Orange County Health Care Agency</b><br>Local health agency responsible for on-site public health issues and cross connection control                                                  | 1241 E. Dyer Road, Suite 120<br>Santa Ana, CA 92705-5611                          | (714) 433-6266        |
| <b>Santa Ana RWQCB (Region 8)</b><br>SAWQCB General Permit                                                                                                                                | 3737 Main Street, Suite 500<br>Riverside, CA 92501-3348                           | (951) 782-4130        |

## **§10355      SCHEDULING AND EMERGENCY CONNECTIONS**

Recycled water shall be used in compliance with these Rules and Regulations. The District reserves the right to control and schedule the use of recycled water if, in the opinion of the District, scheduling is necessary for purposes including, but not limited to, the maintenance of an acceptable working pressure in the recycled water system and providing for reasonable safeguards in relation to public health.

Guidelines for such scheduling shall be as deemed appropriate by the District. The District reserves the right to supply potable water to the District's recycled water distribution system from time to time, as the District determines to be necessary or useful to augment the recycled water supply to such system. The supply of such other water to the system shall be at the District's discretion and shall not change the rates or charges billed for recycled water service nor relieve any recycled water customer of the applicable requirements of these Rules and Regulations.

If in the opinion of the District, an emergency exists whereby all or a portion of the recycled water system is not available, the District may approve a temporary connection to the potable water system. Before such temporary connection is made, the portion without recycled water shall be isolated by an air gap separation from the remainder of the recycled water system either at individual services or on the offsite system, as determined by the District and an approved backflow prevention device or devices of the type determined in accordance with this document, shall be installed on the potable water line or lines in accordance with these Rules and Regulations and any and all applicable rules and regulations of DDW and OCHCA. Before the emergency connection or connections shall be removed, whether on-site or offsite, the customer shall notify the District's cross-connection department. This emergency connection or connections shall be removed before connection is re-established to the remainder of the recycled water system.

## **§10360      MAINTENANCE**

The applicant, owner, or customer is responsible for maintaining all on-site water and recycled water facilities that are under the ownership of parties other than the District.

No person shall place, dispose, or deposit or permit the placement, disposal or deposit of oil, toxic, hazardous or contaminated liquid or waste, trash, dirt, building materials or other substances, objects or obstructions in, on or around water or recycled water meter boxes, and it shall be the responsibility of each applicant, owner, or customer to prevent meter boxes, or other District facilities from becoming obstructed or obscured by such applicant, owner, or customer's trees, shrubs, plants, or in any other manner so as to impede their use or access to them or make their location difficult to determine. If such substances, objects or obstructions are not cleaned or removed or permitted to obscure or impede such facilities, the District may, after providing reasonable notice to the applicant, owner, or customer, accomplish the cleaning and removal and charge the applicant, owner, or customer for the cost of doing so.

It is the desire of the District to effect conservation of water resources whenever possible, such measures being consistent with legal responsibilities to utilize the water resources of the State of California and the District. Facilities for irrigation of new and existing parks, median strips, landscaped public areas or landscaped areas, lawns, or gardens surrounding condominiums, townhouses, apartments, and industrial parks shall be designed and installed in such a way as to conserve water.

Recycled water is considered a water resource by the District, therefore, the same restrictions shall apply for all uses of recycled water as for potable water. Rate and extent of application of water shall be controlled by the user so as to minimize run-off from the irrigated areas.

## **§10365      RECYCLED WATER NON-CONFORMANCE**

For potential recycled water customers that elect not to comply with Section 10310 of this document ("Requirements to Use Recycled Water") and fail to provide reason(s) why recycled water cannot be used, all metered potable water irrigation use at the site that could otherwise be served with recycled water shall be billed at the District's Tier III (Inefficient) rate for potable water until the site is converted or acceptable justification as to why the recycled water cannot be used is provided. No refunds will be provided unless a justification is accepted by the District.

Potential recycled water customers identified and contacted by the District that elect not to use recycled water or are not cooperating with the District as defined previously in this section of this document, will be billed as stated in the above paragraph. In cases, where the potential recycled water customer elects not to pay their bill, that customer will be subject to the provisions of Section 7130 of the District's Administrative Code.

If an end user that was previously accepting recycled water elects to suspend or terminate delivery of recycled water and use potable water for reasons other than those identified above, that end user may be subject to the provisions noted above. In addition, the end user will be responsible to pay all costs for the construction of the new potable water service as well as any and all corresponding on-site and off-site costs as the result of the new potable water service.

## **§10400      PERMITTING PROCESS**

### **§10410      PERMITTING PROCESS OVERVIEW**

The permitting process typically includes the following principal steps:

- Preliminary Determination Notice
- Notice of Objection (if necessary)
- Final Determination Notice
- Application for a Use Permit
- Approval of the Applicant's Plans
- Construction
- Final inspection, operational testing and cross-connection testing
- Final approval for recycled water service and complete Use Permit

Each of these principal steps is discussed in the following sections. A more detailed listing of each step of the process from application through final approval is shown in Appendix 3, Checklist/Action Request Form for Obtaining Recycled Water Service.

## **§10420      DETERMINATION NOTICE**

### **§10421      *Preliminary Determination Notice***

When recycled water is available for a prospective customer, the District will mail a Notice of Determination to the prospective customer. A sample Preliminary Determination Notice is presented in Appendix 1. The Notice of Determination will include as a minimum: descriptive information about the District's recycled water system, indication of specific customer service(s) to which the Determination applies, customer responsibilities under the Rules and Regulations, current recycled water pricing information, descriptive information about on-site facilities requirements necessitated by initial use or conversion to recycled water, the opportunity for objection to the Determination, and a proposed date for the subsequent Final Determination

Notice. The date of the Preliminary Determination Notice shall begin a time period of thirty (30) consecutive calendar days during which the prospective customer may file an objection to the Preliminary Determination Notice or any information presented in it.

## **§10422      Notice of Objection**

The prospective customer(s) may file a notice of objection with the District within thirty (30) consecutive calendar days of the date of any preliminary determination notice to the prospective customer(s), and may request reconsideration of the determination or modification of the proposed conditions or schedule for conversion. The objection must be in writing and specify the reasons for the objection.

The preliminary determination shall become final if the prospective customer(s) does not file a timely objection. Staff shall review the objection and shall confirm, modify, postpone or abandon the preliminary determination.

## **§10423      Final Determination Notice**

Upon issuance of a final determination by staff, the prospective customer(s) may appeal the determination to the General Manager of the District. The District shall issue a waiver to the prospective customer(s) where its objection or appeal is successful.

The District shall make final determination regarding recycled water service by written notice to the prospective customer(s). A sample Final Determination Notice is presented in Appendix 2. Such notice shall include as a minimum: reference to a predecessor preliminary determination notice, indication of specific customer service(s) to be affected by the determination, and the requirement of and timing for on-site facility construction. Upon receipt of final determination that a property shall be served with recycled water, the prospective customer(s), owner, or applicant shall obtain a Use Permit. The date of the final determination notice shall begin a 180 consecutive calendar day time period during which the prospective customer(s) must obtain the Use Permit, complete on-site facility construction and become ready to receive recycled water service.

## **§10430      USE PERMIT**

### **§10431      Application for Recycled Water Service Process**

A prospective customer of recycled water must submit to the District an application for recycled water service. An application form is included in Appendix 4. The application shall include a preliminary application package and plan with the application form. The prospective customer of recycled water shall contact the District to obtain information regarding HGL and pressure zone, water service and meter sizes, locations, use site number, hydrologic subarea, and recycled water quality. The following items are to be included in an application package and plan:

- Completed application form.
- Required drawing(s) showing the specific recycled water use areas and the on-site irrigation systems, as a minimum, as required by Section 10530 of this document (Plan Requirements).
- Required fees and deposits – due prior to approval.

The applicant shall agree to comply with the Rules and Regulations by signing the application form.

The District shall review the material and respond within two (2) weeks of receipt of a completed application package. The District may request additional information it deems necessary. The District shall determine if the property to be served is in a suitable area for recycled water use, and if the necessary quantity and quality of recycled water can be made available to the applicant.

#### **§10432      Use Permit Submittal Process**

Once the preliminary approval is granted by the District, the owner or customer can proceed with the preparation of the plans and submittal of the Use Permit. The Use Permit form is included in Appendix 5. Submitted along with the Use Permit form shall be: the completed irrigation plans for construction or retrofit; the work schedule for construction or conversion; and the required fees and deposits. The use site number (provided by the District) and customer account number shall be the Use Permit numbers for general reference purposes.

The following is a summary of the steps for obtaining the approved Use Permit:

- Applicant/Owner/Customer submits plans, irrigation plans, work schedule and required fees along with Use Permit;
- District reviews and approves plans and finalizes Recycled Water Service Application;
- District obtains DDW and OCHCA approval; as necessary;
- Applicant/Owner/Customer has operator (installation contractor/maintenance contractor) complete Operation Certification portion of the User Permit and submits form to District;
- On-site pre-construction meeting scheduled (applicant begins construction/retrofit of on-site facilities);
- District issues recycled water Use Permit;
- On-site construction is completed (except recycled meter is not installed);
- Potable water backflow prevention devices installed and tested (if applicable prior to water service activation);
- Applicant submit redline construction set of record drawings to the District for review;
- Applicant has a final set of record drawings prepared and submits all required documents to the District;
- Applicant requests final inspection by the District;
- District performs final inspection, operational testing, and cross-connection testing;

- Recycled water meter is installed; and
- District grants final approval for recycled water service and completes Use Permit.

The checklist/action request form summarizing the steps for obtaining recycled water service is included in Appendix 3.

The District will submit the following types of recycled water projects to the DDW and OCHCA for review and approval prior to their construction:

1. New recycled water infrastructure projects that are co-located adjacent to drinking water facilities (i.e. reservoirs, main trunk lines, etc.);
2. Recycled water treatment plant upgrades;
3. Retrofit recycled water use sites; and
4. New recycled water use sites.

#### **§10433      Use Permit Requirements and Force**

The customer who has obtained a Use Permit shall adhere to requirements prescribed by the Rules and Regulations and to additional and future requirements prescribed by the District or governing agencies pertaining to recycled water service.

The Use Permit shall come into force after the on-site project has begun construction and is being inspected by the involved regulatory agencies. The Use Permit shall be the binding agreement between the District and the customer.

A copy of the current Use Permit must be on file at the customer's office and available for review at all times.

#### **§10434      Use Permit Life**

The Use Permit shall stay in effect indefinitely, but may be temporarily or permanently revoked if:

- A change of customer occurs and the customer has not notified the District via the Recycled Water Service Application form Appendix 4 of the impending change thirty (30) consecutive calendar days prior to change;
- A change of operator occurs and the customer has not notified the District via the Recycled Water Use Permit form, Appendix 5 of the pending change thirty (30) consecutive calendar days prior to the change;
- A change of recycled water use occurs inconsistent with the Use Permit; and
- A violation occurs and results in termination of service.

A new completed Recycled Water Service Application form, refer to Appendix 4, must be submitted to the District to reinstate a Use Permit that has been cancelled.

## **§10440      SUBMITTALS AND RECORDS**

### **§10441      Facility Layout Documents**

Facility layout drawings shall be submitted as specified within Section 10500 of this document (Technical Requirements) by the customer to the District and approved by the District prior to commencing any installation of facilities.

The drawings shall be signed by the design consultant and shall include the construction of the use area, and the on-site irrigation system, as a minimum. A materials list shall also be submitted to the District and it shall include the following:

*Off-site or On-site Distribution Facilities* - The diameter, approximate length, and construction material of all offsite or on-site distribution recycled water mains (pressurized).

*On-site Storage Facilities* - The estimated number and locations of fixed storage tanks or ponds and the approximate volume of each.

*Recycled Water Volume* – The maximum and average amounts in gpm that will be drawn from the District's recycled water distribution system, and the hours of operation.

### **§10442      On-site Irrigation Systems Design Documents**

On-site irrigation systems design criteria and plans shall be submitted as specified within Section 10500 of this document (Technical Requirements) by the customer to the District and approved by the District prior to commencing any installation of facilities. The plans shall include the meter criteria and the District's Standard Notes as a minimum.

### **§10443      Final Record Drawings and Documents**

Final Record drawings shall be submitted to and approved by the District before a request for regular service start-up is made. The final record drawings shall include the following:

- *“As-Built” Changes* - All changes in the work constituting departures from the original design drawings, including changes in both pressure and non-pressure lines, number or location of spray heads, bubbler or drip systems, buildings or hardscape, shall be accurately recorded on one set of drawings. At the end of each working day, it shall be mandatory that the contractor record all work accomplished for that day on the set of drawings in red ink. The final set of record drawings shall be professionally drafted, to the satisfaction of the District, in ink on Mylar for future photo processing and reproduction. Throughout the construction process, the red line copy shall be available to District upon request.
- *Dimensioning* - All dimensions shall be taken from two permanent points of reference such as buildings, monuments, sidewalks, curbs or hardscape.
- *Record Drawings* - For the purpose of reference, record drawings shall be available at all times.

- *Control Charts* - Shall be prepared and submitted with the record drawings, and approved by the District before a request for final inspection is made. The chart submittals shall include the following:
- *Chart Requirement* - 11" x 16" color control charts, one set for each point of connection.
- *Chart Scale* - Each chart shall be a reduced record drawing of each sheet of all irrigation systems. The final controller sequence shall be clearly legible, as determined by the District, at the reduction chosen.
- *Chart Coloring* - Each chart shall use a different color to show the area of coverage for each valve station/lateral system shown.

#### **§10444      Temporary Service Connection**

Prior to being placed into service, a temporary service connection using potable water (protected by a reduced pressure backflow device) may be used to supply water to on-site facilities to permit the testing of all or a portion of the facilities during installation. The temporary service connection must be approved by the District prior to its installation and is valid for 180 consecutive calendar days. The inspector shall be notified at least 48 hours in advance of such intended use of potable water.

No recycled or potable water use from offsite to on-site facilities is allowed for sites being designed for potable or recycled water until all water meters, meter boxes, and backflow prevention assemblies have been installed, tested, and inspected. On-site cross connection testing must be completed to the satisfaction of the District, prior to any meter releases.

Contact the District to energize the water service angle stop to facilitate the testing of the backflow assemblies for testing purposes only. Backflow assembly test results are to be submitted to the District.

#### **§10450      REPORTING**

Certain reporting or notification between the parties involved with the use of recycled water may be conducted in person or by telephone. The District must report any cross connection incident to the DDW, OCHCA, and the RWQCB within 24 hours of the incident.

The customer shall report any violation of the Rules and Regulations and/or noncompliance that may endanger public health or the environment. Any such information shall be provided orally to the District immediately after the customer becomes aware of the circumstances. A written submission shall also be provided within five days of the time the customer becomes aware of the circumstances.

The written submission shall contain a description of the noncompliance and its cause; photographs documenting the non-compliance; the period of noncompliance, including exact dates and times; and if the noncompliance has not been corrected, the anticipated time it is expected to continue; and steps taken or planned to reduce, eliminate, and prevent recurrence of the noncompliance.



The District may waive the written report on a case-by-case basis if the oral report has been received within twenty-four (24) hours. The following occurrences(s) must be reported to the District immediately:

- Any situation that may endanger the public's health or the environment;
- Discovery of a cross connection of a recycled water system with a potable water system must be reported immediately to the District;
- More than minimum unplanned or uncontrolled discharge of recycled water resulting from water line breaks, malfunctioning control system, or any other circumstances;
- More than minimum discharge of recycled water outside of the approved use area due to on-site line breaks, runoff, direct spray, overspray or windblown spray, or outside the regular hours of operation for any reason; and
- Discharge of recycled water at a construction site in an unapproved manner or in an unapproved area.

#### **§10460      UPGRADES/ALTERATIONS/REPAIRS**

Upgrades or alterations to recycled water irrigation systems, non-potable irrigation systems, and potable water systems on recycled water use sites must be approved and inspected by the DDW, District, and/or OCHCA. Prior to commencement of work, record drawings must be revised and submitted to the District for approval. Any upgrades or alterations made to a recycled water irrigation system or potable water system on recycled water use sites, that are not inspected or follow stated notification procedures, places the customer/owner and the irrigation system in violation of the Rules and Regulations. Any upgrade or alterations performed and backfilled without District inspection shall be exposed at the customer/owner's expense for inspection and compliance. Penalties may apply, including, but not limited to, termination of service.

Repairs to irrigation systems and potable water systems on recycled water use sites, other than the typical sprinkler head repair, must be completed to the satisfaction of and inspected by the DDW, District, and OCHCA. The District must be notified immediately when a repair is made. Any repairs performed and backfilled without District inspection shall be immediately exposed at the customer/owner's expense for inspection and compliance. Any on-site repairs that are not immediately inspected or follow stated notification procedures, places the customer/owner and the irrigation system in violation of the Rules and Regulations. Penalties may apply, including, but not limited to, discontinuation/termination of service.

#### **§10500      TECHNICAL REQUIREMENTS**

##### **§10510      GENERAL**

All offsite and on-site recycled water facilities shall be designed and constructed according to the requirements, conditions, and specifications of these Rules and Regulations. The recycled water system, including both offsite and on-site facilities, shall be separate and independent of any potable water system. Any required backflow prevention devices on

potable water services and flow or pressure control devices shall be downstream of the meter and provided by the applicant, owner, or customer at his expense.

Any recycled water distribution system facilities determined by the District to be required to provide service within developments of the property within the District shall be provided by the applicant, owner, or customer at his expense unless otherwise approved by the District.

The District will assume responsibility for providing water and recycled water service to the point of connection of such development upon transfer to the District of title of all offsite facilities in the required systems and any necessary easements therefore. All easements shall be in a form acceptable to the District and not subject to outstanding obligations to relocate such facilities or any deeds of trust, except in instances where such is determined by the Board or the General Manager to be in the best interests of the District.

Modification or relocation of the meter or other facility which results in nonconformance with the applicable provisions of these Rules and Regulations is prohibited and shall be corrected at the expense of the applicant, owner, or customer. Upon failure or refusal of the applicant, owner, or customer to make such correction, the District may, after providing reasonable notice to the applicant, owner or customer, make the correction and charge the applicant, owner or customer for the cost of doing so.

Any on-site recycled water facilities shall be provided by the applicant, owner, or customer at his expense. The applicant, owner, or customer shall retain title to all such on-site facilities.

## **§10520      ON-SITE IRRIGATION SYSTEMS**

### **§10521      Design Responsibility**

The design of an on-site irrigation system that will use recycled water, including the preparation of plans and construction specifications, shall be under the responsibility of a design consultant. On-site recycled water facilities, in addition to conforming to these Rules and Regulations, shall conform to local governing codes, rules and regulations. The Cities of Laguna Woods, Laguna Hills, Aliso Viejo, Lake Forest and Mission Viejo shall have authority over materials, equipment, design, and construction methods used for on-site recycled water facilities within their jurisdiction, provided that when the District's Rules and Regulations require a higher quality material, equipment, design or construction method than required by the above local governing codes, rules and regulations, the District's Rules and Regulations shall be controlling.

### **§10522      Provisions for Recycled Water**

In those areas where recycled water is not immediately available for use when the area is ready for construction, an approved backflow prevention assembly shall be required for any potable water use. This assembly shall be provided, installed, and tested at least annually by the customer. All maintenance of the on-site backflow prevention assembly shall be the responsibility of the customer. In those cases where the District uses a master backflow prevention assembly at the intertie between the recycled water

distribution system and the potable water system, the District may waive the requirement for the customer to install an on-site approved backflow prevention assembly.

Only the District, or the customer in accordance with District's requirements and under the approval and inspection of the District, shall remove said backflow prevention assembly and make the connection to the recycled water distribution system when recycled water becomes available. At such time, if the District removed the assembly, District shall return the assembly to the customer. The District shall determine all points of connection to the District's offsite facilities.

Backflow prevention assemblies are not required on recycled water irrigation systems after service has begun with recycled water. However, backflow prevention assemblies may be required on irrigation systems using recycled water, on a case-by-case basis as determined by the District. Backflow prevention assemblies required by the District on recycled water systems shall be clearly identified by painting the assemblies purple Pantone 512 and/or installed in protective enclosures. The District shall test these recycled water backflow prevention assemblies annually with dedicated testing equipment, used only for recycled water backflow prevention assemblies.

The District shall make notification of all action taken with backflow prevention assemblies to the DDW and/or OCHCA.

#### **§10523      Service Line**

The District reserves the right to specify the amount, size, and location and/or type of all offsite facilities. The recycled water service lines shall be extended to a location in compliance with the District's standard drawings or a curb line of the customer's property abutting upon a public street, highway, road or utility easement in which recycled water mains are installed.

#### **§10524      Service Pressure**

The pressure zone/hydraulic grade line shall be as provided by the District. The design consultant must prepare and submit a hydraulic worksheet indicating hydraulic constraints. When offsite system pressures are inadequate or exceed demands, the addition of booster pumps and/or pressure regulators shall be the responsibility of the owner.

#### **§10525      Design Application Rates**

The on-site irrigation system shall be designed to apply irrigation water in a manner compatible with the infiltration rates of the soil types within the approved use area. Evidence that infiltration rates have been assessed shall be included with the design. Where varying soil types are present to the extent that they cannot be adequately addressed by separate zones (hydrozone), the design of the irrigation system shall be compatible with the lowest infiltration rate present.

Average and maximum application rates. All irrigation systems must not exceed the District's values for flat and slope areas. The developer or applicant shall submit his calculations confirming that the irrigation system, as designed, meets the below

requirements. The District will perform the necessary calculations to confirm the application rates meet these requirements:

|             |                          |             |
|-------------|--------------------------|-------------|
| Flat area:  | Average Application Rate | 15 gpm/acre |
|             | Maximum Application Rate | 20 gpm/acre |
| Slope area: | Average Application Rate | 10 gpm/acre |
|             | Maximum Application Rate | 15 gpm/acre |

#### **§10526      System Layout**

The irrigation system shall be designed based on peak-application rate requirements to prevent discharge onto areas that are not approved for use. Adjustable arc, adjustable radius sprinklers with anti-drain/check valves shall be used adjacent to roadways, boundary lines, and hardscape to confine the discharge from the irrigation system to the design area. Recycled water leaving the planting areas, whether by direct overspray, ponding, runoff, or windblown spray, shall be minimized. Drainage devices under control of the owner shall be installed at the toe of slope and shall not traverse or discharge unto adjacent single family residential lots. Drainage devices must stand-alone; slope drainage devices shall not be tied into any other drainage systems, e.g., private systems for single-family lots.

For new developments, the on-site irrigation system shall be required to automatically shut off in the event of a line break. Utilize all available equipment to prevent unauthorized discharge of recycled water. For sites being retrofitted, it is recommended but not required to have the irrigation system automatically shut off in the event of a line break. See Section 10528 of this document ("System Control Devices").

The irrigation system design shall avoid spray patterns that include obstructions that tend to concentrate recycled water to produce ponding and/or runoff, such as direct or indirect spraying against structures or objects.

No common trenching with other utilities of any kind is permitted.

The District reserves the right to limit the area of land under one ownership or homeowner's association to be supplied by one recycled water service connection and corresponding meter. A recycled water service connection and its corresponding meter shall not be used to supply adjoining property of a different owner, without the approval in writing from the District stating conditions and restrictions; such as easements or MOU (memorandum of understanding).

Irrigation systems where landscaping around homes and in common areas served with one meter and owned by the same customer, e.g., a homeowner's association, may be allowed to cross roads, streets, or other public right-of-ways within the customer's property. When a property provided with a recycled water connection and corresponding meter is subdivided, such connection and meter shall be considered as serving the lot or parcel of land on which the meter is located. Additional recycled water mains and/or recycled water service lines shall be required for all subdivided areas in accordance with the Regulations.

For properties of the same customer, irrigation systems shall be allowed to cross roads, streets, or other public rights-of-way to serve medians and slopes along streets. For properties under the ownership and control of other parties, a recorded easement shall be mandatory. A copy shall be issued to the District.

All recycled water used on any property must pass through the meter. Customers shall be held responsible and charged for all recycled water passing through the water meters.

## **§10527      On-site Separation Requirements**

Horizontal Separation: The pressurized recycled water piping shall maintain a minimum of a four (4) foot horizontal separation at all times from all potable water piping. If a four (4) foot horizontal separation is not possible, special construction requirements shall be considered, refer to District Standard Detail Drawing IRR-8. Common trench construction is prohibited.

Vertical Separation: Vertical separation of new construction shall be located from the ground surface in order of descending quality. Potable water shall be above recycled water. Minimum vertical separation shall be one (1) foot between the top and bottom surfaces of the pipes. Exceptions to this general rule are as follows:

- On irrigation systems where intermittently pressurized recycled water lines (laterals) serve sprinkler heads, the potable water may be placed under the recycled water lateral. No special construction requirements are necessary provided that one (1) foot vertical separation is maintained.
- On sites using pressurized irrigation laterals with valve-in-head sprinklers, the potable water line may be placed under the recycled water laterals if additional protection is provided for the potable water line. Common practices include sleeving the potable water line with PVC pipe a minimum of four (4) feet each side of the crossing.
- If the new potable water line must be installed below an existing constant pressure irrigation/recycled water line, then the potable water line shall be installed within a protective sleeve. The sleeve shall extend a minimum of four (4) feet each side of the centerline of the irrigation/recycled water line, for a total of ten (10) feet. The sleeve shall be identified as potable water (blue identification tape).
- If a constant pressure recycled water line must be installed above a potable water line or less than twelve (12) inches below a potable water line, then the recycled water line shall be installed within a protective sleeve. The sleeve shall extend a minimum of four (4) feet from each side of the centerline of the potable water line, for a total of ten (10) feet. The sleeve shall be identified as recycled water (either purple PVC or purple warning tape).

Non-Compliance Separations: All pressurized main constructions that do not meet the horizontal or vertical separations requirements of the California Waterworks Standards must be reviewed and approved by DDW.

## **§10528      System Control Devices**

Every newly constructed recycled water service line shall be equipped with an angle meter stop on the inlet side of the meter and ball valve on the discharge side of the meter, located within a District maintained meter box. The angle meter stop and ball valve are to be used only by District personnel to control the recycled water supply through the service line. If the angle meter stop, meter, ball valve, meter box, meter lid, or touch reader equipment is damaged by the customer or his use of recycled water to an extent requiring replacement, then the customer shall bear full financial responsibility for repair and replacement.

The newly constructed on-site irrigation system shall be required to automatically shut off in the event of a line break. A master valve in conjunction with an irrigation controller and flow sensor shall be used to provide automatic system shut down in the event of excessive flow. Retrofitted and converted onsite irrigation systems may be required to install this equipment, as described above, if there is a history of unauthorized discharges.

For retrofitted and converted irrigation systems, the District recommends the installation of a master valve and flow sensor to automatically shut off the irrigation system in the event of a pipeline break, but it is not a requirement.

## **§10529      Identification Requirements**

Any sites that contain multiple water systems within the site (i.e.: potable water for domestic purposes; potable water for fire systems; non-potable water for irrigation purposes; and recycled water for irrigation purposes) will require identification of the on-site facilities to clearly distinguish one from another. Colors and materials used for the identification of all water/recycled water piping, appurtenances, equipment, storage facilities, and approved used areas shall be in accordance with these Rules and Regulations.

**Recycled Water Signs:** All sites using recycled water shall have a minimum of two recycled water caution signs installed at locations agreeable to the site owner, the District, DDW and OCHCA. The quantity of signs and their location are determined by the quantity and location of the general public's access to the recycled water use area. The final quantity and location must be determined and approved by the District and DDW/OCHCA. Signage size and wording shall be in accordance with the specifications of these Rules and Regulations and shall be approved by the District and the site owner. Signs shall be a minimum of 9" by 12" in size, and at a minimum, include the wording "**Recycled Water – Do Not Drink**" and display the international symbol shown on Figure 60310-A in Title 22 of the California Code of Regulations. See the sign detail as part of the District's Standard Detail Drawing IRR-11.

**Identification of On-site Facilities:** On sites with recycled water or other water systems, all facilities will need to be identified in order to clearly distinguish one from another.

Therefore, the following, as a minimum, will be required:

- The exposed portion of recycled water pipelines, valves, and other appurtenances shall be painted purple, or installed with purple warning tags to distinguish clearly that it is a recycled water facility;
- All new unexposed recycled pipes shall be identified as well. PVC pipe shall be purple and metallic pipe shall be installed with purple warning tape;
- All recycled water outlets shall be posted with bilingual precautionary purple warning tags or labels with the wording “**Warning – Recycled Water – Do Not Drink**”, and “**Aviso Agua Impura – No Tomar**”;
- Main shut-off valves shall be clearly identified to distinguish between recycled water, potable water and non-potable water systems.
- The exposed portion of potable water pipelines, valves, and other appurtenances shall be painted blue, or installed with blue identification tags to distinguish clearly that it is a potable water facility;
- All new unexposed potable water pipes shall be identified as well. PVC pipe shall be blue or white with blue identification (warning) tape and metallic pipe shall be installed with blue identification (warning) tape;
- The exposed portion of non-potable water pipelines, valves, and other appurtenances shall be painted green, or installed with yellow warning tags to distinguish clearly that it is a non-potable water facility; and
- All new unexposed non-potable water pipes shall be identified as well. PVC pipe and metallic pipe shall be installed with green warning tape.

**Recycled Water On-site Identification Requirements:**

- All new buried on-site recycled water irrigation piping shall be marked as follows: PVC Pipe must be purple-colored PVC pipe with continuous wording “Caution – Recycled Water – Do Not Drink” printed on opposite sides of the pipe. The use of continuous lettering on 3-inch minimum width of purple tape with 1-inch black or white contrasting lettering bearing the continuous wording “Caution – Recycled Water – Do Not Drink” permanently affixed at five (5) foot intervals atop all horizontal piping, laterals and mains is an acceptable alternative to purple pipe.
- All new recycled water piping above ground or in vaults, including adapters and fittings, shall be installed with purple warning tags to distinguish clearly that it is a recycled water facility or painted purple in color (Color Code Pantone 512).
- All new valve boxes (gate valves, manual control valves or electrical control valves) on the recycled water irrigation system shall be purple (Pantone 512) and have the words “Recycled Water” in white letters on top.
- Purple background warning labels stating “**Attention – Controller Unit for Recycled Water**”, and “**Atencion – Unidad Controladora Del Agua Recuperada**”, will need to be attached to the cover of all irrigation controller units.

- All recycled water appurtenances including the irrigation valve boxes (gate valves, quick coupler valves, manual control valves or electrical control valves) shall have a purple warning tag affixed to them.

Tags shall be weatherproof plastic, 3" by 4", with purple background and black lettering stating "**Warning – Recycled Water – Do No Drink**", and "**Aviso Agua - Impura No Tomar**", on one side and the "Do Not Drink" logo on the other side. One tag will be attached to each device with a nylon tie wrap.

#### Potable Water On-site Identification Requirements:

All new buried on-site potable water piping shall be identified as potable water using a blue color code differentiating them from recycled water piping. This identification shall be done by using blue PVC pipe or installing blue identification (warning) tape as described below:

- All PVC domestic water piping shall be blue colored PVC pipe or shall be white with blue stenciling appearing on both sides of the pipe with the marking "Domestic Water" in 5/8-inch letters repeated every twelve (12) inches. Blue identification (warning) tape identifying the PVC pipe as domestic water line and stating "Caution – Domestic Water" may be used as an alternative to the blue or stenciled PVC pipe. The tape shall be attached to the pipe with plastic tape banded around the warning tape and pipe every five (5) feet on center.
- All new copper or ductile iron piping carrying potable water shall be identified with blue identification (warning) tape. The identification (warning) tape shall be blue in color with the words "**Potable Water**" imprinted in minimum of one-inch high letters, black or white in color. Imprinting shall be continuous and permanent. Identification (warning) tape shall be a minimum of three (3) inches in width and shall run continuously for the entire length of all constant pressure piping. The tape shall be attached to the top of the pipe with plastic tape banded around the identification (warning) tape and the pipe every five (5) feet on center.
- All new potable water piping above ground or in vaults, including adapters and fittings, shall be painted blue in color. Black or white stenciling shall appear on both sides of the pipe with the marking "Caution – Domestic Water" in 5/8-inch letters repeated every three (3) feet.
- All potable water appurtenances including the potable water valves shall have a blue identification tag affixed to them. All potable water valves boxes (main valves or shut-off valves) shall have one tag placed on the valve within the valve box. Tags shall be weatherproof plastic, 3" by 4", with blue background and white or black lettering stating "**Potable Water**" on one side and "**Agua Para Tomar**" on the other side. One tag will be attached to each device with a nylon tie wrap.



Potable Water Used for Irrigation (Non-Potable Water) On-site Identification Requirements:

All new buried on-site non-potable water piping shall be identified as non-potable water using a green color code differentiating them from recycled water and potable water piping. This identification shall be done by installing green warning tape as described below:

- All new PVC or ductile iron piping carrying non-potable water shall be identified with warning tape. The warning tape shall be green in color with the words “**Non-Potable Water**” imprinted in minimum of one-inch high letters, black or white in color. Imprinting shall be continuous and permanent.

Warning tape shall be a minimum of three (3) inches in width and shall run continuously for the entire length of all constant pressure piping. The tape shall be attached to the top of the pipe with plastic tape banded around the warning tape and the pipe every five (5) feet on center.

- All non-potable water appurtenances including the non-potable water valves shall have a yellow warning tag affixed to them. All non-potable water valves boxes (gate valves, manual control valves or electrical control valves) shall have one tag placed on the valve within the valve box. Tags shall be weatherproof plastic, 3” by 4”, with yellow background and white or black lettering stating “**Non-Potable Water**” on one side and “**Agua Impura No Tomar**” on the other side. One tag will be attached to each device with a nylon tie wrap.
- All non-potable water irrigation quick coupling valves shall be a one (1) piece 1-inch ACME thread with a vinyl locking effluent cover and shall have a tag affixed to them below the locking lid. Tags shall be weatherproof plastic, 3” by 4”, with yellow background and white or black lettering stating “**Non-Potable Water**” on one side and “**Agua Impura No Tomar**” on the other side. One tag will be attached to each device with a nylon tie wrap.

**§10530**      **Plan Requirements**

Facility layout drawings shall be signed by the design consultant and shall include the construction of the use area, and the on-site irrigation system, as a minimum. This drawing shall indicate the exact boundaries of the site of the proposed recycled water use at a scale that includes the site and the nearest paved surface street containing a recycled water distribution main. These drawings shall be submitted by the customer, or their representative, to the District and approved by the District prior to commencing any installation of facilities.

Plans shall include a vicinity index map, indexed site map for each sheet and shall include major street crossings, street names, and point of connection. The title sheet shall show the legal description of the property. Plans shall include the irrigation system design, notes, appurtenance details, and legends without separate attachments. The size of the plans shall be consistent for the project, and for new construction, shall be full size (24” by 36” or 22” by 34”). The plans shall be signed by the design consultant and shall be submitted to the District for review and approval. The District’s signature block shall be included on the Title Sheet of the plans.

The following shall be shown on the plans, as a minimum:

- Potable and recycled water mainline and valve locations within the surrounding streets;
- All potable, fire, non-potable and recycled water lines;
- Specific recycled water use areas;
- Specific non-potable water use areas;
- Specifically state on the plans **if** there is no potable water on the site;
- Location of all wells;
- Location of all streams and water bodies;
- Location of all sewer facilities;
- Equipment legends;
- Locations and descriptions of all backflow prevention devices;
- Location and size of all service connections and meters, including fire protection;
- Show all fire hydrants and all fire protection facilities;
- Show all buildings;
- Show hardscape (including walls, fencing, drainage devices);
- Show all play areas and equipment, ball field layouts and courts;
- Designate all exterior eating areas, including tables, benches and barbeques;
- Location of all water features; and
- Location of drinking fountains and restrooms.

The following specific call-outs shall be shown on the irrigation plans:

- Points of connections;
- Routing of irrigation supply lines and all related appurtenances;
- Gate valves;
- Sprinkler control valves;
- Quick coupling valves;
- Routing of control wires;
- Irrigation controllers;
- Remote control valves;
- Irrigation pumps, piping and appurtenances; and
- All irrigation-related appurtenances.

**§10531      Meter and Irrigation Criteria**

The following irrigation meter criteria information shall be included in each set of plans adjacent to each recycled water meter:

- Tract and Lot Numbers or Parcel Map Number;
- User Site Number (to be provided by the District);
- Meter Size;
- Elevation (highest to the lowest elevation of the site to be irrigated);
- Zone/HGL of the property (to be provided by the District);
- Point of Connection Static Pressure (to be provided by the District);
- Required Dynamic Pressure On-site;
- Average Application Rate (gpm/acre);
- Maximum Application Rate (gpm/acre);
- Area Served (acres irrigated); and
- Annual Irrigation Water Use (acre ft/year).

A legend shall be included on the plans showing the irrigation criteria including the pertinent data for the materials used in the irrigation system. The legend shall include a pipe schedule listing pipe sizes, type of materials of construction, the quantity of quick coupling valves, and all related appurtenances including their size, model number and description. All controller timing charts shall show maximum hours of operation per day.

**§10532      Standard Recycled Water Notes**

As a minimum, the following standard notes shall be listed on the plans.

1. The design, installation, identification and use of all on-site potable water systems, fire protection systems, potable water used for irrigation systems (non-potable irrigation), and recycled water irrigation systems shall conform to the District's Rules and Regulations, all State and County guidelines, articles, and codes regarding the design, installation, identification, use and maintenance of on-site systems and protection of the public's health. The Contractor shall have a copy of these plans and the District's Standard Specifications on the job at all times.
2. No construction shall take place without all required approvals and signatures on the plans.
3. The District shall be furnished with three (3) copies of the approved construction plans prior to the starting of construction. A mandatory pre-construction meeting shall be held on the jobsite a minimum of 24 hours prior to the start of construction. No work shall take place without a pre-construction meeting on-site.

4. The District's inspector shall be notified a minimum of two working days (48 hours) prior to construction, or any inspection.
5. All potable and recycled water meters, backflow assemblies, and related appurtenances shall be installed, inspected, and tested per the District's Specifications and/or Rules and Regulations before any recycled water use can take place.
6. All typical recycled water services shall be constructed per District's Standard Detail Drawing IRR-12. Downstream of the recycled water meter shall be a customer service valve. The customer service valve shall be "ball valve" type and provided with a lever-type turn handle.
7. On-site Separation Requirements, as specified within the District's Rules and Regulations, shall be maintained at all times. The following is a brief summary:

*Horizontal Separation:* The pressurized recycled water piping shall maintain a minimum of a four (4) foot horizontal separation at all times from all potable water piping. If a four (4) foot horizontal separation is not possible, special construction requirements shall be considered, refer to District Standard Detail Drawing IRR-8. Common trench construction is prohibited.

*Vertical Separation:* Vertical separation of new construction shall be located from the ground surface in order of descending quality. Potable water shall be above recycled water. Minimum vertical separation shall be one (1) foot between the top and bottom surfaces of the pipes. If a one foot vertical separation is not possible, special construction requirements shall be considered, refer to District Standard Detail Drawing IRR-8 for these requirements as well as for the exceptions to this general rule.

8. Quick coupling valves on the non-potable water system (potable water used for irrigation) shall be 3/4-inch and of the same type and manufacturer and shall not be interchangeable with quick couplers on the recycled water system which shall be 1-inch. The quick couplers will need to have yellow warning tags attached and the covers labeled (and/or yellow in color).
9. Quick coupling valves on the recycled water system shall be 1-inch and of the same type and manufacturer and shall not be interchangeable with quick couplers on the non-potable water system which shall be 3/4-inch. The quick couplers shall be a one (1) piece 1-inch ACME thread with a vinyl locking effluent cover and shall have a purple warning tag affixed to them below the locking lid. ***For locations where 3/4-inch quick couplers were previously installed on a recycled water system, they shall be replaced with 1-inch upon failure or any other site improvement requiring replacement.***
10. All hose bibs on the potable water system shall be installed with a potable water identification tag and shall have a brass hose bib vacuum breaker device installed. No hose bibs will be allowed on the recycled water system.

11. Quick coupling valves on the recycled water irrigation mainline may be required to be removed at the end of the maintenance period, if requested by the District and/or OCHCA. If the quick coupling valves are required to be removed, the District shall determine the manner of removal.
12. All drinking fountains will need to be protected from contact with recycled water, whether by windblown spray or by direct application through irrigation. Some may be located to meet this requirement; others will need to be constructed with protective structure as required by DDW and OCHCA.
13. Adjust all sprinkler, impact and rotor heads and drip systems to minimize direct overspray, windblown spray, ponding and runoff, onto non-irrigated areas.
14. The installation of internal, external, or in-line anti-drain valves are mandatory to prevent low-head drainage immediately after the remote control valve has closed.
15. Any deviations from the signed and approved set of plans must be approved in writing prior to installation by the design consultant and the District.
16. Any revision must be submitted to the design consultant and the District for approval. Failure to comply will result in a "STOP WORK NOTICE".
17. Final coverage tests must be performed and passed before a final release will be issued. Direct overspray, windblown spray, ponding, and runoff onto non-irrigated areas are to be minimized.
18. Cross-connection tests shall be performed on all water systems, including existing and future recycled water irrigation systems, and all potable and non-potable water systems, as determined by the District prior to the use of recycled water. All cross-connection tests must be performed and passed before a final release will be issued.
19. The entire irrigation system and its appurtenances, as well as all on-site facilities and appurtenances shall be inspected and reviewed by the District. Final inspections/site reviews must be performed and passed by the District and OCHCA before a final release will be issued.
20. Unless directed otherwise by the District, recycled water system regular hours of operation are as follows:
  - Turf areas and center street medians: between 10:00 p.m. and 6:00 a.m.;
  - Slopes and ground cover/shrub areas: any hour (if no potential public contact);
  - Golf courses: between 9:00 p.m. and 5:00 a.m.
  - Golf courses: fill impoundments between 5:00 a.m. and 6:00 p.m.

The consideration for potential public contact with recycled water shall take precedence over all recycled watering schedules. All irrigation systems run times shall be adjusted to minimize contact with recycled water on an individual lateral system basis. The District may require specific run times and durations where there is a history of public contact.

21. The following information must be submitted to the District before a final release will be issued:
  - a. One complete set of District approved blueline or bond record plans. (NOTE: All record drawing information must be reviewed and approved in writing by the design consultant and the District before producing the final plans for submittal to the District.) Final record plans shall be professionally drafted as determined by the District.
  - b. One complete set of District approved record drawings. One complete set shall include cover sheet, irrigation sheets, and all irrigation details and note sheets.
  - c. One 11" x 16" color control charts, one set for each point of connection.
  - d. Completed District backflow investigation and test reports for all backflow prevention assemblies on site. Submit to the District.
  - e. Certificates of substantial compliance, calibration, acceptance and/or proper installation/ operation of the irrigation system and appurtenances as deemed necessary by the District.
  - f. Completed District recycled water Use Permit for each recycled water point of connection.
22. Failure to comply with any of the prior provisions and/or any other of the Rules and Regulations will place the system in violation of the Rules and Regulations and will result in a stop of work notice and/or termination of recycled water service until appropriate corrective steps have been taken.

The following Recycled Water General Notes for Site Owner Maintenance Staff shall be included on the plans:

1. It shall be the responsibility of the site owner's maintenance staff to ensure that all operations personnel are trained in and familiarized with the use of recycled water, and are familiar with the District's Rules and Regulations for Recycled Water Service. A copy of these Rules and Regulations shall be kept by the designated Site Supervisor on site at all times.
2. The operation and surveillance of the on-site recycled water system shall be under the management of the On-site Supervisor designated by the site owner.

3. Recycled water service area shall be restricted to those areas explicitly approved by DDW and OCHCA and as shown on these plans.
4. All recycled water irrigation sprinkler heads shall be adjusted by the site owner's maintenance staff to eliminate or to control to the greatest extent possible overspray onto non-landscaped areas including but not limited to buildings, sidewalks, parking lots, asphalt areas and roads.
5. Conditions that directly or indirectly cause a run-off of recycled water outside of the approved recycled water use area, or cause ponding of recycled water or permit windblown spray to pass outside of the approved use area, whether by design, construction practice, or system operation, shall be eliminated or controlled to the greatest extent possible with the use of the best practicable technology and methodology.
6. Cross-connections between the recycled water system and the potable or non-potable water systems are strictly prohibited.
7. Hose bibs on the recycled water system are strictly prohibited.
8. The operation of the recycled water system shall be during periods of minimal use of the recycled water service area by the general public (typically 10:00 p.m. to 6:00 a.m.), unless directed otherwise by the District.
9. The site owner's maintenance staff must obtain prior approval from the District's Cross-connection inspector for all proposed changes and modifications to any on-site facilities including modifying the recycled water service area.

#### **§10540      ON-SITE RECYCLED WATER RETROFIT PROCEDURES**

The District may require an existing customer to retrofit an existing on-site irrigation water service facility to accommodate recycled water service. This determination will require a comprehensive investigation to be performed by or for the District.

The facilities to be converted to recycled water shall be investigated on a case-by-case basis, in detail, including review of any record drawings, preparation of necessary field work, preliminary cross-connection and coverage testing, and determinations by the District of measures necessary to bring the facility into full compliance with these Rules and Regulations for Recycled Water Service. After District approval, DDW and OCHCA shall also review and approve all conversions in accordance with these Rules and Regulations and the Use Permit application process. No existing on-site potable water facilities shall be connected to or be incorporated into the recycled water system without the District and other regulatory agencies testing and approval.

As a minimum, the retrofit of a potable water system to a recycled water system shall require:

- Identification of all existing on-site above grade pressure pipelines, valves, and appurtenances in accordance with requirements of these Rules and Regulations for new construction of recycled water systems;
- Installation of an approved air gap in accordance with requirements of these Rules and Regulations and subject to cross-connection control tests required in order to prevent cross connection or contamination of a potable water system at any location where it is proposed to retain a connection to a potable system. If a connection to the potable system is proposed to supplement the recycled water system when needed, an air gap shall be installed. The air gap may be substituted by a swivel ell as described in the CCCPH;
- Performance of dye test or pressure tests to determine existence of cross connection with all on-site potable water systems;
- Submittal of as-built record drawings package; and
- Completion and submittal of Recycled Water Services Application and Use Permit.

The District also recommends installation of a master valve and flow sensor to automatically shut off system in the event of a pipeline break, but it is not a requirement.

#### **§10541      Recycled Water Retrofit Procedures**

The following are retrofit procedure requirements that shall be adhered to by the owner. The District will provide coordination and inspection assistance in retrofitting these irrigation systems. (All onsite retrofit costs/expenses shall be the owner's sole responsibility.)

1. Submit to the District a completed application for recycled water service.
2. Submit to the District one set of irrigation plans and/or a record drawing of the site showing irrigation system, and all potable water systems on-site. See Section 10543 of this document ("Retrofit Plan Requirements") for specific requirements.
3. Preliminary site inspections are intended to inform the owner of the site identification, backflow prevention, on-site separation requirements, and other issues regarding the retrofit of the use site to recycled water.
4. Preliminary coverage tests are intended to assure compliance with District Rules and Regulations regarding direct spray, windblown spray, overspray, ponding, and runoff. Irrigation sprinkler heads may be required to be replaced and/or plant materials trimmed or removed to accomplish the Rules and Regulations.
5. Preliminary cross-connection tests are required to assure that no cross connections exist between the irrigation systems and any potable water sources. See Section 10690 of this document ("Cross-Connection Test") for Cross-



Connection Testing Procedures. Any cross connections found between potable water systems and future recycled water systems shall be eliminated prior to retrofit.

6. A recycled water point of connection and irrigation system(s) shall serve only one property as recorded with the County of Orange.
7. Remove existing quick-coupling valves per District regulations or change out to brass ACME thread recycled water style quick-coupling valves. The locking cover shall be purple rubber or vinyl with the following information stamped or molded into the cover:
  - “Recycled Water” in English and Spanish;
  - “Do Not Drink” in English and Spanish; and
  - The international “Do No Drink” symbol (glass of water in a circle with a slash through it).
8. Remove all existing hose bibs whose water source is supplied by the irrigation system to be retrofitted. (Hose bibs are prohibited on recycled water systems.)
9. Attach purple recycled water warning tags in English and Spanish to all recycled water appurtenances. (Remote control valves, quick couplers, gate valves, wye strainers, etc.)
10. Identify all above ground pressure and non-pressure recycled water piping, as recycled water by attaching purple recycled water identification labels to the piping at five foot intervals.
11. Identify all sprinkler, bubbler, or drip system risers with purple recycled water identification labels in English and Spanish.
12. Install check valves below any sprinkler head or bubbler head where run-off occurs after the control valve has been shut down. Note: The Owner has the option to replace affected sprinkler heads with recycled water style heads that have built in check valves and purple recycled water identification caps. Minimize runoff after the control valve has been shut down.
13. All on site pressurized recycled water mainlines are required to maintain minimum horizontal and vertical separations from all pressurized potable water piping, and sanitary sewer systems as specified directed by the District.
14. To locate irrigation and other potable water lines, wire tracing, electronic testing/tracing or other methods shall be required. Suspect piping shall be required to be exposed for verification of separation requirements.
15. All exposed potable and recycled water piping shall have appropriate identification/warning tapes attached to them, to the satisfaction of the District.

16. Sleeving of mainlines may be used under certain circumstances to address the separation issues in areas near fire hydrants, backflow assemblies, and potable water lines and services as directed and approved by the District.
17. Common trenching is prohibited. The relocation of pressurized potable water lines may be required to meet District separation requirements.
18. Pressurized potable water piping shall be required to be relocated if minimum separation requirements cannot be met. In some cases, the pressurized recycled water piping may be relocated in place of the potable water piping as determined and approved by the District.
19. Potable water service points of connection shall have backflow prevention assemblies as determined by the District. All backflow assemblies must be tested before recycled water is used on site. (Submit the completed test reports to the recycled water inspector.)

District minimum requirements for public water supply backflow protection are as follows: approved reduced pressure principal assemblies for all potable water points of connection; and double-check detector check assemblies for all potable water fire protection points of connection. Other backflow prevention devices may be required, to protect public health, as determined by the District.

The only exception, to the above requirements, is the retrofit of homeowner association sites where recycled water is being proposed to irrigate common area on a portion of a single family residence. If the backflow protection of the District's potable water supply is not feasible or practicable, the District, with DDW's approval, may increase the required frequency of the cross connection testing in lieu of the construction of the backflow device at each residence. The waiving of the backflow protection will only be allowed on a case by case basis and only if approved in writing by DDW and the District.

20. Mark or identify all valve box lids per District's Rules and Regulations to identify them as recycled water, potable water, or non-potable and type of appurtenance enclosed. Other valve boxes or enclosures shall be identified as "Recycled Water", "Potable Water", or "Non-Potable", and as directed by the District. Bolt down all valve box covers with stainless steel bolts and washers.

Green valve box covers utilizing recycled water shall be identified as recycled water use by attaching purple 1 1/4" x 5 3/4" recycled water identification valve box name plate (or changed out to purple recycled water valve box and covers).

21. Attach blue "Potable Water" identification tags or yellow "Non-Potable Water" warning tags, in English and Spanish, to all potable water exterior appurtenances and potable water used for irrigation appurtenances. (Remote control valves, gate valves, backflows, etc. and as directed by the District)

22. Identify all above ground potable water, potable water used for irrigation pressure piping, and potable water used for irrigation non-pressure piping, and irrigation system risers as "Non-Potable Water" by attaching yellow identification labels stating "Non-Potable Water" in English and Spanish, at five foot intervals, and as directed by the District)
23. Protect drinking fountains from recycled water by placing drinking fountains away from recycled water areas or protecting the drinking fountains to the satisfaction of DDW, the District, and OCHCA .
24. Drinking fountains, buildings and other potable water appurtenances shall be protected from potable water quick-coupling valves, if any, when they use the same main line by an approved RPPD backflow assembly, placed between the quick-couplers and drinking fountain or buildings. Backflow prevention assembly locations to be determined by the District.
25. All on-site exterior potable water hose bibs shall have brass hose bib vacuum breaker devices attached to them. Potable water identification (warning) tags shall also be attached to the hose bibs.
26. Any connections between potable water systems, non-potable water irrigation systems, and the recycled water systems are prohibited. It shall be mandatory to disconnect the irrigation system from the potable water meter and remove the backflow prevention assembly from the irrigation system prior to connecting the system to recycled water. This work shall be coordinated with the District's recycled water inspector who will coordinate with OCHCA.
27. Existing potable water used for irrigation meters will be removed from the potable water points of connection (POC) by the District following conversion. The owner of record is responsible for purchasing and installing new potable backflow public water supply protection, backflow assembly devices, at use sites where the existing potable water will need to remain in place for on-site use, following District specifications and procedures for installation.
28. Make the connection to the recycled water meter using purple PVC recycled water piping. The customer service valve, downstream of the recycled water meter, shall be a "ball valve" type and be provided with a lever-type turn handle.
29. Install a full port ball valve and a line size 80 mesh wye strainer or basket strainer with 80-mesh monel screen after the recycled water meter after the customer ball valve. Locations to be determined by the District.
30. Attach recycled water warning labels to controller door face and controller enclosure face.
31. Place a minimum of two (2) recycled water identification signs (1/16" aluminum, 9" x 12") in locations designated by the District. Additional signage may be necessary due to site considerations and access.

32. The irrigation controller shall operate recycled water systems only. (Example: a single controller cannot operate a potable water irrigation system and a recycled water irrigation system). All systems must remain separate. The District may make special consideration(s) on a case-by-case basis.
33. Submit to the District record irrigation drawings and record drawing information for all irrigation systems receiving recycled water as well as any non-potable water systems, potable water systems and/or potable water used for irrigation systems within the same use site as required within Section 10530 of this document ("Plan Requirements").
34. Prior to activating recycled water service, the District will perform final inspection and final coverage tests to assure compliance with District Rules and Regulations. Included in the final inspection are cross connection tests to assure that no cross connections exist between the recycled water irrigation system and any potable water sources.
35. Operate and maintain the irrigation system in the same operating conditions as it was when the District issued its final release. Comply with all District's Rules and Regulations regarding the use of recycled water.
36. District's regulations require quarterly on-site testing and maintenance reports to be completed and available to the District. See Section 10770 (Recycled Water Irrigation System Maintenance Report) of this document for the specific requirements.
37. Notify the District when any revision, upgrade, alteration or repair is anticipated or performed to the recycled and potable water used for irrigation systems, on-site potable water systems, or their related components. The District must approve all plans concerning changes to on-site recycled water systems, potable water used for irrigation systems, and all potable water systems. Inspections for all the above changes are mandatory.
38. Certain precautions should be taken when recycled water is used. Please see Section 10739 of this document ("On-site Notifications") for recommended on-site notifications that recycled water is in use on the site.
39. The District is required to monitor all recycled water use sites for compliance with District Rules and Regulations. If a violation occurs, a recycled water violation notice will be issued to the owner of record and/or the onsite supervisor, who is responsible for the particular use site. The District must be notified orally or in writing of the steps taken to correct the violation 48 hours within receipt of the report. Noncompliance with this regulation will result in termination of recycled water service and a re-connection fee will be charged in order to reestablish service.

On-site conditions that endanger the public's health will require immediate termination of all water services until corrections have been made to the satisfaction of the District and appropriate regulatory agencies. See Section 10700 of this document (Operational Requirements).

40. Any Homeowners Association shall notify its members advising them of the fact that recycled water is being used for irrigation in the area and to ask the members for their assistance in notifying the Association of any main line breaks, broken heads, direct spray, windblown, or overspray onto private property, ponding, run off, or any damage to the irrigation systems.
41. Any questions regarding on-site retrofits requirements should be addressed to the District's Recycled Water Coordinator at 949-837-0660.

#### **§10542      On-site Irrigation System Requirements**

The requirements included within 5.2 of this document ("On-site Irrigation Systems") shall apply to the on-site recycled water retrofits except as modified herein.

Within Section 10529 of this document ("Identification Requirements"), add the following requirements for retrofit projects:

- Existing valve boxes (gate valves, manual control valves, or electrical control valves) found on the recycled water system can be branded in the center of the cover with the letters "Recycled Water" in lieu of replacement with a purple cover. Letters must be a minimum of ½".
- All existing line valves located on the recycled water system shall have their covers painted purple in lieu of replacing with a new valve cover.
- Existing valve boxes (main valves or shutoff valves) found on the potable water system can be branded in the center of the cover with the letters "Potable Water" in lieu of replacement with new covers identified for potable water. Letters must be a minimum of ½".
- Existing valve boxes (gate valves, manual control valves, or electrical control valves) found on the non-potable water irrigation system can be branded in the center of the cover with the letters "Non-Potable Water". Letters must be a minimum of ½".
- On a case-by-case basis, the District will evaluate the existing quick coupling valves to determine if the quick coupling valves on the recycled water irrigation system will need to be replaced with the recycled water quick coupling valve specified within these Rules and Regulations. The key is that the existing quick coupling valves shall not be interchangeable with quick couplers on the non-potable water system and that only trained operations/maintenance personnel will be able to use the existing quick coupling valves.

### **§10543      Retrofit Plan Requirements**

The retrofit plans shall be designed by the design consultant and shall include the on-site modifications required to accommodate the conversion of the existing irrigation facilities to recycled water. The plans shall indicate the exact boundaries of the site of the proposed recycled water use at a scale that includes the site and the nearest paved surface street containing the recycled water and potable water distribution mains. These drawings shall be submitted by the customer/owner to the District and approved by the DDW, District and OCHCA prior to commencing any installation of facilities.

Plans shall include a vicinity index map, indexed site map for each sheet and shall include major street crossings, street names, and point of connection. The title sheet shall show the legal description of the property. The size of the plans shall be consistent for the project and can be reduced in size (11" x 17") but the various water/fire/recycled piping shall be distinguished from each other by having different colors. The plans shall be signed by the design consultant and shall be submitted to the District for review and approval. The District's signature block shall be included on the Title Sheet of the plans.

The following shall be shown on the plans, as a minimum:

- Potable and recycled water mainline and valve locations within the surrounding streets;
- All potable, fire, non-potable and recycled water lines (color coded);
- Specific recycled water use areas;
- Specific non-potable water and recycled water use areas;
- Specifically state on the plans **if** there will be no longer any potable water on the site;
- Location of all wells;
- Location of all streams and water bodies;
- Location of all sewer facilities;
- Locations and descriptions of all backflow prevention devices;
- Location and size of all service connections and meters, including fire protection;
- Show all fire hydrants and all fire protection facilities;
- Show all buildings;
- Show hardscape (including walls, fencing, drainage devices);
- Show all play areas and equipment, ball field layouts and courts;
- Designate all exterior eating areas, including tables, benches and barbeques;
- Location of all water features; and
- Location of drinking fountains and restrooms.

The following specific call-outs shall be shown on the irrigation plans to the best possible understanding of the existing facilities:

- Points of connections;
- Routing of irrigation supply lines and all related appurtenances;
- Gate valves;
- Sprinkler control valves;
- Quick coupling valves;
- Routing of control wires;
- Irrigation controllers;
- Remote control valves;
- Irrigation pumps, piping and appurtenances; and
- All irrigation-related appurtenances.

The plans shall also include all of the meter and irrigation criteria stated in Section 10531 of this document ("Meter and Irrigation Criteria") and the all of the Standard Recycled Water Notes stated in Section 10532 of this document ("Standard Recycled Water Notes").

#### **§10544      Submittals**

The following information must be submitted to the District before a final release will be issued:

- One complete set of District approved record drawings;
- 
- 11" x 16" color control charts, one set for each point of connection (See Typical Retrofit Plan Standard Drawing for minimum requirements to be shown, for sites with no existing record drawings or plans.) All record drawings shall be dimensioned. All dimensions shall be taken from two permanent points of reference, such as buildings, monuments, sidewalks, curbs, or hardscape. (Final record drawings shall be professionally drafted, to the satisfaction of The District.)

NOTE: (Submit Redlines for approval by District, prior to submitting the items listed above.)

#### **§10545      General Recycled Water Retrofit Construction Sequence**

The following is a summary of the general recycled water retrofit construction sequence:

1. Construct potable water meter protection, recycled water service lateral and meter facility (with no meter), recycled water tags, labels, quick couplers, remove and replace irrigation hose bibs with recycled water quick coupling valves, brand all irrigation valve box lids, and construct recycled water identification signs.

2. Perform cross-connection test. Notify the District to coordinate the cross-connection test with the on-site maintenance, operations personnel, the District staff, DDW and OCHCA. Provide the temporary connections required to perform this cross-connection test.
3. Obtain the DDW and OCHCA approval. The District will be the point of contact with these agencies.
4. Coordinate with the District the installation of the new recycled water meter within the meter box.
5. Remove the existing backflow protecting the irrigation system at each connection location and construct the pressure reducing valve assembly, if required, only after receiving direction from the District.
6. Perform the irrigation coverage test with the new recycled water system pressure.
7. Remove the existing service saddle at the potable water main and install a repair clamp. The potable water service abandonment requirements will be confirmed by the District on a case-by-case basis.

**§10546      Conversion from Recycled Water Use**

If, due to on-site failure of the recycled water system, or use violations, District determines it necessary to convert on-site facilities from a recycled water supply to a potable, or other water supply, it shall be the responsibility of the customer to perform conversion, unless determined otherwise by the District. Prior to District approval, the DDW and OCHCA shall review and approve all conversions. As part of the conversion effort, the customer shall:

- Isolate the recycled water supply. Service shall be removed and plugged at the recycled water main or abandoned in a manner approved by the District or his designated representative;
- Installation and testing approved backflow prevention assemblies. The customer shall install approved backflow prevention assemblies on all potable, recycled water, or other water meter connections;
- Remove any/all special recycled water quick couplers. The customer shall be responsible for replacement with quick couplers approved for potable water systems;
- Notify all on-site personnel involved;
- Remove all recycled water identification labels/signs, tags, and tapes where possible. Change out branded valve box lids, to the satisfaction of the District; and
- Provide required disinfection of all recycled water systems as mandated by appropriate regulatory agencies, and to the satisfaction of the District.



## **§10550      CONSTRUCTION WATER FACILITIES**

### **§10551      Service Connections**

Service connections for the construction use of recycled water may be provided by the District at locations as convenient as practicable to the customer, but at the discretion of the District.

The service shall include a valve connection to a recycled water distribution main and water meter whose capacity shall be determined by the District from information supplied by the customer in the application for recycled water service. The customer shall make the connection to the main in accordance with the District's requirements. The meter box, if applicable and the meter shall be supplied by the District and installed by the customer in accordance with District's requirements.

### **§10552      On-site Distribution Facilities**

Transmission lines for conveying recycled water from the metered service connection to a storage container or water distribution vehicle shall be of adequate size and structural integrity to ensure that leaks or ruptures will not occur during normal construction activity. The customer shall provide these on-site distribution transmission lines. Lines crossing construction roadways or other areas receiving regular vehicular traffic must be buried to a depth of at least 18 inches for pipes less than 2 inches in diameter or a minimum of 24 inches deep if pipe diameter is 2 inches or greater. All lines shall be sleeved with Class 200 pipe twice the diameter of the line. Rigid pipe able to withstand the planned vehicular loads shall be employed for such installations. All piping and appurtenances shall be identified as recycled water to the satisfaction of the District.

### **§10553      Storage Facilities**

Recycled water storage tanks and distribution vehicles shall be of adequate design and structural integrity to ensure that leaks or ruptures will not occur in the course of normal use. The customer shall provide these tanks or ponds. All storage ponds and any storage tanks not supported more than six feet above ground-level shall be contained within a fence or other enclosure that will restrict access by the general public to these facilities at all times when operations personnel are not present. Outlet control with positive shut-off shall be provided at each storage facility with mandatory District approved air gaps. All storage tanks shall be identified as recycled water to the satisfaction of the District.

All recycled water storage facilities owned and/or operated by the customer shall be protected against erosion, overland runoff, and other impacts unless it is a result of a 25-year frequency, 24-hour storm event, as defined by the Orange County Flood Control Agency.

### **§10554      Distribution Vehicles**

Vehicles used for distributing recycled water for soil compaction and dust control shall be provided with adequate tanks and plumbing systems to ensure that leaks and ruptures will not occur in the course of normal use. A District-approved air gap is mandatory. Control

valves shall be provided such that the recycled water can be applied in a controlled fashion on the approved use area and completely retained during transit in all other areas. Spray heads or nozzles shall be provided and configured such that the discharge is uniformly distributed and runoff, ponding, or windblown overspray conditions minimized. All distribution vehicles shall be identified as recycled water to the satisfaction of the District.

**§10555      Identification**

Identify all meters, valves, piping, storage tanks, water buffalos, distribution vehicles and impoundments utilizing recycled water shall be identified as recycled water to the satisfaction of the District.

**§10560      PROTECTIVE MEASURES**

The general backflow protection provisions are included within Section 10345 (Backflow Prevention) of these Rules and Regulations.

During application for recycled water service, the applicant must provide sufficient information, including plumbing and building plans, to enable the District to determine the level of backflow protection required. The proper backflow protection, as determined by the District and approved by DDW and OCHCA, shall then be installed, inspected, and tested before recycled water service is provided.

The customer, on-site supervisor, owner, tenant, or operator shall notify the District not less than 30 days prior to a change of use regarding potable or recycled water. District will then reassess the level of protection required. Any and all proposed alterations or upgrades to existing on-site water facilities must be reported to and approved by the District prior to the proposed change.

At their discretion, representatives of the District, DDW, and OCHCA may conduct surveys of property where the District provides water service. These surveys are to determine if any actual or potential cross-connections exist. The customer shall provide full cooperation including manpower in facilitating these surveys.

Where protection is required, backflow protection in accordance with the CCCPH and approved by DDW for potable water supplies shall be provided as follows:

- Each District water service connection that supplies potable water to a parcel having a recycled water supply shall be protected against backflow from the parcel into the potable water to the satisfaction of the District.

The only exception to the above requirement is the retrofit of homeowner association sites where recycled water is being proposed to irrigate common area on a portion of a single family residence. If the backflow protection of the District's potable water supply is not feasible or practicable, the District, with DDW's approval, may increase the required frequency of the cross connection testing in lieu of the construction of the backflow device at each residence. The waiving of the backflow protection will only be allowed on a case by case basis and only if approved in writing by DDW and the District.

- Backflow protection may be required at parcels where there has been a history of cross-connections to recycled water supply being re-established.

Water meters used for recycled water service shall be tagged, color-coded, or otherwise distinguished as such in accordance with these Rules and Regulations. These meters shall not be interchanged or used for potable water service after repairs and/or meter testing has been performed.

## **§10600      CONSTRUCTION SPECIFICATIONS**

### **§10610      GENERAL CONDITIONS**

All offsite water and recycled water facilities that will be ultimately owned by the District shall be designed and constructed according to the requirements, conditions, and standards of the District, including the District's Standard Specifications and/or Drawings.

All on-site irrigation facilities shall be designed by the design consultant for the owner and shall meet the requirements, as a minimum, of Section 212-2 of the Standard Specifications for Public Works Construction, latest edition. In addition to this minimum requirement, the design of the on-site irrigation facilities shall conform to local governing codes, rules, and regulations. The Cities of Laguna Hills, Laguna Woods, Aliso Viejo, Lake Forest and Mission Viejo shall have authority over the materials, equipment, design, and construction methods used for on-site recycled water facilities within their jurisdiction, provided that when the District's Rules and Regulations or Standard Specifications and/or Drawings require a higher quality material, equipment, design or construction method than that required by the above local governing codes, rules, and regulations, the District's Rules and Regulations or Standard Specifications and/or Drawings shall be controlling.

The following details and specifications for customer construction specifications that are use specific, such as for irrigation, are intended as examples of current use practice, and are not intended to preclude other approved uses, which may require case-by-case specifications.

All construction work for on-site recycled water facilities shall be in conformance with these Rules and Regulations, and addendums thereto. Work is to begin only after the contractor, installer, or customer has obtained approval in the form of signed plans or revisions for recycled water use from the District (issued a Use Permit) and the District has received approval from the DDW and/or OCHCA.

### **§10611      Trade Names or Approved Equivalents**

The contractor shall be permitted to supply any of the specified materials or to offer for approval by the design consultant and the District equivalent materials in accordance with the appropriate section of the Rules and Regulations, and the District's Standard Specifications/Drawings.

**§10612      Permits and Licenses**

Except as otherwise provided, the contractor shall procure all permits and licenses, pay all charges and fees, and give all notices necessary and incidental to the due and lawful prosecution of the work.

**§10613      Liability**

Neither the District, the General Manager, the Director of Engineering, nor any other officer, member of the Board of Directors of the District, SARWQCB, DDW, OCHCA, employee or authorized agent of the said agencies shall be personally responsible for any liability arising out of the work performed. The customer shall procure and maintain for the duration of the construction period certificates of general liability insurance and workmanship insurance in forms and amendments approved by the District and naming the District, SARWQCB, DDW, OCHCA and all the agencies/individuals as additional insurers.

**§10614      Loss and Damage**

Neither the District, the SARWQCB, DDW, OCHCA, nor authorized representatives thereof shall be answerable or accountable in any manner for any loss or damage that may happen to the work or any part thereof; or for any material or equipment used in performing the work; or for injury or damage to any person(s), either workmen or the public; or for damage to adjoining property from any cause whatsoever during the progress of the work or at any time before or after final acceptance.

**§10615      Legal Responsibility**

The contractor shall keep fully informed of all laws, ordinances and regulations that in any manner affect those engaged or employed in the work or the materials used in the work, or that in any way affect the conduct of the work, and of all such orders and decrees of bodies or tribunals having any jurisdiction or authority over the same. If any discrepancy or inconsistency is discovered in the plans, drawings, specifications, or other documents in relation to any such law, ordinance, regulations, order, or decree, the contractor shall forthwith report the same to the design consultant and the District in writing.

The contractor shall observe and comply with and shall cause all of the contractor's agents and employees to observe and comply with all such existing and future laws, ordinances, resolutions, regulations, orders and decrees, and shall protect and indemnify the District, SARWQCB, DDW, OCHCA, and all their officers and agents against any claim or liability arising from or based on the violation of any such law, ordinance, regulation, order or decree, whether by the contractor or contractor's employees.

The contractor shall also indemnify and save the District, its officers, its employees or authorized agents harmless from all costs, losses, expenses, damages, attorneys' fees, and other costs of defense that the District may incur with respect to or on account of the work, and with respect to the failure, neglect or refusal of contractor to faithfully perform the work and all of contractor's obligations under the contract. Such costs, expenses, and

damages shall include all costs incurred by the District to defend against any claims, stop notices or lawsuits based thereon in which the District is made a party.

The contractor shall observe the rules and regulations of the State, Department of Industrial Relations, Division of Industrial Safety, and, in particular, rules and regulations relating to shoring of trenches and excavations. All work shall be done in accordance with all directives, provisions and requirements pertaining to the method and manner of performing the work, in accordance with CAL-OSHA latest amendment or revision.

The contractor shall provide a job foreman present during working hours that can communicate effectively with District personnel both orally and in writing.

#### **§10616      Inspection Authority**

District shall at all times have access to all on-site work during construction and shall be furnished with such information as it may desire regarding location of facilities, the progress, workmanship and character of materials used in the work.

District shall have the authority to notify the customer of an apparent failure on the part of the contractor to carry out orders given or to perform any provisions of the plans or specifications. Upon its confirmation of the apparent failure, the customer shall be obligated to require the contractor to suspend the work wholly or in part. The contractor shall immediately comply with the written order of the District to suspend the work wholly or in part. Dependent on the nature of the non-compliance, it may require immediate action by the contractor via verbal order with a written order following. The work shall be resumed when methods or defective work are corrected as ordered and approved in writing by the District. Failure to comply with requests of the District will prevent further work, termination of all potable water and recycled water, and the final release of the entire project.

#### **§10620      MATERIAL SPECIFICATIONS**

##### **§10621      Identification Requirements**

Recycled water, potable water, and non-potable on-site identification requirements are specified in Section 10529 ("Identification Requirements") of these Rules and Regulations.

For all buried offsite recycled water pipelines (PVC, ductile iron pipe or copper) and any on-site recycled water pipelines that cross public streets, the pipelines shall have purple colored warning tape, minimum of twelve (12) inches wide, placed in the trench 12-inches above the pipe with the wording, "CAUTION: RECYCLED WATER LINE BURIED BELOW". This is in addition to the identification on the recycled water pipeline required by Section 10529 ("Identification Requirements") of these Rules and Regulations. This requirement is to provide additional warning for any excavation activities within the public streets to hopefully minimize the potential for damaging the recycled water pipeline.

**§10622      Color**

The color for recycled water identification (warning) shall be purple, color code Pantone 512.

**§10623      Buried Piping Identification (Warning) Tape**

The plastic warning tape shall be virgin low-density polyethylene specifically formulated for prolonged underground use. The minimum thickness shall be 4 mils and the overall width of the tape shall be 12-inches for 8-inch or larger diameter pipe and 6-inches for 6-inch and smaller diameter pipe.

**§10624      Identification /Warning Tags**

Identification /warning tags shall be inert plastic film or polyurethane specifically formulated for prolonged exposure. The identification /warning tag shall incorporate an integral attachment neck and reinforced attachment hole. The size of the tag shall be 3-inch by 4-inch with a minimum thickness of 10 mils. Identification /warning tags shall be attached with heavy-duty nylon fasteners. The size, type of label and location will be dictated by each individual application and subject to acceptance by the District's representative. The minimum size shall be ½-inch letters. Tags shall be as manufactured by T. Christy Ent. (ID-Max-P2-RC009 for Recycled Water (purple) or ID-Max-B2-PW015 for Potable Water (blue) or ID-Max-Y2-NP012 for Non-Potable Water (yellow)) or approved equal. T. Christy Enterprises, Inc. is located at 655 E. Ball Road, Anaheim, CA 92805-3310 (phone: 800-258-4583; fax: 800-468-4583).

**§10625      Warning Labels**

Warning labels shall be a minimum of 3.5 mil flexible vinyl base with a permanent acrylic adhesive backing on a 90# stayflat liner. Both the background and legend shall be printed with a UV cured vinyl ink. The entire decal shall be clear flood over-printed for superior weathering and UV protection. The size shall be 3.5 inch by 4.4 inch for controllers, 2.5 inch by 8.25 inch for pumping equipment, and 1.25 inch by 5.75 inch for potable water decals. The controller warning label shall be as manufactured by T. Christy Ent. (Christy's Part No. 4100) or approved equal. The pumping equipment warning label shall be as manufactured by T. Christy Ent. (Christy's Part No. 4200) or approved equal. The potable water decals shall be as manufactured by T. Christy Ent. (Christy's Part No. 4300) or approved equal.

**§10626      Identification Signs**

Recycled water identification signs shall be made of 1/16-inch thick, minimum, aluminum and its size shall be 12-inches wide by 9-inches high, minimum. The signage size and wording shall be approved by the District and the site owner. At a minimum the wording shall include "Recycled Water – Do Not Drink" and display the international symbol shown on Figure 60310-A in Title 22 of the California Code of Regulations. Submit the final verbiage including colors to the District for review and approval prior to ordering the identification signs. The location of the sign placement shall be determined

in the field by the District, OCHCA and the site owner. An example of an approved sign is Christy's Part Number ID-Sign 4.5.

#### **§10627      Sprinkler Labeling/Tags**

For sprinkler risers located on slopes and/or in the vicinity of adjacent properties, the risers shall be installed with either sprinkler warning labels/warning tags or riser markers as is appropriate for each situation. The riser markers shall be Christy's Model #5100 for recycled water applications, and Christy's Model #5200 for non-potable water applications, or approved equal.

#### **§10628      Miscellaneous Irrigation Facilities**

- Recycled water identification products shall be used for irrigation piping, fittings and appurtenances where available.
- PVC sleeving shall be AWWA C-900 DR- 14 PVC pipe, or solvent weld joint, Class 200, 200 psi rated pipe or greater.
- All PVC pipe and fittings shall be installed below grade, except for ultra violet protected pipe and fittings.
- Water/garden hoses and hose appurtenances utilizing recycled water shall be purple in color with heavy-duty brass fittings. Hoses shall be continuously imprinted with "CAUTION: RECYCLED WATER – DO NOT DRINK" and rated at 150 psi working pressure. Hoses shall only be used for recycled water use. Potable water use at any time is strictly prohibited.
- Quick coupling valves may be required to be removed if they are used in contrary to District's Rules and Regulations or are located in an area that encourages unauthorized use. The manner of removal shall be subject to approval by the District. Quick coupling valves shall conform to the following:

*Rating* – Quick coupling valves for recycled water shall be 1 piece one-inch nominal size with brass construction, acme thread body and key, and a normal working pressure of 125 psi. All quick coupling valves for recycled water shall be of a design that prevents the quick coupler key (spike) from being used in potable water or non-potable water quick couplers.

*Cover* – The cover shall be permanently attached to the quick coupling valve. It shall be purple in color and made of rubber or vinyl with the following information stamped or molded on the cover: "Recycled Water" in English and Spanish; "Do Not Drink" in English and Spanish; or the international "Do Not Drink" symbol (a glass of water in a circle with a slash through it); and a locking cover.

- Ball valves required directly behind the meter box or above ground before the strainer shall be full port ball valves.
- All remote control valves, gate valves, quick coupling, drip valve assemblies, flush valve assemblies, manual drain valves, and pressure relief valves shall be installed in suitable valve boxes, complete with locking and hinged cover, or other approved secure enclosure. Recycled water valve boxes and covers must be

colored purple and have recycled water identification imprinted. All valve box covers shall be bolted down with stainless steel bolts and washers.

- Wye strainer/basket strainers shall have cast bronze or iron bodies. Screen shall be 80 mesh monel minimum, stainless steel screens. Automatic flushing is prohibited.
- Recycled water irrigation identification sprinkler heads shall be used whenever possible. All new irrigation heads shall have internal check valves.
- Adjustable-arc, adjustable-radius heads/nozzles shall be used whenever possible, and shall be mandatory at site perimeters, walks, play areas, along non-vegetated areas, hardscape, and near picnic tables/benches and drinking fountains.
- All risers shall be considered aboveground piping.
- All sprinkler heads shall be securely installed to minimize breakage utilizing sprinkler stabilizer systems and sprinkler ties.
- Install external check valves at all heads, bubblers, or lateral lines that exceed manufacture's internal check valve requirements. Minimize all irrigation runoff at each head or bubbler immediately after valve has closed by installing appropriate inline check valves to the satisfaction of the District.
- District recommends that all irrigation controllers be equipped with a rain sensor module that shuts down the irrigation system during rainy conditions. Exceptions to the above would be centralized irrigation systems utilizing a centrally located weather station.
- District recommends moisture sensors/ tensiometers on all newly constructed or retrofitted irrigation systems.
- Inline pressure regulators smaller than 3-inches in diameter shall have a cast bronze body. The screens shall be stainless steel. Pressure regulators may be utilized in place of the pressure-regulating feature as part of the master valve requirement.
- Recycled water master valve shall be a cast bronze or iron (cast iron valves shall be epoxy coated) pressure regulating (manually and electrically) contamination proof, self-flushing-cleaning style valves, and normally closed position valve. Only valves that utilize reverse flow and fail in the closed position shall be utilized.
- The recycled water flow sensor must be compatible with the controller and master valve. The flow sensor must have high flow shut off capability for all remote control valves and irrigation system mainlines.
- Recycled water remote control valves can have purple plastic or brass bodies and bonnets. Purple valve handles shall be used. The valves shall be contamination proof, self flushing-cleaning style valves. It shall be pressure regulating (manually and electrically) where required due to elevation changes, normally closed positioned valve. Only valves that utilize reverse flow and fail in the closed position shall be utilized.



## **§10629      Recycled Water Service Materials**

The recycled water service shall be constructed in accordance with the District's Standard Specifications and in accordance with the District's Standard Detail Drawing IRR-12. Copper pipe shall be Type "K" hard copper tubing. Copper fittings shall be copper conforming to ASTM B 75 and ANSI B16.22, with compression end joints ("Quick Joint Connections" manufactured by Ford. NO EQUAL). If bends are required, between the corporation stop and the 90 degree bend below the angle meter stop, due to vertical alignment or utility conflicts or if splices are required for long runs, solder end joints will be acceptable. Solder shall be tin-silver solder conforming to ASTM B32, latest revision, Grade Sn94, Sn95 or Sn96. This will be the only location where solder end joints will be acceptable. No splices shall be permitted between the 90 degree bend (compression grip bend) and the angle meter stop.

Corporation stops shall have a male iron pipe thread inlet and the outlet shall be a compression type connection with compression gasket and integral stainless steel gripper band (Quick Joint as manufactured by Ford, NO EQUAL). Corporation stops shall be of the "ball valve" type and rated for at a minimum 250 psi working pressure. Corporation stops shall be as manufactured by Ford FB-1000-7-Q-NL style, NO EQUAL. Angle meter stops shall be "ball valve" type and shall be rated for a minimum 250 psi working pressure. The inlet connection of the angle meter stop shall be a compression type connection with compression gasket and integral stainless steel gripper band (Quick Joint as manufactured by Ford). The outlet fitting shall be a meter flange with an EPDM drop-in meter gasket. Two-inch angle meter stops shall be provided with "slotted" holes for 2-inch or 1-1/2" flanged meter connections. Angle meter stops shall be of the "ball valve" type as manufactured by Ford BFA43-777W-Q-NL Style, NO EQUAL.

The customer service valve, downstream of the meter, shall be manufactured with a lever-type turn handle. Customer service valve shall be "ball valve" type and shall be rated for a minimum of 250 psi working pressure. The valve inlet connection shall be meter flange and the outlet connection shall be female iron pipe thread. Recommended customer service valve manufacture is Ford.

The meter box shall be reinforced polymer/plastic mortar meter box (17" wide by 30" long by 12" deep) and shall be provided with a cover with reading lid in two separate rectangular pieces. The meter box shall be manufactured by J&R, Inc., Armorcast Products Company, or Quazite Corporation, NO EQUAL.

## **§10630      Potable Water Plumbing**

In September 2006, the State Legislature passed Assembly Bill 1953 prohibiting the use of any pipe, pipe or plumbing fitting or fixture, solder or flux that is not lead free in the installation or repair of any fixture intended to convey or dispense water for human consumption. The prohibition has been in effect since January 1, 2010.

All potable water facilities shall be provided with materials that meet the lead free requirements as defined in AB 1953, and certified by an independent American National Standards Institute (ANSI) accredited third party, including but not limited to, NSF

International, as being in compliance with Section 116875 (g) of the Health and Safety Code as amended by AB 1953. Each shipment shall contain a copy of the certification that the item is lead free as defined by AB 1953.

#### **§10631      Construction Water Facilities**

All piping employed for the transmission of recycled water for construction purposes shall be in serviceable condition and free from leaks and structural faults. All joints shall be structurally sound and free from leaks.

All valves employed with facilities using recycled water for construction purposes shall be in serviceable condition, provide positive shutoff, and be free from leaks.

All storage tanks used for recycled water, whether fixed or mounted on distribution vehicles, shall be structurally sound and free from leaks. Approved air gaps are mandatory.

All distribution vehicles used for recycled water, shall be structurally sound and free from leaks. Spray heads or nozzles shall be provided and configured such that the discharge is uniformly distributed and runoff, ponding, or windblown overspray conditions minimized. All distribution vehicles shall be identified as recycled water to the satisfaction of the District.

#### **§10640      METHODS OF CONSTRUCTION**

##### **§10641      Offsite Potable and Recycled Water Facilities**

All offsite water and recycled water facilities that will be ultimately owned by the District shall be constructed according to the requirements, conditions, and standards of the District, including the District's Standard Specifications and/or Drawings.

##### **§10642      On-site Irrigation Systems**

All on-site irrigation facilities shall be constructed per the requirements of the design consultant for the owner and shall meet the requirements, as a minimum, of Section 308-5 of the Standard Specifications for Public Works Construction, latest edition. In addition to this minimum requirement, the construction of the on-site irrigation facilities shall conform to local governing codes, rules, and regulations. The Cities of Laguna Hills, Laguna Woods, Aliso Viejo, Lake Forest, and Mission Viejo shall have authority over the construction methods used for on-site recycled water facilities within their jurisdiction, provided that when the District's Rules and Regulations or Standard Specifications and/or Drawings require a higher quality construction method than that required by the above local governing codes, rules, and regulations, the District's Rules and Regulations or Standard Specifications and/or Drawings shall be controlling.

All onsite valves, valve boxes, valve markers and power supplies shall be installed in accordance with the requirements in the Rules and Regulations and local building codes.

Separation between on-site recycled water lines, potable water lines and non-potable water lines shall be in conformance with the requirements specified in Section 10527 ("On-site Separation Requirements") of these Rules and Regulations. Common trenching with other utilities or any other systems is strictly prohibited.

Identification /warning tape shall be installed directly on the top of the pipe longitudinally and shall be centered. The warning tape shall be installed continuously for the length of the pipe and shall be fastened to each pipe length by plastic adhesive tape banded around the pipe and warning tape at no more than 5-foot intervals. Taping attached to the sections of pipe before installing in the trench shall have a 5-foot minimum overlap for continuous coverage.

Identification/warning tags shall be firmly attached to appurtenances using heavy-duty nylon fasteners. One warning tag shall be attached to each appurtenances as follows: attach to valve stem directly or with plastic tie wrap; attach to solenoid valve directly or with plastic tie wrap; attach to valve cover with existing valve cover bolt or attach to the body of the relative appurtenance with a plastic tie-wrap. Warning labels (decals) shall be placed on all controllers and pumping equipment.

Recycled water lines, 1-½ inches and less in diameter shall be buried below grade with a cover of at least 18 inches. Recycled water pipelines 2-inches and greater shall be buried with a cover of at least 24 inches or 36 inches when potable water is used on-site.

Recycled water lines laid above grade shall be protected from thrust motion if such protection is determined to be required by the design engineer or inspector. To achieve such protection, utilize stabilizer systems.

#### **§10643      *On-site Construction Water Facilities***

All valves installed along the recycled water transmission pipeline and not attached to a rigid structure shall be protected from thrust motion if such protection is determined to be required by the engineer or inspector. To achieve such protection, metal stakes with wire or plumbers tape lashes shall be installed at all such valves. Alternative methods of protection from thrust motion may be approved by the engineer or inspector.

All distribution vehicles used for recycled water and not for drinking water, shall be structurally sound and free from leaks. All distribution vehicles shall be identified as recycled water to the satisfaction of the District.

All recycled water storage tanks shall be erected only on level ground. Provisions shall be made to prevent differential settling of the tank supporting structure. Approved air gaps are mandatory.

## **§10650      INSPECTION INCLUDING INSPECTION ITEMS**

### **§10651      General**

The inspection of the work shall not relieve the contractor of any obligations to complete the work as prescribed by the applicable specifications. Defective work shall be made good and unsuitable materials may be rejected notwithstanding the fact that such defective work and unsuitable materials or materials not as specified on the approved plans, that have been previously overlooked by the inspector and accepted. The installation and inspection of unsuitable materials or materials not as specified on the approved plans shall not be construed as acceptance, and modification to these specifications shall only be made by the District in writing.

### **§10652      Inspection Items**

The following is a summary of the general items, as a minimum, that will be inspected by the District:

- Attend pre-construction meeting on-site;
- Prior to backfilling all trenches so the piping identification can be verified;
- Identification/ warning tape (recycled, potable and non-potable);
- Meter and meter box setting;
- Mainline record drawing;
- Pressure test of any offsite piping;
- Valves (master valves, control valves, pressure regulating valves, downstream ball valve);
- Backflows and all wye or basket strainers (verify 80 mesh monel screens);
- Irrigation pumps;
- Valve box and cover identification;
- Quick coupling valve – locations and installation;
- Required identification: piping, riser pipe, sprinkler heads, etc.;
- External check valves – as necessary to prevent drainage after valve is closed;
- Site Identification Signs;
- Complete review of site and irrigation system installation;
- Submittal and approval of all calibration/test reports, certificates and written approvals;
- Submittal of letters of project acceptance from the irrigation designer and landscape architect;
- Coverage Tests;
- Record drawings' package review, and approval;

- Controller installation, and hours of operation;
- Moisture sensor/automatic rain shutoff calibration and operation;
- Fertilizer injector operation;
- Pressure regulator setting (per plan specifications); and
- Cross-connection testing on all potable, non-potable and recycled water points of connections.

#### **§10653      Construction Schedule**

If required by the District, the contractor shall submit a schedule to the District outlining his proposed construction operation. The contractor shall conform to the Rules and Regulations of the District regarding prior notification for inspection and deviations from the approved schedule.

#### **§10654      Notification and Approvals**

All work, on-site and offsite, shall be subject to inspection and approval, as required by the District in these Rules and Regulations and the District Standard Specifications. The contractor shall schedule with the District, DDW, and OCHCA, and all other regulating agencies for inspection on all on-site irrigation, potable, and fire systems. The contractor shall give due notice to the inspector in advance of backfilling so that proper inspection may be provided. Unless the District expressly states otherwise, the contractor in advance of any and all inspection requirements shall give a minimum of two (2) working days (48 hours) notice, whether for materials or construction work.

#### **§10655      Inspection Intervals**

All work shall be subject to inspection by the District and shall be left open and uncovered until approved by the District and OCHCA. Potholing of piping is strictly prohibited.

The contractor shall not proceed with any subsequent phase of work until the previous phase has been inspected and approved by the District Inspector. Record drawings must be updated daily prior to inspection.

#### **§10656      Final Inspection**

Following the completion of all construction work and the submittal and approval of record documents, calibration reports, certificates, and installation approvals, the Contractor shall request final inspection of the work. This request shall include the scheduling of the cross-connection and operational testing.

Before final acceptance, the District, accompanied by the Contractor's superintendent or foreman, will make a final inspection of all work.

**§10657      Construction Water Facilities Inspection**

The contractor or operator shall give the District a construction schedule prior to initiation of construction work.

Unless the District expressly states otherwise, the contractor or operator in advance of any and all inspection requirements shall give a minimum of two (2) working days (48 hours) notice, whether for materials or installation work.

The contractor or operator shall request final inspection of the work. Prior to use of recycled water, District approval must be obtained. Signage, labels, and air gap on truck tank must be installed. The Use Permit must be onsite and in vehicle.

**§10660      REVIEWS**

**§10661      District Offsite Facilities**

The contractor shall furnish the District with such information, as is required by the District's Standard Specifications and these Rules and Regulations, regarding the character and quality of materials used for all offsite water and recycled water facilities that will be ultimately owned by the District. The contractor shall submit all shop drawings and certifications as specified within the District's Standard Specifications.

All pipe and accessories shall be carefully inspected by the District and contractor for damage in transit. Any damaged or degraded pipe or fittings delivered and unloaded at trench-site shall be rejected and removed immediately by the contractor from the site of the work.

All new piping systems shall be subjected to a hydrostatic pressure test and all potable water mains shall be chlorinated for disinfection as specified within the District's Standard Specifications.

**§10662      On-site Irrigation Systems**

For the on-site irrigation systems, the District will focus its review on the identification requirements and any other specific items that are specified by these Rules and Regulations. The character and quality of the materials used for the irrigation system will be the responsibility of the design engineer and/or applicant/customer/owner of the property.

The contractor shall furnish the District with such information, as it may desire, regarding the character and quality of materials used. When requested by District, the contractor shall submit a certification that the product meets the requirements of these Rules and Regulations.

The on-site irrigation system shall be tested as required by the design engineer and/or landscape architect for the applicant/customer/owner of the property and as is required by the DDW, District and OCHCA .

**§10663      Construction Water Facilities**

For construction water facilities, the District will focus its review on the identification requirements and any other specific items that are specified by these Rules and Regulations. The character and quality of the materials used for the construction water facilities will be the responsibility of the design engineer and/or developer/customer/owner of the property.

The contractor shall furnish the District with such information, as it may desire, regarding the character and quality of materials used for those portions of the work that are dealing with the District's concerns as stated in these Rules and Regulations.

Installed pressure piping systems for the construction water facilities shall be subjected to hydrostatic testing as specified in the District's Standard Specifications. The hydrostatic test shall be administered by the inspector with the cooperation of the contractor. Before testing, the pipe and valves shall be staked if such protection from thrust motion has been determined to be required by the engineer or inspector. Any noticeable leaks shall be stopped and defective materials shall be replaced. Valves shall be operated during the test period.

Prior to final acceptance by the District, all construction water facilities shall be required to successfully pass an operational test as administered by the design consultant in the presence of the District inspector. The hydrostatic test for installed pressure piping systems in conjunction with a leak test of all storage tank installations shall constitute the operational test.

Any required corrections shall be noted in the form of a punch list and submitted to the contractor by the District for correction. Service startup shall not be authorized until all corrections are made to the satisfaction of the District.

**§10670      GENERAL TESTING**

**§10671      Offsite Facilities**

Prior to final acceptance by the District, all offsite water and recycled water facilities that will be ultimately owned by the District shall pass all testing requirements specified within the District's Standard Specifications. All testing shall be conducted in accordance with the District's Standard Specifications. The tests shall be conducted by the contractor in the presence of the District inspector. The scheduling of these tests shall be the responsibility of the contractor. The contractor shall provide adequate manpower.

Upon the successful completion of the required testing, the District will perform the final inspection in accordance with the District's Standard Specifications. All identification requirements will be reviewed and field inspected. As-built package will be reviewed and finalized. The District will note all required corrections in the form of a punch list issued to the contractor. Final acceptance of the offsite facilities will not be authorized until all corrections are made to the satisfaction of the District.

## **§10672      On-site Facilities**

Prior to final acceptance by the District, all on-site recycled and potable water systems shall pass an operational test within 30 days of the completed irrigation system installation. The test shall be conducted by the contractor in the presence of the District inspector and OCHCA. The scheduling of these tests shall be the responsibility of the contractor. The contractor shall provide adequate manpower.

The following items shall be examined:

- All items as stated in the final inspection requirements as summarized in Section 10652 ("Inspection Items") of this section of the Rules and Regulations;
- Operation and programming/set-up of the automatic controllers and related appurtenances;
- General operation and coverage of the irrigation system;
- Required backflow protection and all backflow test reports of the on-site potable water systems;
- Site and appurtenance identification requirements as determined by the District inspector;
- Cross-connection testing for points of connection; and
- As-built package review and submittal.

The District shall note all required corrections in the form of a punch list issued to the contractor. Regular service startup shall not be authorized until all corrections are made to the satisfaction of the District. Punch list is valid for 30 days only.

## **§10680      ON-SITE TESTING**

The following is a summary of the on-site checking and testing that the District will perform:

1. The site will be reviewed for the following recycled water identification requirements:
  - Recycled water meter warning tag;
  - Recycled water site identification signs;
  - Recycled water controller charts;
  - Recycled water use site identification number on controller enclosure;
  - Recycled water controller and above ground piping labels;
  - Recycled water warning tags for all appurtenances;
  - Identification/warning tape on below ground piping;
  - Recycled water valve box identification (tags, branding, etc.)



- Recycled water quick coupling valve locking purple cover and Acme thread; and
  - Recycled water sprinkler heads, bubblers, drip systems and riser identification labels.
2. Where potable water is used for irrigation (non-potable water), the following identification will be checked:
- Blue potable water meter identification tag;
  - Yellow non-potable water tag on the backflow assembly downstream ball valve;
  - Green non-potable water labels for controller and above ground piping;
  - Yellow non-potable water warning tags for all appurtenances;
  - Green warning tape on below ground piping;
  - Non-potable water valve box identification (tags, branding, etc.)
  - Yellow non-potable water identification and tags for quick coupling valves; and
  - Green non-potable water sprinkler heads, bubblers, drip systems and riser identification labels.
3. Where potable water is used for domestic purposes, the following identification will be checked:
- Blue potable water meter identification tag;
  - Blue potable water tag on the backflow assembly upstream ball valve;
  - Blue potable water identification tag for all exterior hose bibs;
  - Blue potable water identification for all exposed exterior piping;
  - Blue potable water identification tags for all appurtenances;
  - Blue potable water identification tape on below ground piping;
  - Potable water valve box identification (tags, branding, etc.)
4. Where potable water fire protection is on-site, the following identification will be checked:
- Blue potable water meter identification tag; and
  - Blue potable water tag on the backflow assembly upstream ball valve.
5. Coverage Testing:
- Operate all recycled water irrigation valves to verify minimum runoff, ponding, misting, and overspray;

- Eliminate direct spray onto all areas other than District approved irrigated area, especially those that there may be a possibility of public contact;
  - Identify and eliminate systems that irrigate areas not approved to utilize recycled water; and
  - All plant materials shall be trimmed, removed, or irrigation systems altered to prevent obstruction of the irrigation spray patterns, to the satisfaction of the District.
6. Cross connection testing:
- Follow all control testing procedures as summarized in Section 10690 (“Cross-connection Test”) of these Rules and Regulations. Contact the District Cross Connection Specialist if there are questions.
7. Verify use site conforms to the most current District approved as-built drawings.
8. Review Use Permit for contact information and on-site supervisor information.
9. Review recycled water testing forms included in the Appendix for all quarterly tests since last routine on-site inspection and testing.
10. Inquire with the on-site supervisor or his designated representative if any upgrades, alterations, or repairs have taken place on the use site since the last site inspection.
11. The District shall note all corrections in the form of a punch list issued to the on-site supervisor. It shall be the on-site supervisor's responsibility to contact the District for all corrections noted on the punch list within thirty (30) consecutive calendar days after issuance to avoid termination of recycled water service. Recycled water service will not be reconnected until all punch list items have been completed to the satisfaction of the District.

**§10690      CROSS-CONNECTION TEST**

Case I applies to cases where recycled water is the only water supplied to a site. Case II applies to where recycled water and potable water are being supplied to a site. The following are the steps required to perform the cross-connection control testing for each of these cases.

**§10691      Case I (Recycled Water used for irrigation – no other water sources on site)**

1. Verify and record the following:
- Owner address, site address, on-site supervisor, meter number, meter sizes and meter location;
  - Public and private backflow protection information, locations, and current test reports;

- Identification tags and labels for all meters, vaults, backflow assemblies, and related appurtenances;
  - Use site number on controller enclosure; and
  - List of all personnel in attendance and participating in testing.
2. Verify full irrigation system operation and pressure for all valves and sprinklers on the recycled water irrigation system.
  3. Deactivate Recycled Water System:
    - Turn off and lock service;
    - Customer shall open master valve manually (if any);
    - Attach "Cross Connection Testing in Progress" tag to water meter. Attach magnetic "cross connection testing in progress" label to controller door;
    - Run each control valve using irrigation controller, run all quick coupling valves; and
    - Customer shall turn off irrigation controller.
  4. Drain System - Reduce pressure to an acceptable level (approved by regulatory agency).
  5. Verify the water pressure does not exceed an acceptable level at the low points of the system.
  6. Start 48-hour cross connection test. Record start date and time. Notify on-site personnel recycled water irrigation system is to remain off for testing.
  7. Return to site a minimum of 48 hours after start of cross-connection test. Record end date and time.
  8. Verify the following conditions:
    - Angle stop is off and locked;
    - Master valve is open (in manual position);
    - Irrigation controllers are still off; and
    - Verify the system water pressure does not exceed an ("acceptable level") (as approved by the regulatory agencies) at the low point of the recycled water irrigation system.
  9. Complete report stating whether irrigation system passed or failed the cross connection test.

If system passed - District unlocks and turns on angle stop, the customer's on-site maintenance personnel are responsible for pressurizing the recycled water irrigation system, turning on controller, and returning the master valve back to the normal operating position.

If system fails - Angle stop shall remain off and locked. The District will notify customer, SARWQCB, DDW and OCHCA of cross connection. Locate source of cross connection. Eliminate cross connection. Retest all systems. Complete cross-connection report form. Other requirements may be required by the District as necessary on a case-by-case basis.

10. District will file cross-connection test report. Send copy to DDW and OCHCA and the owner, upon request.

**§10692      Case II (Recycled Water used for irrigation with potable water service on site)**

1. Verify and record the following:
  - Owner address, site address, on-site supervisor, meter number, meter sizes and meter location;
  - Public and private backflow protection information, locations, and current test reports;
  - Identification tags and labels for all meters, vaults, backflow assemblies, and related appurtenances;
  - Use site number on controller enclosure; and
  - List of all personnel in attendance and participating in testing.
2. Test each system in the following order:
  - A. Recycled Water used for irrigation systems;
  - B. Recycled Water non-irrigation systems;
  - C. Potable water used for irrigation systems (non-potable);
  - D. Potable water fire protection systems; and
  - E. Potable water systems.

**A. *Recycled Water Used for Irrigation Cross-Connection Test***

1. Verify full irrigation system operation and pressure for all valves and sprinklers on the recycled water irrigation system. Customer shall manually open master valve, if any on the recycled water irrigation systems.
2. Verify full water pressure at all recycled water non-irrigated systems.

3. Verify full irrigation system operation and pressure for all valves and sprinklers on the potable water used for irrigation system (non-potable). Customer shall manually open master valve, if any on the non-potable water irrigation systems.
4. Verify full water pressure at potable water fire protection systems, as necessary.
5. Verify full water pressure at all potable water system outlets (buildings, restrooms, drinking fountains, sinks, hose bibs, and all other facilities and appurtenances).
6. Deactivate Recycled Water Irrigation System:
  - Turn off and lock angle stop;
  - Customer shall open master valve manually (if any);
  - Attach "Cross Connection Testing in Progress" tag to water meter. Attach magnetic "cross connection testing in progress" label to controller door; and
  - Customer shall turn off irrigation controller.
7. Drain System - Reduce pressure to an acceptable level as approved by the regulatory agencies on the recycled water irrigation system at the low point of the system.
8. Verify full water pressure on the following systems: recycled water systems not a part of the irrigation system; at the end of the potable water used for irrigation (non-potable) systems; potable water fire protection systems, as necessary; and all potable water outlets.
9. Start recycled water irrigation system cross-connection test. Record start date and time. Notify on-site personnel recycled water irrigation system is to remain off for testing.
10. Return to site within the time established by the regulatory agencies after start of cross-connection test. Record end date and time.
11. Verify the following conditions on the recycled water irrigation system:
  - Angle stop is off and locked;
  - Master valve is open (in manual position);
  - Irrigation controllers are still off; and
  - Verify the system water pressure does not exceed an "acceptable level" (as approved by the regulatory agencies) at the low points of the recycled water irrigation system.

12. Verify full water pressure on the following systems: recycled water systems not a part of the irrigation system; at the end of the potable water used for irrigation (non-potable) systems; potable water fire protection systems, as necessary; and all potable water outlets.
13. Complete section of the report stating whether recycled water irrigation system has passed or failed the cross connection test.

If system passed - District unlocks and turns on angle stop, the customer's on-site maintenance personnel are responsible for pressurizing the recycled water irrigation system, turning on controller, returning the recycled water master valve back to the normal operating position.

If system fails - Angle stop shall remain off and locked. Turn off and lock all potable water angle stops. Discontinue use of all systems until further notice. The District will notify customer, SARWQCB, DDW and OCHCA of cross connection. Locate source of cross connection. Customer will eliminate cross connection. Retest all systems. Complete cross-connection report form. Other requirements may be required by the District as necessary on a case-by-case basis, as determined by the District.

***B. Recycled Water System (Not Used for Irrigation) Cross-Connection Test***

1. Verify full water pressure on recycled non-irrigation water systems.
2. Verify full irrigation system operation and pressure for all valves and sprinklers on the recycled water irrigation system. Customer shall manually open master valve, if any on the recycled water irrigation system.
3. Verify full irrigation system operation and pressure for all valves and sprinklers on the potable water used for irrigation systems (non-potable). Customer shall manually open master valve, if any on the non-potable water irrigation systems.
4. Verify full water pressure at potable water fire protection systems, as necessary.
5. Verify full water pressure at all potable water system outlets (buildings, restrooms, drinking fountains, sinks, hose bibs, and all other facilities and appurtenances).
6. Deactivate Recycled Non-Irrigation Water System:
  - Turn off and lock angle stop; and
  - Attach "Cross Connection Testing in Progress" tag to water meter.

7. Drain recycled water non-irrigation system and reduce pressure to an acceptable level as approved by the regulatory agencies on the recycled water non-irrigation system.
8. Verify full water pressure on the following systems: at the end of the recycled water irrigation systems; at the end of the potable water used for irrigation (non-potable) systems; potable water fire protection systems, as necessary; and all potable water outlets.
9. Start recycled water non-irrigation system cross-connection test. Record start date and time. Notify on-site personnel recycled water non-irrigation system is to remain off for testing.
10. Return to site within the time established by the regulatory agencies after start of cross-connection test. Record end date and time.
11. Verify the following conditions on the recycled water non-irrigation system:
  - Angle stop is off and locked; and
  - The system water pressure does not exceed an acceptable level (as approved by the regulatory agencies) on the recycled water non-irrigation system.
12. Verify full water pressure on the following systems: at the end of the recycled water irrigation systems; at the end of the potable water used for irrigation (non-potable) systems; potable water fire protection systems, as necessary; and all potable water outlets.
13. Complete section of the report stating whether recycled water non-irrigation system has passed or failed the cross connection test.

If system passed - District unlocks and turns on service, the customer's on-site maintenance personnel are responsible for pressurizing the recycled water non-irrigation system, and returning both the recycled water irrigation and potable water irrigation (non-potable) master valves back to the normal operating position.

If system fails - Service remains off and locked. The District staff will turn off and lock all recycled water and potable water angle stops. Discontinue use of all systems until further notice. The District will notify customer, SARWQCB, DDW and OCHCA of cross connection. Locate source of cross connection. Customer will eliminate cross connection. Retest all systems. Complete cross-connection report form. Other requirements may be required by the District as necessary on a case-by-case basis, as determined by the District.

**C. Potable Water Used for Irrigation (Non-potable) Cross-Connection Test**

1. Verify full irrigation system operation and pressure for all valves and sprinklers on the potable water used for irrigation system (non-potable). Customer shall manually open master valve, if any on the potable water used for irrigation systems.
2. Verify full irrigation system operation and pressure for all valves and sprinklers on the recycled water irrigation system. Customer shall manually open master valve, if any on the recycled water irrigation systems.
3. Verify full water pressure at all recycled water non-irrigation systems.
4. Verify full water pressure at potable water fire protection systems, as necessary.
5. Verify full water pressure at all potable water system outlets (buildings, restrooms, drinking fountains, sinks, hose bibs, and all other facilities and appurtenances).
6. Deactivate Potable Water Irrigation System (Non-potable):
  - Turn off backflow at isolation valves;
  - Verify master valve is manually open (if any);
  - Attach "Cross Connection Testing in Progress" tag to backflow. Attach magnetic "cross connection testing in progress" label to controller door; and
  - Customer shall turn off irrigation controller.
7. Drain System - Reduce pressure to an acceptable level as approved by the regulatory agencies on the potable water used for irrigation system (non-potable) at the low point of the system.
8. Verify full water pressure on the following systems: at the end of the recycled water irrigation systems; recycled water non-irrigation system; potable water fire protection systems, as necessary; and all potable water outlets.
9. Start potable water used for irrigation system (non-potable) cross-connection test. Record start date and time. Notify on-site personnel potable water used for irrigation system is to remain off for testing.
10. Return to site within the time established by the regulatory agencies after start of cross-connection test. Record end date and time.



11. Verify the following conditions on the potable water used for irrigation system:
  - Backflow isolation valves are off;
  - Verify that master valve is manually open (if any);
  - Irrigation controllers are still off; and
  - Verify the system water pressure does not exceed an "acceptable level" (as approved by the regulatory agencies) at the low points of the potable water used for irrigation system.
12. Verify full water pressure on the following systems: at the end of the recycled water irrigation systems; recycled water systems not a part of the irrigation system; potable water fire protection systems, as necessary; and all potable water outlets.
13. Complete section of the report stating whether potable water used for irrigation system (non-potable) has passed or failed the cross connection test.

If system passed - District turns on backflow isolation valves. The customer's on-site maintenance personnel are responsible for pressurizing the potable water used for irrigation system, turning on controller, returning the potable water used for irrigation master valve back to the normal operating position and returning the recycled water irrigation master valve back in the normal operating position..

If system fails - Turn off and lock all potable water and recycled water angle stops. Discontinue use of all systems until further notice. The District will notify customer, SARWQCB, DDW and OCHCA of cross connection. Locate source of cross connection. Customer will eliminate cross connection. Retest all systems. Complete cross-connection report form. Other requirements may be required by the District as necessary on a case-by-case basis, as determined by the District.

***D. Potable Water Fire Protection Systems Cross-Connection Test, As Necessary***

1. **Owner** shall notify employees, tenants, and the Fire Department that fire protection system is under pressure testing. Verify full pressure at all potable water fire protection system outlets, as necessary. Check pressure gauge and record psi at the beginning of all cross connection testing.
2. Verify full irrigation system operation and pressure for all valves and sprinklers on the recycled water irrigation system. Customer shall manually open master valve, if any on the recycled water irrigation system.
3. Verify full water pressure on recycled non-irrigation water system outlets.

4. Verify full irrigation system operation and pressure for all valves and sprinklers on the potable water used for irrigation systems (non-potable). Customer shall manually open master valve, if any on the non-potable water irrigation systems.
5. Verify full water pressure at all potable water system outlets (buildings, restrooms, drinking fountains, sinks, hose bibs, and all other facilities and appurtenances).
6. Owner turns off fire protection system at backflow device.
7. Attach "Cross Connection Testing in Progress" tag to backflow device inlet handle.
8. Check pressure gauge and record psi on the potable water fire protection system.
9. Verify full water pressure on the following systems: at the end of the recycled water irrigation systems; recycled water non-irrigation systems; at the end of the potable water used for irrigation (non-potable) systems; and all potable water outlets.
10. Start potable water fire protection system cross-connection test. Record system psi at pressure gauge, start date and time.
11. Return to site within the time established by the regulatory agencies after start of cross-connection test. Record end date and time.
12. Verify potable water fire protection system pressure at the pressure gauge has not changed from previous reading.
13. Verify full water pressure on the following systems: at the end of the recycled water irrigation systems; recycled water non-irrigation systems; at the end of the potable water used for irrigation (non-potable) systems; and all potable water outlets.
14. Complete section of the report stating whether the potable water fire protection system has passed or failed the cross connection test.

If system passed - Customer's on-site maintenance personnel are responsible for opening backflow isolation valves, pressurizing the fire protection system, notifying the fire department that the system is back on-line. Returning both the recycled water irrigation and potable water irrigation (non-potable) master valves back to the normal operating position.

If system fails - Service remains off and isolated. The District staff will turn off and lock all recycled water and potable water angle stops. Discontinue use of all systems until further notice. The District will notify customer, SARWQCB, DDW and OCHCA of cross connection. Locate source of cross connection. Customer will eliminate cross connection. Retest all systems.

Complete cross-connection report form. Other requirements may be required by the District as necessary on a case-by-case basis, as determined by the District.

***E. Potable Water Cross-Connection Test***

1. Provide notification 48 hours in advance to impacted customers of the time, duration and purpose of the potable water cross connection test.
2. Verify full water pressure at all potable water system outlets (buildings, restrooms, drinking fountains, sinks, hose bibs, and all other facilities and appurtenances).
3. Verify full irrigation system operation and pressure for all valves and sprinklers on the recycled water irrigation system. Customer shall manually open master valve, if any on the recycled water irrigation system.
4. Verify full water pressure on recycled non-irrigation water system outlets.
5. Verify full irrigation system operation and pressure for all valves and sprinklers on the potable water used for irrigation systems (non-potable). Customer shall manually open master valve, if any on the non-potable water irrigation systems.
6. Verify full water pressure at potable water fire protection systems, as necessary.
7. Deactivate potable water system.
  - Turn off backflow at isolation valves; and
  - Attach "Cross Connection Testing in Progress" tag to isolation valve.
8. Drain and reduce pressure to an acceptable level (as approved by the regulatory agencies) on the potable water system. Verify the water pressure is at an acceptable low level at low point of system.
9. Verify full water pressure on the following systems: at the end of the recycled water irrigation systems; recycled water non-irrigation systems; at the end of the potable water used for irrigation (non-potable) systems; and potable water fire protection systems, as necessary.
10. Start potable water cross-connection test. Record start date and time.
11. Return to site within the time established by the regulatory agencies after start of cross-connection test. Record end date and time.
12. Verify potable water systems pressure does not exceed an acceptable level (as approved by the regulatory agencies) at the low points of the potable water system.

13. Verify full water pressure on the following systems: at the end of the recycled water irrigation systems; recycled water non-irrigation systems; at the end of the potable water used for irrigation (non-potable) systems; and potable water fire protection systems, as necessary.
14. Complete section of the report stating whether the potable water system has passed or failed the cross connection test.

If system passed - Customer's on-site maintenance personnel are responsible for opening backflow isolation valves, pressurizing the potable water system, returning both the recycled water irrigation and potable water irrigation (non-potable) master valves back to the normal operating position.

If system fails - Service remains off and isolated. The District staff will turn off and lock all recycled water and potable water angle stops. Discontinue use of all systems until further notice. The District will notify customer, SARWQCB, DDW and OCHCA of cross connection. Locate source of cross connection. Customer will eliminate cross connection. Retest all systems. Complete cross-connection report form. Other requirements may be required by the District as necessary on a case-by-case basis, as determined by the District.

**Note: All testing shall be done in conjunction with and the approval of the District Recycled Water Inspectors, Customer Service Cross-Connection Specialists, and DDW and OCHCA.**

#### **§10693      Site Specific Requirements**

The Owner of record shall be required to notify their employees and/or tenants when cross connection control testing may affect the water service to facilities under the Owner's control.

The Owner of record shall be required to notify their employees, tenants, and the fire department when the fire protection system is involved in the cross connection control testing process. (Fire watches and/or other related requirements are the sole responsibility of the Owner.)

For recycled water non-irrigation systems, testing requirements will be determined on a case-by-case basis by the District.

#### **§10700      OPERATIONAL REQUIREMENTS**

The operation and surveillance of all of the District's offsite water and recycled water facilities, up to and including the District's meter, shall be under the management and control of the District. No other persons except authorized employees and/or representatives of the District shall have any right to inspect, operate, adjust, change, alter, move, or relocate any portion of the District's facilities.

The operation and surveillance of on-site water and recycled water facilities are the responsibility of the applicant, owner, or customer. However, pursuant to these Rules and Regulations, the District shall monitor and inspect the on-site recycled water system and shall have the right to enter upon the customer's premises during reasonable hours.

#### **§10710      SPECIFIC LIMITATIONS**

The following is a summary of specific limitations on properties that are using recycled water.

#### **§10711      Runoff Conditions**

Conditions that directly or indirectly cause runoff outside of/or within the approved use area, whether by design, construction practice, or system operation, shall be minimized. The use of recycled water on water-saturated or frozen ground or during periods of precipitation such that runoff is induced, is prohibited.

#### **§10712      Ponding Conditions**

Conditions that directly or indirectly cause a ponding condition outside of or within the approved use area, whether by design, construction practice, or system operation, shall be minimized. Temporary ponding in a vegetated area caused by draining of system or meter testing is allowed in District specified areas with prior District approval.

#### **§10713      Direct Overspray Conditions**

Any discharge of water directly onto areas other than that within the approved use area is strictly prohibited.

#### **§10714      Windblown Overspray Conditions**

Conditions that directly or indirectly permit windblown spray to pass outside of the approved use area, whether by design, construction practice, or system operation, shall be minimized.

#### **§10715      Unapproved Uses**

Use of recycled water for any purposes other than those explicitly approved in a Use Permit issued by the District and without the prior knowledge and approval of the District is strictly prohibited.

#### **§10716      Disposal In Unapproved Areas**

Disposal of recycled water for any purposes, including approved uses, in areas other than those explicitly approved in the Use Permit issued by the District and without the prior knowledge and approval of the District, is strictly prohibited. Discharge of water from flushing or draining of the recycled system shall be done either at the approved use site and in a manner that does not create ponding or runoff conditions, (See Section 10712

“Ponding Conditions” for special considerations.) or to a sanitary sewer manhole, with the approval of the agency responsible for operation of the sanitary sewer. In no case shall the discharge of recycled water to a sanitary sewer cause the sewer to overflow or otherwise create a public health hazard or nuisance. Air gap protocol shall be applied.

The direct or indirect discharge from use areas of recycled water to surface waters, either perennial or ephemeral, including wetlands, vernal pools, etc. is prohibited, unless otherwise authorized by an NPDES Permit.

#### **§10717      Cross Connections**

Cross connections, permanent or temporary, resulting from the use of recycled water or from the physical presence of a recycled water service, whether by design, construction practice, or system operation, are strictly prohibited.

#### **§10718      Unprotected Drinking Fountains**

Any drinking fountain located within the approved use area designated by the Use Permit shall be protected, by siting and/or a structure, from contact with recycled water. Lack of such protection, whether by design, construction practice, or system operation, is strictly prohibited.

#### **§10719      Unprotected Public Facilities**

Facilities that may be used by the general public, or on-site personnel, including but not limited to eating areas, eating surfaces/benches, pools, spas, hardscape, and playground equipment/play areas, and located within the approved use area designated by the Use Permit, shall be protected by siting and/or a structure from contact with mist, runoff or recycled water. Lack of such protection is prohibited until review and concurrence by the District, DDW, and OCHCA on a case-by-case basis.

#### **§10720      Hose Bibs**

Installation of hose bibs on any on-site system that presently operates or is designed to operate with recycled water, regardless of the hose bib construction or identification, is strictly prohibited.

#### **§10721      Fire Hydrants**

Use or installation of fire hydrants on any site that presently operates or is designed to operate with recycled water, regardless of the fire hydrant construction or identification, requires prior written approval by the District.

#### **§10722      Hours of Operation**

Irrigation with recycled water is restricted to particular hours that vary for the following application areas:

- Turf areas and center street medians – between 8:00 p.m. and 6:00 a.m.;
- Slopes and groundcover/shrub areas - any hour (if no potential for public contact);
- Golf courses – between 8:00 p.m. and 6:00 a.m.; and
- Golf courses – fill impoundments - between 5:00 a.m. and 6:00 p.m..

Potential public contact with recycled water shall take precedence over recycled watering schedules. Irrigation system runtimes shall be adjusted to minimize public contact with recycled water, on an individual lateral system basis. The District shall require specific run times and durations where there is a history of public contact. Consideration shall also be given to allow maximum drying time prior to subsequent public use.

#### **§10723      Water/Garden Hoses and Hose Appurtenances**

Water/garden hoses and hose appurtenances utilizing recycled water shall be clearly identified purple in color with heavy-duty brass fittings. Hoses shall be continuously imprinted with “Caution; Recycled Water – Do Not Drink” and rated at 150 psi working pressure. Hoses shall only be used for recycled water use. Use of these hoses for potable water use is strictly prohibited.

#### **§10724      Domestic Wells**

The application of recycled water within fifty (50) feet of a domestic well, and impoundment of recycled water within one hundred (100) feet of a domestic well, unless approved by DDW, is prohibited.

#### **§10725      Recycled Water Impoundments**

All recycled water impoundments shall be adequately protected from erosion, washout, and flooding such that no discharge occurs unless the discharge is a result of a 25-year, 24-hour storm event or greater.

Any storage facility or impoundment containing recycled water for reuse applications shall be managed in a manner to control odors, nuisance conditions or vectors such as mosquitoes. Should such problems develop, a management plan shall be devised and implemented to monitor, correct, and control future occurrences.

#### **§10730      ON-SITE IRRIGATION SYSTEMS**

##### **§10731      Supervision**

On-site irrigation systems at each use area under the customer's control shall be under the management of the on-site supervisor designated by the customer or the operator and approved by the District.

On-site supervisors shall be responsible for the installation, operation, and maintenance of the irrigation system; enforcement of the Rules and Regulations; prevention of potential hazards and cross connections; and maintenance of the recycled water system plans in record drawing form, including location of any on-site potable water features and facilities. The on-site supervisor, in the event of a contamination to the public potable water supply, shall be responsible for immediate notification to the District.

The on-site supervisor shall also have the following responsibilities: to make sure all operations personnel are trained and familiarized with the use of recycled water; to furnish their operations personnel with maintenance instructions, controller charts, and record drawings to ensure proper operation in accordance with these Rules and Regulations; to notify the District of any and all updates or proposed changes, modifications, or additions to the on-site facilities; to operate and control the irrigation system to be in compliance with the on-site limitations and these Rules and Regulations; and apply the recycled water at a rate that does not exceed the infiltration rate of the soil.

The District may, from time to time, require that an "On-site Recycled Water Supervisor" obtain instruction in the use of recycled water, such instruction being provided by or approved by the District.

The on-site supervisor or his representative shall check all appurtenances on the on-site irrigation system to ensure proper operation, and perform a coverage test of the system at least annually. Owner shall keep records of the annual on-site testing (refer to the form in Appendix 6) for District review. Records must be kept for a period of five years as a minimum.

The on-site supervisor or his representative shall be available during normal working hours at an address listed with the District for the purpose of hosting an inspection tour or for discussing operational aspects of the system. The on-site supervisor shall be able to effectively communicate with District personnel orally and in writing. The on-site supervisor or his representative shall be available via telephone at a number listed with the District for emergency off-hours contact. Where necessary, keys and/or lock combinations shall be issued to the District to provide access upon request.

#### **§10732      Operator Certification Submittal**

Once the customer has selected the operator for an on-site recycled water system, the certification of recycled water service operation must be initiated. District shall evaluate this submittal and advise the operator of the need for any additional information or action. Operators must attend a training session coordinated by the District prior to receiving operation certification or within 180 consecutive calendar days after certification, as training sessions are scheduled. If the customer selects a new operator during the course of service, a new Use Permit form shall be submitted by the new operator to the District, within thirty (30) days of any change. The District shall update all Use Permits to confirm information accuracy.



**§10733      Temporary Service Connection**

A temporary service connection may be provided for on-site construction testing purposes. The temporary service connection consists of the permanent service connections and meter plus any backflow prevention assemblies, if required. Temporary service connection is valid for only 90 consecutive calendar days.

**§10734      Service Startup**

Following final District inspection and certification of the project, the customer shall request in writing regular service startup. District shall begin regular service within five working days of approval of service startup.

**§10735      Confinement of Irrigation**

The customer shall be responsible for maintaining and controlling the system in order to minimize human contact, prevent consumption of recycled water, and to control and eliminate direct spray, overspray, ponding and runoff. The customer shall be responsible for any subsequent uses of the recycled water.

**§10736      Dye Testing/Pressure Testing**

In order to determine the existence of any cross connections or backflow conditions into the potable water system, a customer may perform a pressure test where the recycled system is isolated for a period of 24 hours or as directed by the District.

**§10737      Contamination**

In the event of contamination or pollution of a potable water system due to a cross connection or other failure, the District shall be immediately notified, so that appropriate measures will be taken to correct the problem. The On-site supervisor shall submit a written report explaining the contamination within five working days. The District will contact SARWQCB, DDW and OCHCA within 24 hours from customer notifications.

**§10738      Maintenance**

A preventive maintenance program designed to ensure the continued operation of all system elements within the requirements of these Rules and Regulations shall be evidenced by the customer and open to inspection by The District. Records must be kept on file for five years as a minimum. See Section 10731 ("Supervision") for reporting requirements. See Appendix 6 for onsite testing report form.

## **§10739      On-site Notifications**

The following are guidelines for the recommended on-site notifications that recycled water is in use on the site.

Workers shall be notified that recycled water is in use. Notification shall include the posting of conspicuous identification signs with proper working of sufficient size to be clearly read. It is recommended that these recommended notifications be issued to all workers who come in contact with recycled water or equipment utilizing recycled water.

In those locations where English is not the primary language of the workers, the signs and information shall be in the appropriate language as well as English.

Workers should be informed of the potential health concerns involved with the ingestion of recycled water.

Precautionary measures should be taken to minimize worker contact with recycled water. Workers should not be subjected to direct recycled water sprays. Workers should be provided with protective clothing (rain gear/gloves) when there will be more than casual contact with recycled water.

Safe drinking water should be supplied for the workers. Where bottle water is provided, the water should be in contamination-proof containers, and be protected from recycled water and dust.

Potable hand-washing facilities should be provided, where appropriate. It is strongly recommended that before ingesting food or drink, and at the end of the work period, all workers wash with soap and water any parts of their body that may have come in contact with recycled water.

Precautions should be taken to avoid the contamination of food taken into the recycled water use areas. Food should not be taken into areas still wet with recycled water. Edible plants, fruits and vegetables are prohibited to be grown in recycled water use areas.

An adequate first aid kit should be available on-site. It is recommended that any worker who receives a cut, abrasion, or scratch receive proper medical attention after the accident to prevent possible infection or other complications.

## **§10740      Recycled Water Application**

Application of recycled water to the Use Area shall be at a reasonable agronomic rate and shall consider soil, climate, and nutrient demand. Application rates shall ensure that a nuisance is not created. The seasonal nutritive loading of the Use Area including the nutritive value of organic and chemical fertilizers and of the recycled water, shall not exceed the nutritive demand of the landscape.

**§10750      CONSTRUCTION WATER FACILITIES**

**§10751      Supervision**

The operation and surveillance of the construction water facility at each use area under the customer's control shall be under the management of an on-site supervisor designated by the customer or the operator and approved by the District. On-site supervisors shall be responsible for the installation, operation, and maintenance of the on-site facility, equipment, enforcement of these Rules and Regulations, and prevention of cross connections and potential hazards. The on-site supervisor or his representative shall be available via telephone at numbers listed with the District for contact during working hours and after hours.

**§10752      Identifying Equipment**

All equipment and facilities using recycled water shall be identified per District regulations.

**§10753      Application Control**

Recycled water used for the purpose of soil compaction and dust control shall not be stored or applied in a manner that causes runoff, ponding, windblown overspray conditions, or discharge in any way onto unapproved areas. If such conditions occur, the method of application shall be altered to correct them and prevent any further ponding, runoff, or windblown spray onto unapproved areas. Control valves on the water distribution vehicles and other controlling devices shall be properly employed to prevent the application of recycled water outside the approved use area onto surfaces including, but not limited to, street pavements, sidewalks, and drainage courses.

**§10754      Maintenance**

A preventive maintenance program designed to ensure the continued operation of all system elements within the requirements of these Rules and Regulations shall be evidenced by the customer and open to inspection by the District.

**§10755      Reuse of Equipment**

Any equipment, such as tanks, water trucks, temporary piping or valves and portable pumps that have been used with recycled water shall be drained, cleaned and disinfected before removal from the approved use area to another job site. This disinfection and cleaning shall ensure the protection of the public health in the event of any reuse of such equipment with higher quality water.

Methods of disinfection shall be approved by the District or the appropriate regulatory agency, and the disinfection process shall be performed in the District's presence. When storage tanks or distribution vehicle tanks are provided with an inlet air gap whose configuration is approved by the DDW and OCHCA, such on-site disinfection shall not be required.

## **§10760      ROUTINE FOLLOW-UP TESTING AND INSPECTION**

Systems constructed to immediately begin using recycled water or systems constructed for recycled water use, but will be using potable water in the interim as recycled water becomes available in the area, are required to successfully pass cross-connection testing in order to continue recycled water service. A final report will be issued when these testing and other District requirements are met. No potable water other than for testing and no buildings or facilities using potable water, shall be utilized or occupied until all cross-connection testing and final inspection requirements have been performed and passed.

Any use site receiving recycled water and potable water shall be required to successfully pass routine follow-up inspection cross-connection testing in order to continue to receive potable and recycled water service.

For sites adjacent to recycled water use sites, cross-connection testing and site inspections may be required on a case-by-case basis, to ensure the protection of the public water supply and public health.

### **§10761      Schedule**

The District will inspect at least annually and test at least every four years; each site utilizing recycled water and potable water for compliance with District, State, and County regulations regarding use of recycled water on-site. Sites with public exposure will be tested more frequently.

As stated in Section 10345 ("Backflow Prevention") and Section 10560 ("Protective Measures) of these Rules and Regulations, the District may waive, with approval from DDW, the requirement of constructing a backflow protection device at each single family residence within specific homeowner association sites. In lieu of the backflow protection, the District will perform recycled water irrigation system cross-connection shutdown testing (including pressure test) and potable water cross-connection shutdown testing annually at each single family residence without a backflow protection device.

The typical duration of the cross-connection shutdown testing is as follows:

- Recycled Water Irrigation System: 48 hours, including pressure test;
- Potable Water Used for Irrigation Systems: 2 hours;
- Potable Water System for Domestic Purposes: 1 hour; (positive pressure check if approved by DDW and/or OCHCA)
- Potable Water Fire Protection: Pressure Gauge Check

Any site that exceeds the inspection and testing schedule established by the District by sixty (60) consecutive calendar days will be subject to recycled water service termination if the delay is a result of lack of cooperation or coordination of the owner or their representatives.

Any recycled water site where recycled water service has been discontinued for a period of thirty (30) consecutive calendar days, or has exceeded the previous inspection and testing schedule established by the District, will be required to perform an inspection and cross connection testing prior to and in conjunction with regular service start-up. No recycled water shall be utilized onsite without the testing being performed.

#### **§10762      Procedures**

Section 10680 (“On-site Testing”) and Section 10690 (“Cross-Connection Testing”) of these Rules and Regulations are non-inclusive lists of standard inspection procedures. The District reserves the right to add to or alter testing procedures as necessary. Testing will review all on-site point of connections to verify proper identification and proper backflow protection with current test report as required by the District, DDW and OCHCA.

#### **§10770      RECYCLED WATER IRRIGATION SYSTEM MAINTENANCE REPORT**

The on-site supervisor or his representative, using the form contained in Appendix 6, shall assess the on-site irrigation system at least annually to ensure full compliance to all current Rules and Regulations regarding the use of recycled water. The on-site supervisor or his representative of the use site shall maintain records for the annual assessment during the routine inspection and testing by the District and keep them on file for District review upon request. If the forms are not available for District review upon request, the District may terminate the recycled water service and reconnection fees will apply to restore recycled water service.

#### **§10800      VIOLATIONS AND ENFORCEMENT**

##### **§10810      DETERMINATION**

The District reserves the right to determine whether a violation of the Rules and Regulations has resulted from any action and/or occurrence that are the responsibility of the customer. Insofar as violation of the Rules and Regulations constitutes violation of any regulatory agency requirement, the District makes its determination on behalf of the concerned agency(s). However, this determination and any consequential penalties levied by the District do not derogate the opportunities available to the affected regulatory agency(s) to levy their own penalties.

##### **§10820      VIOLATIONS**

Violations shall include those actions and/or occurrences that directly cause noncompliance with any one of the specific operational limitations as listed in the Rules and Regulations, such as runoff conditions, ponding conditions, direct and windblown overspray conditions, unapproved uses, disposal in unapproved areas, cross connections, unprotected drinking fountains, unprotected public facilities, hose bibs, fire hydrants, and hours of operation. However, by definition, noncompliance with any condition or conditions of the Rules and Regulations or Use Permit, whether willfully or by accident, shall constitute a violation. Pursuant to Section 35424 of the California Water Code, any

violation of the Rules and Regulations is a misdemeanor. Customer reporting requirements in the event of a violation are outlined in Section 10450 (Reporting) of these Rules and Regulations.

**§10830      CORRECTIVE ACTION**

Any person, firm, corporation, association, or agency found to be violating any provision of the Rules and Regulations or the terms and conditions of the Use Permit, or applicable State or local statutes, regulations, ordinances, or other requirements shall be served by the District with written notice stating the nature of the violation and providing a reasonable time limit for the satisfactory correction thereof. The offender shall, within the period of time stated in such notice, permanently cease all violations. This provision is in addition to and not by way of derogation of any other remedies or procedures available to the District by law, regulation, or pursuant to any of the provisions of the Rules and Regulations.

**§10840      PENALTIES PRIOR TO ISSUANCE OF THE USE PERMIT**

**§10841      *Existing Potable Water Service Being Converted to Recycled Water Use***

If after one hundred and eighty (180) consecutive calendar days from the date of the District's final determination notice, the prospective customer has not completed required onsite retrofit construction work, then, in addition to any other penalties set forth in the Rules and Regulations, the customer's irrigation consumption will be billed at the District's Tier III (Inefficient) rate for potable water. If imposed, this rate will persist until remedy is achieved by the customer to the District's satisfaction.

**§10842      *Recycled Water Service Temporarily Using Potable Water***

Where recycled water is available in offsite facilities, and where temporary use of potable water has been approved by the District for a recycled water service, if after thirty (30) consecutive calendar days from the date of the District's corrective action notice, the prospective customer has not completed required onsite facility corrective actions and achieved compliance, then, in addition to any other penalties set forth in the Rules and Regulations, the customer's irrigation consumption will be billed at the District's Tier III (Inefficient) rate for potable water. Said rate will be imposed on the service requiring compliance, and will persist until remedy is achieved by the customer to the District's satisfaction.

**§10843      *Penalty For Lack Of Inspection During Installation***

Any work not inspected by the District shall be required to be exposed for District inspection by the District inspector, at the owner's expense. Failure to comply with this requirement will result in termination of potable and/or recycled water. (Reconnection fees shall apply.) Service shall only be restored when, in the opinion of the District, the inspection requirements have been met.

## **§10850      PENALTIES AFTER ISSUANCE OF THE USE PERMIT**

Failure to permanently cease all violations within the time stated shall result in revocation of the Use Permit by the District and termination of water, sewer, and/or recycled water service. Violations regarding any one service may result, at the sole discretion of the Board or General Manager, in termination of any combination of or all water, sewer, and recycled water service in the following manner.

### **§10851      Interim Revocation**

In cases where the serious nature of the violations described above require immediate action, the Board or General Manager may, in the sole discretion of the Board or General Manager, immediately revoke a Use Permit on an interim basis and thereupon cease water, sewer, and/or recycled water service, subject to a timely decision on permanent revocation of the Use Permit pursuant to a public hearing as provided herein. In cases of sewer service termination, there shall be no discharge of any type by an applicant, owner, or customer into the District's sewer facilities.

### **§10852      Permanent Revocation**

Permanent revocation of a Use Permit shall occur only subsequent to a public hearing held in the manner hereinafter provided. The applicant, owner, or customer shall be given written notice ten (10) consecutive calendar days prior to a hearing on the possible permanent revocation of any Use Permit by the District. The notice shall specify the grounds of the proposed revocation of any such Use Permit in reasonable detail. It may but need not describe suggestive corrective action acceptable to the District. Notice may be delivered personally to the applicant, owner, or customer or it may be given by depositing such in the United States mail with postage prepaid, addressed to the applicant, owner, or customer either at the current address of record.

Any such action to permanently revoke a Use Permit shall be effective ten (10) consecutive calendar days after notice of the Board's decision and shall be either personally delivered to the applicant, owner, or customer or placed in the United States mail, postage prepaid, addressed to the applicant, owner, or customer in the manner hereinabove specified.

In the alternative to such action, the District may establish a 50% surcharge on the continuation of water, sewer, and/or recycled water service by the District until such time as the applicant, owner, or customer has taken action to comply with all of the hereinabove described requirements for obtaining service from the District in its reasonable discretion. The foregoing provisions of the Rules and Regulations are a requirement of any Use Permit, and any application for recycled water service therefore shall be subject to such provisions. The Board, if it deems such to be in the best interest of the District, may on an interim basis or otherwise waive or modify any of the foregoing.

**§10860      APPEAL**

The customer may appeal the determination of the District to the Board. Such appeal must be presented in writing to the General Manager for presentation to the Board at one of its regular meetings. The appeal shall state the conditions that have been determined to be a violation and the customer's opinion to the contrary. The action of the Board shall be final.

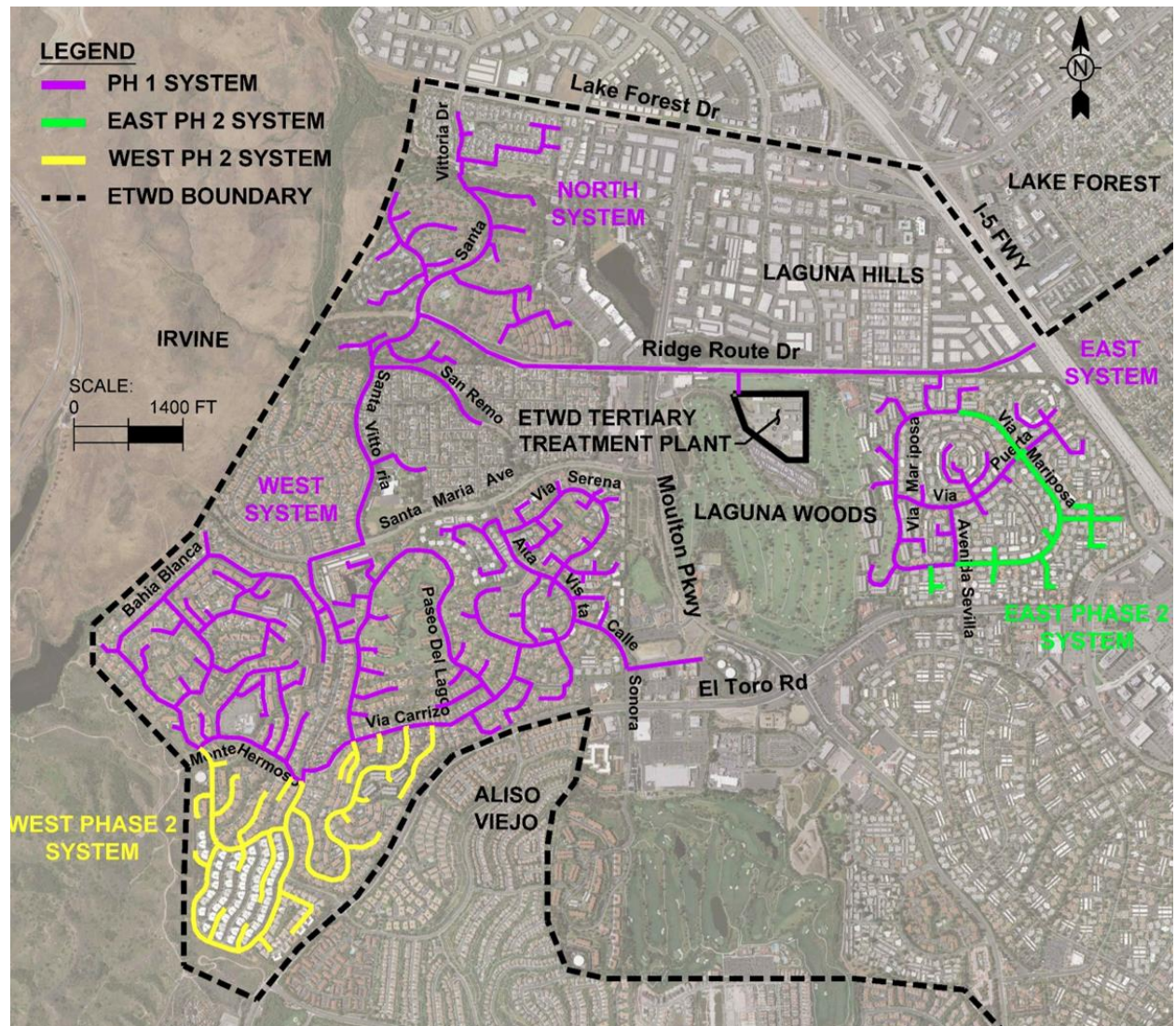
**§10870      SERVICE RECONNECTION**

Any request to reestablish service subsequent to the revocation of a permit and the termination of water, sewer, and/or recycled water service shall be in the manner prescribed for initially obtaining service from the District, which may include the collection of a security deposit. However, in addition, the District may, in its discretion, require that an agreement including any special conditions and financial security conditioned upon compliance with the District's Rules and Rules and Regulations be provided in an amount, manner, and for a period of time as determined by the Board.



**§10900**

**EXHIBITS**



## EXHIBIT 1

### EL TORO WATER DISTRICT RECYCLED WATER DISTRIBUTION SYSTEM

**§10950**

**APPENDICES**

**APPENDIX 1**  
**“SAMPLE”**  
**PRELIMINARY DETERMINATION NOTICE**

Date

Address

Regarding: Notice of Preliminary Determination for Recycled Water Use

Dear Customer:

The El Toro Water District has constructed a recycled water distribution system to reuse highly treated wastewater for irrigation purposes. This system has grown to include capacity in our water reclamation plant, a storage reservoir, pump station, and approximately 20 miles of distribution piping in the west side of the District. The system reduces the need to import a limited and valuable resource, potable water. Recycled water customers receive a 20 percent discount on our irrigation water rate and a reliable water source during drought times.

The District's goal is to serve as many sites that are economically reasonable within the vicinity of the existing recycled water distribution system. These sites can include golf courses, parks, school campuses, homeowner association greenbelts, arterial slopes, street medians, and highway landscaping. To reach this goal, the District will need to convert existing sites from potable water to recycled water use. The District has identified the following site(s) owned by you that are candidates for conversion:

| ID # | ACCOUNT | METER # | METER LOCATION |
|------|---------|---------|----------------|
|      |         |         |                |
|      |         |         |                |
|      |         |         |                |
|      |         |         |                |

In the near future, as the District prepares to construct facilities that will convey recycled water to your site(s), a Notice of Final Determination will be sent to you. From that date, you will have 180 days to complete your site construction work and be prepared to receive recycled water supply.

District employees are available to perform an on-site walk-through and provide a punch list for on-site mitigation to be performed by the owner to meet minimum conversion requirements. Typical conversion mitigation includes the following retrofit work: removing the backflow device and potable water meter; providing identification of recycled water use by branding valve boxes, tagging valves, and tagging perimeter sprinkler heads; changing quick couplers; and checking for overspray and cross-connections with the potable water system.

The District is offering a loan at 6 percent interest, up to a maximum to \$2,500 per irrigated acre, for on-site retrofit costs. Loans are repaid by a \$0.25 per billing unit (bu) surcharge on the recycled water rate. The surcharge is nearly equal to the difference between the potable water irrigation rates (\$1.20 and \$1.30 per bu) and the recycled water rates (\$0.96 and \$1.04 per bu). Therefore, your landscape irrigation bills during the loan period will remain approximately the same as your current bills. After the loan is repaid, you will be saving about 20 percent on your irrigation bill.

Owners of sites not converted within the above-noted 180-day time period could be subject to a 50 percent surcharge on their potable water irrigation rates for the sites, as stipulated in the District's Mandatory Use Resolution, adopted by the District's Board of Directors on \_\_\_\_\_. You may file a Notice of Objection with the District within 30 days by submitting a written request for reconsideration of the determination, modification of the proposed conditions, or adjustment of the conversion schedule.

Your support and cooperation during the conversion process is greatly appreciated. With your help, the District's recycled water system will be a success. Please contact \_\_\_\_\_, Recycled Water Coordinator, at (949) \_\_\_\_\_, for any additional information about the conversion process and loan, and to obtain a conversion schedule for your future sites.

Sincerely,

EL TORO WATER DISTRICT  
Hannah Ford, P.E.  
Director of Engineering

**APPENDIX 2**  
**“SAMPLE”**  
**FINAL DETERMINATION NOTICE**

Date

Address

Regarding: Notice of Final Determination for Recycled Water Use

Dear Customer:

The El Toro Water District has constructed a recycled water distribution system to reuse highly treated wastewater for irrigation purposes. A Notice of Preliminary Determination was submitted to you some months ago, whereby you were notified that one or more of your irrigation sites were candidates for conversion from potable water to recycled water use. Construction is now proceeding on District facilities that will convey recycled water to your site(s).

Accordingly, the District has identified the following site(s) owned by you that need to be converted to recycled water use within the next 180 days:

| ID # | ACCOUNT | METER # | METER LOCATION |
|------|---------|---------|----------------|
|      |         |         |                |
|      |         |         |                |
|      |         |         |                |
|      |         |         |                |

More of your sites may need to be converted to use recycled water in the future. You have the option of converting both the future sites and the sites listed in the table now, or you may wait until you receive notice for the future sites.

District employees will be performing inspections at various stages of the on-site retrofit work associated with your conversion mitigation. You will be contacted in the next several weeks to initiate this process.

The District is offering a loan at 6 percent interest, up to a maximum to \$2,500 per irrigated acre, for on-site retrofit costs. Loans are repaid by a \$0.25 per billing unit (bu) surcharge on the recycled water rate. The surcharge is nearly equal to the difference between the potable water irrigation rates (\$1.20 and \$1.30 per bu) and the recycled water rates (\$0.96 and \$1.04 per bu). Therefore, your landscape irrigation bills during the loan period will remain approximately the same as your current bills. After the loan is repaid, you will be saving about 20 percent on your irrigation bill.

Owners of sites not converted within the above-noted 180-day time period could be subject to a 50 percent surcharge on their potable water irrigation rates for the sites, as stipulated in the District's Mandatory Use Resolution, adopted by the District's Board of Directors on \_\_\_\_\_. Your opportunity to file a Notice of Objection with the District expired 30 days after the District's submittal of its Notice of Preliminary Determination, now past.

Your support and cooperation during the conversion process is greatly appreciated. With your help, the District's recycled water system will be a success. Please contact \_\_\_\_\_, Recycled Water Coordinator, at (949) \_\_\_\_\_, for any additional information about the conversion process and loan, and to obtain a conversion schedule for your future sites.

Sincerely,

EL TORO WATER DISTRICT  
Hannah Ford, P.E.  
Director of Engineering

**APPENDIX 3**  
**CHECKLIST / ACTION REQUEST FORM**  
**FOR OBTAINING RECYCLED WATER SERVICE**

Owner/Customer: \_\_\_\_\_ Use Site #: \_\_\_\_\_ Account #: \_\_\_\_\_

Project Name: \_\_\_\_\_ Tract No. \_\_\_\_\_ Lot No. \_\_\_\_\_

Date: \_\_\_\_\_ Specific Action Requested: \_\_\_\_\_

Location/Cross Streets \_\_\_\_\_ New Construction \_\_\_\_ Retrofit \_\_\_\_ Conversion \_\_\_\_

Completed

- \_\_\_\_\_ 1. Applicant submits a preliminary package and plan to the District.
- \_\_\_\_\_ 2. District reviews for approval the preliminary package and plan.
- \_\_\_\_\_ 3. Preliminary approval granted, customer proceeds with project, plan, and Use Permit submittals.
- \_\_\_\_\_ 4. District reviews plans.
- \_\_\_\_\_ 5. The applicant submits to the District: completed irrigation plans for construction or retrofit; work schedule for construction or conversion; and required fees.
- \_\_\_\_\_ 6. District approves and signs plans, Complete Application (Appendix 5).
- \_\_\_\_\_ 7. District requests DDW and OCHCA approval. (As necessary)
- \_\_\_\_\_ 8. DDW and OCHCA approval granted. (As necessary)
- \_\_\_\_\_ 9. Applicant/owner has operator (installation contractor/maintenance contractor) complete operation certification (Use Permit) and submits form to District (Appendix 6).
- \_\_\_\_\_ 10. Onsite pre-construction meeting date (applicant begins construction/retrofit of onsite facilities.)
- \_\_\_\_\_ 11. The District issues recycled water Use Permit. (Copies issued to owner and onsite supervisor.)
- \_\_\_\_\_ 12. Potable water backflow prevention devices installed and tested (if applicable prior to recycled water service activation).
- \_\_\_\_\_ 13. Applicant submits redline construction set of record drawings to the District for review.
- \_\_\_\_\_ 14. Applicant has a final set of record drawings prepared/submits all required documents to District.
- \_\_\_\_\_ 15. Applicant requests final inspection by the District.
- \_\_\_\_\_ 16. District performs final inspection, operational testing, and cross-connection testing.
- \_\_\_\_\_ 17. Recycled water meter is installed.
- \_\_\_\_\_ 18. District grants final approval for recycled water service; District completes User Permit.

**HOW TO USE THIS FORM:** This form can be used by the applicant, District, DDW, and OCHCA to request specific action or items needed to complete the process for obtaining recycled water service. Complete each step in the sequence shown. Make sure the form is dated and initials included as each item is completed. This checklist keeps all entities informed of the application process and the steps remaining to provide recycled water service.



**APPENDIX 4**  
**EL TORO WATER DISTRICT**  
**RECYCLED WATER SERVICE APPLICATION**  
**(Please type)**

OWNER/CUSTOMER NAME: \_\_\_\_\_

ADDRESS: \_\_\_\_\_

\_\_\_\_\_

CONTACT PERSON: \_\_\_\_\_ TITLE: \_\_\_\_\_

TELEPHONE: \_\_\_\_\_ FAX: \_\_\_\_\_ E-MAIL: \_\_\_\_\_

PROJECT/USE SITE NAME: \_\_\_\_\_

PROJECT/USE SITE ADDRESS OR LOCATION: \_\_\_\_\_

\_\_\_\_\_

TRACT NO \_\_\_\_\_ PARCEL/LOT NO. \_\_\_\_\_

NEAREST ARTERIAL STREET NAMES: \_\_\_\_\_

LANDSCAPE ARCHITECT/ENGINEER NAME: \_\_\_\_\_

ADDRESS: \_\_\_\_\_

\_\_\_\_\_

CONTACT PERSON: \_\_\_\_\_ TITLE: \_\_\_\_\_

TELEPHONE: \_\_\_\_\_ FAX: \_\_\_\_\_ E-MAIL: \_\_\_\_\_

THIS WILL BE A: ☐ NEW SYSTEM ☐ CONVERTED SYSTEM ☐ RETROFITTED SYSTEM

TYPE OF USE (CHECK ONE):

- |                                                   |                                                 |                                           |
|---------------------------------------------------|-------------------------------------------------|-------------------------------------------|
| <input type="checkbox"/> NURSERY/SOD CROPS        | <input type="checkbox"/> LANDSCAPE-MISC         | <input type="checkbox"/> PLAYGROUND/PARKS |
| <input type="checkbox"/> COMMERCIAL               | <input type="checkbox"/> CEMETERIES             | <input type="checkbox"/> SCHOOL YARDS     |
| <input type="checkbox"/> GROUNDWATER RECHARGE     | <input type="checkbox"/> FREEWAY/HIGHWAY        | <input type="checkbox"/> ONSITE PLANT USE |
| <input type="checkbox"/> INDUSTRIAL-MISCELLANEOUS | <input type="checkbox"/> GOLF COURSES           | <input type="checkbox"/> RECREATION       |
| <input type="checkbox"/> INDUSTRIAL-COOLING WATER | <input type="checkbox"/> SLOPES, GREEN BELTS    | <input type="checkbox"/> WILD HABITAT     |
| <input type="checkbox"/> CONSTRUCTION             | <input type="checkbox"/> IMPOUNDMENTS/FOUNTAINS |                                           |
| <input type="checkbox"/> OTHER: _____             |                                                 |                                           |

SPECIAL CONDITIONS: \_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

Please include the following items on all plans:

- Potable/recycled water mainline and valve locations
- All on-site potable, fire, and recycled water lines
- Specific recycled water use areas
- Specific non-potable water use areas
- Location of all water features
- Location of drinking fountains and restrooms
- Show hardscape (walls, fencing, drainage devices)
- Show all play areas and equipment, ball field layouts and courts
- Designate all exterior eating areas, including tables, benches and barbeques
- Locations and descriptions of all backflow prevention devices
- Location and size of all service connections and meters, including fire protection
- Show all fire hydrants and all fire protection facilities
- Specifically state on the plans **if** there is no potable water on the site
- All sewer facilities
- Buildings
- Equipment Legends
- Location of all wells
- Location of all streams/water bodies
- District signature block
- District Standard Detail Drawings

Please also include a site location and vicinity maps.

I, the applicant have read and understand the District Rules and Regulations for Recycled Water and agree to restrict recycled water use for the purposes described in this application. I agree to use recycled water in accordance with the Regulations and all other applicable documents. I understand that recycled water may not be compatible with certain types of vegetation because of its composition. I agree that the District will not be liable for damages that may occur to vegetation or for damages that may occur due to uses of recycled water. I hereby acknowledge and consent to the District's use at its option of recycled water in lieu of potable water for the purposes herein mentioned in accordance with the Rules and Regulations for Recycled Water and in conformance with the State Water Resources Control Board General Permit Order No. 2009-0006-DWQ.

Applicant's Name: \_\_\_\_\_ Title: \_\_\_\_\_

Applicant's Signature: \_\_\_\_\_ Date: \_\_\_\_\_

**APPENDIX 5**  
**EL TORO WATER DISTRICT**  
**RECYCLED WATER USER PERMIT**  
**(Please type)**

USE SITE NUMBER: \_\_\_\_\_ ACCOUNT NO: \_\_\_\_\_ METER NO: \_\_\_\_\_  
(Completed by District)

USE SITE NAME: \_\_\_\_\_

USE SITE ADDRESS OR LOCATION: \_\_\_\_\_

NEAREST ARTERIAL STREET NAMES: \_\_\_\_\_

OWNER/CUSTOMER NAME: \_\_\_\_\_

ADDRESS: \_\_\_\_\_

CONTACT PERSON: \_\_\_\_\_ TITLE: \_\_\_\_\_

TELEPHONE NO: \_\_\_\_\_ FAX NO: \_\_\_\_\_ E-MAIL: \_\_\_\_\_

PROPERTY MANAGEMENT COMPANY: \_\_\_\_\_

ADDRESS: \_\_\_\_\_

CONTACT PERSON: \_\_\_\_\_ TITLE: \_\_\_\_\_

TELEPHONE NO: \_\_\_\_\_ FAX NO: \_\_\_\_\_ E-MAIL: \_\_\_\_\_

SPECIAL CONDITIONS: \_\_\_\_\_

Under penalty of perjury, I, the owner/customer swear that I have read and understand the District Rules and Regulations for Recycled Water and agree to restrict recycled water use for the purposes described in this permit. I agree to use recycled water in accordance with the Regulations and all other applicable documents. I understand that recycled water may not be compatible with certain types of vegetation because of its composition. I agree that the District will not be liable for damages that may occur to vegetation or for damages that may occur due to uses of recycled water. I hereby acknowledge and consent to the District's use at its option of recycled water in lieu of potable water for the purposes herein mentioned in accordance with the Rules and Regulations for Recycled Water and in conformance with the State Water Resources Control Board General Permit Order No. 2009-0006-DWQ.

Owner/Customer's Signature: \_\_\_\_\_ Date: \_\_\_\_\_

MAINTENANCE COMPANY NAME: \_\_\_\_\_

ADDRESS: \_\_\_\_\_

ONSITE SUPERVISOR'S NAME: \_\_\_\_\_ TITLE: \_\_\_\_\_

TELEPHONE NO: \_\_\_\_\_ FAX NO \_\_\_\_\_ E-MAIL: \_\_\_\_\_

AFTER HOURS TELEPHONE NO \_\_\_\_\_

I have reviewed the District's Rules and Regulations for Recycled Water and certify that the operation and documentation of this recycled water system and other on-site water systems will be in accordance with all applicable requirements contained therein, including certification of the on-site supervisor, who is directly responsible for the education and training of all employees under his control and of any individuals performing work at a use site under his control.

Onsite Supervisor's Signature: \_\_\_\_\_ Date: \_\_\_\_\_

DISTRICT USE ONLY

I certify the recycled water system described above and the certification of the on-site supervisor who's name is shown above is in accordance with all applicable requirements contained in the District's Rules and Regulations for Recycled Water.

Name: \_\_\_\_\_ Title: \_\_\_\_\_

Signature: \_\_\_\_\_ Date: \_\_\_\_\_

COPY OF USE PERMIT ISSUED TO OWNER/RESPONSIBLE  
PARTY, ON-SITE SUPERVISOR

| <b>OWNER/RESPONSIBLE PARTY</b>     | <b>ON-SITE SUPERVISOR</b>          |
|------------------------------------|------------------------------------|
| DATE:                              | DATE:                              |
| BY: <input type="checkbox"/> MAIL  | BY: <input type="checkbox"/> MAIL  |
| <input type="checkbox"/> FAX       | <input type="checkbox"/> FAX       |
| <input type="checkbox"/> E-MAIL    | <input type="checkbox"/> E-MAIL    |
| <input type="checkbox"/> IN PERSON | <input type="checkbox"/> IN PERSON |

**APPENDIX 6**  
**EL TORO WATER DISTRICT**  
**RECYCLED WATER TESTING FORM**

**Project Name or HOA:**

|                                                                                                                                        |                                                                                     |                                                                                                          |                                  |
|----------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------|----------------------------------|
| RW system type: <b>Irrigation</b>                                                                                                      |                                                                                     | Initial Inspection: Yes:      No:      Annual:      Four Year:                                           |                                  |
| HOA /Owner:<br>On-Site HOA Mgmt. Co.:<br>Contact/Manager (Site Supervisor):<br>On Site Address:<br><br>Management Co. Mailing Address: |                                                                                     | HOA Management/Owner Contact Information<br><br>Phone:                      Email:<br><br>Other Contact: |                                  |
| Maintenance Company (if applicable):<br><br>Maintenance Company Supervisor:                                                            |                                                                                     | Phone #:<br>Email:<br><br>Other Contact:                                                                 |                                  |
| <b>Service Address:</b>                                                                                                                |                                                                                     | <b>Meter Location:</b>                                                                                   |                                  |
| ETWD (R.W.E.P.) Phase: One:      Two:                                                                                                  |                                                                                     |                                                                                                          |                                  |
| GIS Coordinates:                                                                                                                       |                                                                                     | <b>Meter No.</b>                                                                                         |                                  |
| <b>Inspection of Recycled Water System:</b> (C=Compliant, NC= Non-Compliant, N/A=Not Applicable)                                       |                                                                                     |                                                                                                          |                                  |
|                                                                                                                                        |                                                                                     | <b>Inspection Date:</b>                                                                                  | <b>Inspection or Site Notes:</b> |
| 1. No Cross Connections                                                                                                                | C <input type="checkbox"/> NC <input type="checkbox"/> N/A <input type="checkbox"/> |                                                                                                          |                                  |
| 2. Riveted RW Identification Tags Attached                                                                                             | C <input type="checkbox"/> NC <input type="checkbox"/> N/A <input type="checkbox"/> |                                                                                                          |                                  |
| 3. Warning stickers on controller                                                                                                      | C <input type="checkbox"/> NC <input type="checkbox"/> N/A <input type="checkbox"/> |                                                                                                          |                                  |
| 4. Signs posted & visible.                                                                                                             | C <input type="checkbox"/> NC <input type="checkbox"/> N/A <input type="checkbox"/> |                                                                                                          |                                  |
| 5. RW Riser Id. (e.g. tags, decals, etc.)                                                                                              | C <input type="checkbox"/> NC <input type="checkbox"/> N/A <input type="checkbox"/> |                                                                                                          |                                  |
| 6. Quick couplers at P.O.C location                                                                                                    | C <input type="checkbox"/> NC <input type="checkbox"/> N/A <input type="checkbox"/> |                                                                                                          |                                  |
| 7. Backflow devices for DW systems                                                                                                     | C <input type="checkbox"/> NC <input type="checkbox"/> N/A <input type="checkbox"/> |                                                                                                          |                                  |
| 8. Hours of operation (9pm-6am)                                                                                                        | C <input type="checkbox"/> NC <input type="checkbox"/> N/A <input type="checkbox"/> |                                                                                                          |                                  |
| 9. Overspray, ponding, or runoff                                                                                                       | C <input type="checkbox"/> NC <input type="checkbox"/> N/A <input type="checkbox"/> |                                                                                                          |                                  |
| 10. No unapproved connections or uses                                                                                                  | C <input type="checkbox"/> NC <input type="checkbox"/> N/A <input type="checkbox"/> |                                                                                                          |                                  |
| 11. Eating areas protected                                                                                                             | C <input type="checkbox"/> NC <input type="checkbox"/> N/A <input type="checkbox"/> |                                                                                                          |                                  |
| 12. Drinking fountains protected                                                                                                       | C <input type="checkbox"/> NC <input type="checkbox"/> N/A <input type="checkbox"/> |                                                                                                          |                                  |
| Cross-Connection Shut-Down Test: <b>One Way:</b> <b>Two Way:</b><br>Pass. <input type="checkbox"/> Fail <input type="checkbox"/>       |                                                                                     | Site Supervisor Receipt of "Do's and Don'ts": Yes:      No:                                              |                                  |
| ETWD Representative: _____                                                                                                             |                                                                                     | Notes:                                                                                                   |                                  |
| H.O.A. Representative (If Present): _____                                                                                              |                                                                                     |                                                                                                          |                                  |

[illegible]

**APPENDIX 7**  
**EL TORO WATER DISTRICT**  
**RECYCLED WATER SPILL REPORT**  
**(Please type)**

USE SITE NUMBER: \_\_\_\_\_ ACCOUNT NO: \_\_\_\_\_ METER NO: \_\_\_\_\_  
(Completed by District)

USE SITE NAME: \_\_\_\_\_

USE SITE ADDRESS OR LOCATION: \_\_\_\_\_

OWNER/CUSTOMER NAME: \_\_\_\_\_

ADDRESS: \_\_\_\_\_

CONTACT PERSON: \_\_\_\_\_ TITLE: \_\_\_\_\_

TELEPHONE NO: \_\_\_\_\_ FAX NO: \_\_\_\_\_ E-MAIL: \_\_\_\_\_

ON-SITE SUPERVISOR: \_\_\_\_\_

***INFORMATION ON SPILL OR UNAUTHORIZED DISCHARGE***

Date/time spill or discharge began: \_\_\_\_\_

Date/time spill or discharge ended: \_\_\_\_\_

Location of spill or discharge: \_\_\_\_\_

Did recycled water enter or will it enter storm drains or receiving waters (e.g., creek, stream, lake);  
\_\_\_\_\_ If so identify: \_\_\_\_\_

Estimated volume of spill or discharge: \_\_\_\_\_

Estimated time of repair: \_\_\_\_\_

If still ongoing, estimate flow rate (gallons/minute): \_\_\_\_\_

Agencies/entities involved with repair and/or clean-up: \_\_\_\_\_

Cause of the spill or discharge: \_\_\_\_\_

Corrective actions taken and when, or plan to correct spill/discharge: \_\_\_\_\_

## **APPENDIX 8**

### **EL TORO WATER DISTRICT**

#### **“ON-SITE” SUPERVISOR DO’S AND DON’TS**

##### **DO’S**

- Educate/train operations personnel on the safe use and restrictions of recycled water.
- Install and maintain signs at all points of entry (pedestrian and vehicular).
- Install and maintain labels and tags on recycled, potable, and non-potable water systems.
- Use quick coupling valves instead of hose bibs on recycled water systems.
- Operate irrigation system:
  - Between 10:00 p.m. and 6:00 a.m., if automatically controlled (unless other restrictions apply);
  - At other times, if manually controlled and supervised (someone present) to make sure the recycled water does not come in contact with the public;
  - At any time, if public access to the reuse site is restricted.
- Prevent runoff from reuse sites due to overspray from sprinklers, overflow of ponds that contain recycled water, over watering, or broken sprinklers or irrigation lines.
- Quickly repair any breaks in recycled water irrigation lines and broken sprinklers.
- Be familiar with all notification requirements if any of the following has occurred:
  - A recycled water line break, spill or offsite discharge of recycled water;
  - A noncompliance of the District’s Requirements or Use Permit;
  - A cross-connection between the recycled water and potable water systems;
  - Any safety or health issues.
- Schedule all required backflow prevention required annually
- Schedule all cross-connection testing required at least annually
- Assist and cooperate during cross-connection testing.
- Assist and cooperate during periodic site inspections conducted by the District.
- Thoroughly wash tools used for the recycled water system if used for the potable water system.
- Contact the District if any water system (recycled or potable) modifications are anticipated.
- Keep records and as-built drawings up-to-date and accessible.
- Submit all required information and maintenance reports.



## **DON'Ts**

- Don't drink recycled water.
- Don't use recycled water to wash hands or any other part of body.
- Don't remove recycled water identification signs, tags or labels.
- Don't cross-connect two dissimilar water systems (recycled or potable).
- Don't allow recycled water to contact drinking fountains or eating areas.
- Don't allow recycled water to pond or puddle.
- Don't allow recycled water to runoff the use site property or either overspray or overwater.
- Don't use recycled water on an unapproved site.
- Don't put hose bibs on recycled water systems (unless approved by the District and public access is restricted).
- Don't use the same equipment on both recycled water and domestic water systems (for example: quick coupling valves, hoses, tools, etc.).
- Don't significantly modify the recycled or potable water systems without prior approval of the District, State Water Resources Control Board Division of Drinking Water (DDW) and/or Orange County Health Care Agency (OCHCA).



## STAFF REPORT

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**To: Board of Directors**

**Meeting Date: October 24, 2024**

**From: Dennis Cafferty, General Manager**

**Subject: ETWD Board Vacancy**

---

Director Fred Adjarian will be resigning from the El Toro Water District Board of Directors effective October 31, 2024. Government Code Section § 1770 defines requirements for filling a vacancy in office of a special district. A summary of these procedures follows:

**Vacancy** - The District shall notify the Orange County Registrar of Voters' office of the vacancy no later than 15 days following the effective date of the vacancy.

**Action Required by the Board** - The remaining District board members have 60 days immediately subsequent the effective date of the vacancy to fill the vacancy either by appointment or by calling a special election.

**Appointment** - If the Board decides to appoint someone to fill the vacancy, the Board first must post a notice of the vacancy in three or more conspicuous places in the District at least 15 days before the appointment is made.

The Board must notify the Orange County Registrar of Voters' office of the appointment no later than 15 days after the appointment is made.

The person appointed shall hold office until the next general District election and will therefore be required to seek election in 2026.

**Calling an Election** - In lieu of making an appointment the remaining members of the Board may, within 60 days of the effective date of the vacancy, call an election to fill the vacancy. The election shall be held on the next established election date that is 130 or more days after the date the district board calls the election.

**Failure to Act** - If the vacancy is not filled by the District Board by either making an appointment or calling a special election within 60 days of the effective date of the vacancy, within the next 30 days the Orange County Board of Supervisors may fill the vacancy by appointment or may order the district to call an election to fill the

vacancy. If within 90 days of the effective date of the vacancy no action has been taken by any governing body to fill the vacancy by appointment or by calling for a special election, the District must call an election to fill the vacancy.

Traditionally the Board has elected to fill vacant seats on the Board through appointments. Proposed schedules outlining two options for the appointment process, compliant with the above-described requirements, are attached for discussion and consideration by the Board.

The first schedule (noted as Option 1) identifies a timeline which provides approximately one month for the application process and seats a new Director at the December Board meeting. This process provides additional time for the application process but leaves the Board with only four Board members during the November Board cycle including the important discussions regarding SOCWA.

The second schedule (noted as Option 2) identifies a more aggressive timeline which seats a new Director in November. Under this approach, applications would be due 19 days after the District posts the notice of vacancy. Although somewhat fast, this schedule complies with the requirements. The advantage of the accelerated approach is the restoration to a full Board for the November meetings.

The Board will have the opportunity to weigh and discuss the advantages and disadvantages of each approach at the October 24 Board meeting as it determines how it wishes to direct staff to proceed.

### **Recommended Action:**

The Board of Directors will provide the District's Secretary with direction as to how to proceed to fill the vacancy created by the resignation of Director Fred Adjarian.

## **Proposed Timeline / Milestone Dates for Board Appointment Process**

### **Option 1**

|                                        |                   |
|----------------------------------------|-------------------|
| Vacancy effective Date:                | October 31, 2024  |
| 60 Day Expiration Date:                | December 30, 2024 |
| Board directs staff to Notice Vacancy: | October 24, 2024  |

#### **Process:**

|     |                                                  |                                                   |
|-----|--------------------------------------------------|---------------------------------------------------|
| (1) | Notify OC ROV of Vacancy:                        | November 4, 2024                                  |
| (2) | Post Notice of vacancy:                          | November 4, 2024                                  |
|     | • <b><i>15-days prior to Appointment</i></b>     |                                                   |
|     | • <b><i><u>Minimum legal requirement</u></i></b> |                                                   |
|     | <b><i>Post in 3 Conspicuous Locations</i></b>    |                                                   |
| (3) | Applications/Resumes due:                        | December 5, 2024 <b><i>(31 days)</i></b>          |
| (4) | Special Board Meeting/Interviews:                | December 17, 2024                                 |
| (5) | Appointment/Swearing in:                         | December 19, 2024 <b><i>(Dec. Board Mtg.)</i></b> |
| (6) | Notify OC ROV of Appointment:                    | December 19, 2024 <b><i>(1)</i></b>               |

***(1) 11 days left before 60-day Expiration Date***

#### **Vacancy Posting and Circulation Options:**

- Post at ETWD Office
- Post at the LW and MV Libraries
- Submit ads to the Saddleback News
- Post on ETWD social media
  - Boost the Post on Facebook to allow more interested applicants to see it in the 5 cities we serve
- Post on the ETWD website
- Distribute Notice of Vacancy to all Cities that we serve and request they share the Notice on their social media

## **Proposed Timeline / Milestone Dates for Board Appointment Process**

### **Option 2**

|                                        |                   |
|----------------------------------------|-------------------|
| Vacancy effective Date:                | October 31, 2024  |
| 60 Day Expiration Date:                | December 30, 2024 |
| Board directs staff to Notice Vacancy: | October 24, 2024  |

#### **Process:**

|     |                                                  |                                                      |
|-----|--------------------------------------------------|------------------------------------------------------|
| (1) | Notify OC ROV of Vacancy:                        | October 31, 2024                                     |
| (2) | Post Notice of vacancy:                          | October 31, 2024                                     |
|     | • <b><i>15-days prior to Appointment</i></b>     |                                                      |
|     | • <b><i><u>Minimum legal requirement</u></i></b> |                                                      |
|     | <b><i>Post in 3 Conspicuous Locations</i></b>    |                                                      |
| (3) | Applications/Resumes due:                        | November 19, 2024 <b><i>(19 days)</i></b>            |
| (4) | Special Board Meeting/Interviews:                | November 21, 2024                                    |
| (5) | Appointment/Swearing in:                         | November 22, 2024 <b><i>(Special Board Mtg.)</i></b> |
| (6) | Notify OC ROV of Appointment:                    | November 22, 2024 <b><i>(1)</i></b>                  |

***(1) 38 days left before 60-day Expiration Date***

#### **Vacancy Posting and Circulation Options:**

- Post at ETWD Office
- Post at the LW and MV Libraries
- Submit ad to the Saddleback Valley News
- Post on ETWD social media
  - Boost the Post on Facebook to allow more interested applicants to see it in the 5 cities we serve
- Post on the ETWD website
- Distribute Notice of Vacancy to all Cities that we serve and request they share the Notice on their social media



## STAFF REPORT

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**To:** Board of Directors **Meeting date:** October 24, 2024

**From:** Dennis Cafferty, General Manager

**Subject:** Proposed Updates/Revisions to CSDA Bylaws

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The last CSDA bylaws updates were made in 2021 with the primary changes being Rights of Regular Membership, Retiree Membership, use of “member”, Procedure for Termination of Membership, Annual Report, and dual directorships with CSDA’s Alliance partner, Special District Risk Management Authority (SDRMA).

Following receipt of feedback and suggestions over the last few years from members, CSDA has conducted a review of the CSDA Bylaws making the necessary updates as well as additions or improvements. There are numerous verbiage and grammar updates as well as more significant proposed updates that include:

- Clarification that Retired Members are non-voting members
- Clarification related to termination of membership
- New Section under Article III, Section 2: Early Assumption of Office
- New Section under Article III, Section 2: Change in Regular Voting Member Affiliation
- Update noticing, balloting and election timeframes to allow some additional flexibility in the Board election process
- New Section under Article III, Section 7: A CSDA director shall be disqualified from serving on the CSDA Board if they are no longer a board member or managerial employee of a Regular Member district in the Network they were elected or appointed from
- Committee structure: amend to allow that Committee Vice-Chairs, with the exception of the CSDA Finance Corporation Committee, may be individuals from Regular Members districts in good standing

## RECOMMENDATION

Staff recommends that the Board of Directors consider casting a ballot in favor of the proposed Bylaw updates/revisions as recommended by the CSDA Board of Directors.



## **BYLAWS**

### **California Special Districts Association**

#### **Approved Bylaw Revision Dates:**

**Revised 1996**

**Revised 1999**

**Revised 2004**

**Revised October 1, 2009**

**Revised August 2, 2010**

**Revised August 1, 2011**

**Revised July 1, 2014**

**Revised July 1, 2016**

**Revised November 15, 2021**

**Revised XXXXX XX, 2024**

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## ARTICLE I – GENERAL

### **Section 1. Purpose:**

In addition to the general and specific purposes set forth in the Articles of Incorporation of the California Special Districts Association (hereinafter referred to as “CSDA”), CSDA will provide outreach, advocacy, professional development, information, and other various services to member districts. CSDA will interact and collaborate, where appropriate, with the associations and groups that support or oppose its membership’s interests. The control and governance of CSDA shall be the responsibility of CSDA’s Board of Directors (the “Board of Directors”).

### **Section 2. CSDA Networks:**

The state of California shall be divided ~~along county boundaries~~ into six voting networks, using county boundaries to shape the respective networks. The areas of the networks are determined by the Board of Directors of CSDA. A map of the six (6) networks of CSDA is attached as Exhibit A.

### **Section 3. Principal Office:**

The principal business office of CSDA is located at 1112 I Street, Suite 200, Sacramento, California 95814. The Board of Directors shall have authority to change the principal office from one location to another.

## ARTICLE II – MEMBERSHIP

### **Section 1. Qualification of Membership:**

There may be several classes of membership in CSDA, as determined by the Board of Directors. The following classes have been adopted:

#### **A. Regular Voting Members:**

Regular voting members shall be any public agency formed pursuant to either general law or special act for the local performance of governmental or proprietary functions within limited boundaries, and which meets any one of the following criteria:

1. Meets the definition of “independent special district” set forth in Government Code Section 56044 by having a legislative body comprised entirely of elected members, or which members are appointed to fixed terms; or
2. The following public agencies: (a) air quality management districts; (b) air pollution control districts; (c) county water agencies or authorities; (d) transit or rapid transit districts, or transportation authorities; (e) metropolitan water districts; (f) flood control or water conservation districts; (g) sanitation agencies.

Regular voting members shall not include any state, cities, counties, school districts, community college districts, local agency formation commissions (LAFCOs), dependent districts, or joint powers authorities (JPAs) except as may be specifically referenced above.

Rights of Regular Membership: Regular voting members have voting privileges and may [have a member of the Board of Directors or a managerial employee](#) hold [a](#) seats on the Board of Directors. All Regular Members shall have the right to vote, as set forth in these bylaws, on the election of directors, on the disposition of all or substantially all of the corporation’s assets, on any merger and its principal terms and any amendment of those terms, and on any election to dissolve the corporation. In addition, Regular Members shall have all rights afforded members under the California Nonprofit Public Benefit Corporation Law.

#### **B. Associate Non-Voting Members:**

Associate members shall be public agencies such as dependent districts composed of appointees from a single public agency, cities, counties, joint powers authorities, and other public agencies that do not satisfy the criteria for regular voting membership specified in Section A above.

Associate members have no voting privileges, except as approved members on a CSDA committee, and may not hold a seat on the Board of Directors.

**C. Business Affiliate Non-Voting Members:**

Business Affiliate members shall be those businesses or organizations that provide [products or](#) services to special districts and have evidenced interest in the purposes and goals of CSDA. Business Affiliates have no voting privileges, except as approved members on a CSDA committee, and may not hold a seat on the Board of Directors.

**D. Retired Non-Voting Member (Individual Membership):**

Retired Individual members shall be those persons that are retired from service as a staff or board member at a special district and have at least 1 year of previous service.

Retired members shall not be affiliated with or serve as a consultant to any agency eligible for regular, associate, or business affiliate membership in CSDA. Retired members cannot be employed by a company that provides services or products to special districts.

Retired members have no voting privileges and may not hold a seat on the CSDA Board of Directors or any CSDA committees.

CSDA benefits available to retired members shall be determined by the CSDA Board of Directors.

**Section 2. Membership Application:**

Application for membership to CSDA will be directed to staff, who will determine if the applicant's interest and purpose is in common with CSDA. If the applicant meets the requirements of membership, the Board of Directors shall approve the new member by a majority vote of the Board [at the next regularly scheduled Board meeting](#). Acceptance to membership shall authorize participation in CSDA activities as specified in these Bylaws. The Board shall retain the authority to deny membership in CSDA at its discretion.

**Section 3. Membership Dues:**

The membership dues of CSDA shall be established annually by a majority vote of the Board of Directors at a scheduled Board meeting. Authority to adjust the dues shall remain with the Board of Directors.

**Section 4. Membership Voting:**

Matters to be voted upon by the authorized voting membership shall be determined by the Board of Directors in accordance with these Bylaws. Only those matters of which notice has been given to voting members by CSDA may be voted upon.

**A. Voting Designee:**

In accordance with these Bylaws, regular voting members in good standing shall have voting privileges. The governing body of each regular voting member shall designate one representative from their respective district who shall have the authority to exercise the right of the regular voting member to vote. Such voting designee shall be a Board ~~member~~ [Member](#) or managerial employee of the regular voting member.

**B. Voting Authorization:**

Regular voting members who have paid the required dues as set by the Board of Directors are members in good standing. Each regular voting member in good standing shall be entitled to one vote on all matters brought before the membership for vote at any meeting or by ballot.

**C. Non-Voting Members:**

CSDA may refer to Associate Members, [Retired Members](#) and Business Affiliate Members or other persons or entities associated with it, as “members”, even though those persons or entities are not voting Regular Members as set forth in Article II Section I A ~~hereof~~. No such reference as “members” shall constitute anyone as a voting member of this corporation unless that person or entity has qualified for voting Regular Membership pursuant to Article II Section I A of these Bylaws. The Board of Directors may adopt policies which grant some or all of the rights of a Regular Member, other than voting rights, to an Associate Member, [Retired Member](#) or Business Affiliate Member, but no such person or entity shall be a Regular Member by virtue of such grant of rights.

**Section 5. Membership Quorum:**

**A. Meeting Quorum:**

Twenty-five voting designees, as defined in Article II, Section 4, present at any annual or special meeting of the CSDA shall constitute a quorum. No regular voting member shall have the right to vote by means of an absentee or proxy ballot.

**B. Mailed or Electronic Ballot Quorum:**

Mail ballots or electronic ballots received from 25 voting designees officially designated by each regular voting member shall constitute a quorum. Each regular voting member shall be entitled to one vote. No regular voting member shall have the right to vote by means of a proxy.

**Section 6. Membership Meetings:**

**A. Annual Business Meeting:**

The annual business meeting of the members shall be held at the [CSDA Annual CSDA Conference](#) at such time and place as determined by the Board of Directors [or Staff](#). Written notice of the annual business meeting distributed by mail or electronically shall include all matters that the Board intends to present for action and vote by the members [if such a vote is required](#).

**B. Special Meetings:**

Special meetings of the members may be called at any time by the President, by a majority of the Board of Directors, or at least a quorum of the members (25 members). Such a special meeting may be called by written request, specifying the general nature of the business proposed to be transacted and addressed to the attention of and submitted to the President of the Board. The President shall direct the Chief Executive

Officer to cause notice to be given promptly to the members stating that a special meeting will be held at a specific time and date fixed by the Board. No business other than the business that was set forth in the notice of the special meeting may be transacted at a special meeting.

**C. Notice of Meetings:**

~~Whenever members are permitted~~In any case that members are requested to take any action at any annual or special meeting, written notice of the meeting distributed by mail or electronically shall be ~~given~~sent to each member entitled to vote at that meeting. The notice shall specify the place, date and hour of the meeting, and the means of communication to be utilized by and between CSDA and its members, if any, through which members may participate in the meeting. For the Annual Membership Meeting, the notice shall state the matters that the Board intends to present for action by the members. For a special meeting the notice shall state the general nature of the business to be transacted and shall state that no other business may be transacted. The notice of any meeting at which directors are to be elected shall include the names of all persons who are nominees when notice is given.

1. Notice Requirements. Written notice of any annual membership meeting shall be given at least 45 days before the meeting date either personally, by first class registered or certified mail, or by electronic transmission.

2. Electronic Notice. Notice given by electronic transmission by CSDA shall be valid if delivered by either (a) facsimile telecommunication or electronic mail when directed to the facsimile number or electronic mail address for that main contact member on record with CSDA; (b) posting on an electronic message board or ~~network website~~community that CSDA has designated for such communications, together with a separate electronic notice to each member of the posting; or (c) any other means of electronic communication. Such electronic transmission must be directed to ~~each~~a member which has ~~provided to CSDA an unrevoked~~not revoked consent to the use of electronic transmission for such communications. The method of electronic communication utilized must create a record that is capable of retention, retrieval and review by CSDA.

All such electronic transmissions shall include a written statement that each member receiving such communication has the right to have the notice provided in non-electronic form. Any member may withdraw its consent to receive electronic transmissions in the place of written communications by providing written notice to CSDA of such withdrawal of consent.

Notice shall not be given by electronic transmission by CSDA if CSDA is unable to deliver two (2) consecutive notices to a member by that means, or otherwise becomes aware of the fact that the member cannot receive electronic communications.

**D. Electronic Meetings:**

Members not physically present in person at either an annual or special meeting of members may participate in such a meeting by electronic transmission or by ~~electronic video screen communication~~use of web-based video communication software by and between such members and CSDA. Any eligible member participating in a meeting

electronically shall be deemed present in person and eligible to vote at such a meeting, whether that meeting is to be held at a designated place, conducted entirely by means of electronic transmission, or conducted in part by electronic communication between CSDA and those members who are not capable of being physically present at such designated meeting place.

Annual and special meetings of the members may be conducted in whole or in part by electronic transmission or by use of web-based video communication software ~~electronic video screen communication~~ by and between CSDA and its members if all of the following criteria are satisfied: (1) CSDA implements reasonable procedures to provide members participating by means of electronic communication a reasonable opportunity to participate in the meeting and to vote on matters submitted to the members, including an opportunity to hear the proceedings of the meeting including comments of members participating in person substantially concurrent with such proceedings; and (2) any votes cast by a member by means of electronic communication by and between CSDA and a member must be recorded and maintained in the minutes by CSDA.

#### **E. Majority Vote:**

Any matter submitted to the membership for action or approval shall constitute the action or approval of the members only when: (1) the number of votes cast by regular voting members present at the meeting equals or exceeds the quorum requirement of 25 ~~registered voters~~ regular voting members; and (2) the number of votes approving the action or proposal equals or exceeds a majority (i.e., 50% plus one) of the regular voting members present and casting votes on the issue.

#### **F. Solicitation of Written Ballots from Members:**

All solicitations of votes by written ballot, whether by means of electronic communication or first class mail, shall: (1) state the number of returned ballots needed to meet the quorum requirement ; (2) state, with respect to returned ballots other than for election of directors, that the majority of returned ballots must indicate approval of each measure in order to adopt such measure; and (3) specify the time by which the written ballot must be received by CSDA in order to be counted. Each written ballot so distributed shall: (1) set forth the proposed action; (2) give members an opportunity to specify approval or disapproval of each proposal; and (3) provide a reasonable time in which to return the ballots to CSDA either electronically or by first class mail.

Each written ballot distributed by first class mail shall be mailed to each regular voting member at least 45 days in advance of the date designated for return of the ballot by each such member to CSDA. Written ballots transmitted electronically to members shall be electronically communicated at least 45 days in advance of the date designated for return of the ballot by each member to CSDA.

#### **G. Return of Ballots:**

Written ballots shall be returned either by first class mail or by electronic communication to either the principal business address of CSDA or CSDA's designated electronic format specified on the ballot prior to the close of business (5:00 pm) on the designated election date. Written ballots received either by first class mail or electronic



communication from regular voting members after the specified date shall be invalid and shall not be counted.

**H. Number of Votes Required for Approval of Action on Written Ballot:**

Approval by written ballot shall be valid only when (1) the number of votes cast by written ballot either by means of electronic communication or first class mail within the specified time equals or exceeds the quorum required to be present at a meeting authorizing the action (25 votes); and (2) the number of ~~approvals~~ votes in favor of the action equals or exceeds the number of votes that would be required for approval at a meeting of members, (i.e. 50% plus one) of those participating members casting written ballots either electronically or by first class mail.

**Section 7. Termination of Membership:**

~~A member shall not be in good standing, and membership may be terminated,~~ On occurrence of any of the following events, a member shall no longer be in good standing, and membership may be terminated:

- A. Any member delinquent in the payment of dues for a period of three months after said dues are due and payable, shall be notified in writing of such arrearage, and shall be given written notice of possible termination. If such delinquent dues remain unpaid for 45 days after notice, the delinquent member shall automatically cease to be a member of CSDA. CSDA's Chief Executive Officer may approve special payment arrangements if deemed necessary including with those districts that may be members of the Special District Risk Management Authority (SDRMA).
- B. Determination by the Board of Directors that a member has failed in a material and serious degree to observe the rules of conduct or operational policies of CSDA, including but not limited to the Corporation's Anti-Trust Policies, or has engaged in conduct materially and seriously prejudicial to ~~this~~ CSDA's purposes and interests.

**Section 8. Procedure for Termination of Membership:**

If grounds exist for terminating the membership of a member under Section 7 ~~hereof~~ these bylaws, the following procedures shall be followed:

- A. The Board of Directors shall give the member at least 15 days prior written notice of the proposed termination and the reasons for the proposed termination of membership. Notice ~~shall~~ may be given by any method reasonably calculated to provide actual notice. Notice given by mail shall be sent by first-class mail to the member's last address as shown on CSDA records.
- B. The member shall be ~~given an opportunity to be heard~~ provided an opportunity to contest the termination, either orally or in writing, at least 5 days before the effective date of the proposed termination of \_\_\_\_\_ membership. ~~The A hearing meeting~~ shall be held in a time and manner determined by the Chief Executive Officer, or the written statement considered, by the Board of Directors which is responsible for determining in its sole discretion whether the termination of membership should occur.



- C. The Board of Directors shall determine whether the membership shall be terminated. The decision of the Board of Directors shall be final.

## ARTICLE III – DIRECTORS

### **Section 1. Number of Directors:**

The authorized number of elected directors to serve on the Board of Directors shall be 18. Each regular voting member shall be limited to one seat on the Board.

There shall be three directors elected from three different regular voting members in each of the six CSDA networks. Directors elected from each of the six networks shall hold staggered three-year terms.

### **Section 2 Term of Office:**

Directors elected from each of the six networks shall hold staggered three-year terms. After the annual election of directors, a meeting of the Board shall be held to ratify the election results. The term of office of the newly elected persons shall commence on the following January 1 and shall automatically terminate three years thereafter unless a newly elected or appointed Director is completing the remaining balance of an incomplete term due to a vacancy in a respective Director seat.

Early Assumption of Office.: In such cases, if there is a candidate-elect who has won the election and is willing to assume office early to fill a vacant seat, the Board of Directors may allow the candidate-elect to assume office prior to the regular January 1 start date.

Conditions: The candidate-elect assuming office early shall meet all eligibility requirements for Board membership.

Ratification: The early assumption of office by the candidate-elect shall be subject to ratification by the Board of Directors at its next regularly scheduled meeting following the completion of the election.

Change in Regular Voting Member Affiliation.: Any Director that is a board member or managerial employee of a member district and subsequently transitions to a board member or managerial employee position at another regular voting member district in the same Network, shall retain their seat and term.

Conditions: In order to retain voting rights on the CSDA Board of Directors, the Director shall provide a resolution or minute action from their new district within two months of the change affirming the individual Directors continued service on the CSDA Board of Directors.

### **Section 3. Nomination of Directors:**

Nomination of Directors seeking to serve on the Board shall be by network. Any regular voting member in good standing is eligible to nominate one person from their district to run for director of CSDA. The CSDA director nominee shall be a member of the board of directors of the district or a managerial employee as defined by that district's board of directors. Nomination of the director designee shall be made by a resolution or minute action of the regular voting member's

Board of Directors. Only one individual from each regular voting member district may be nominated to run at each election.

CSDA staff will review all nominations received and accept all that meet the qualifications set by these Bylaws. A slate of each network's qualified nominees will be transmitted by mail or electronic ballot to that network's regular voting membership for election pursuant to Article III, Section 4

#### **Section 4. Election of Directors:**

The Election and Bylaws Committee shall have primary responsibility for establishing and conducting elections for the Board of Directors. The Committee may enforce any regulation to facilitate the conduct of said elections. Directors shall be voted upon and elected by the regular voting members from the network from which they are nominated.

The Election and Bylaws Committee shall meet each year to review, with [CSDA](#) staff, the networks where election of directors will be necessary. The Committee will coordinate, with staff, the dates nomination requests shall be mailed to the regular voting members, the official date for the nomination requests to be received at the CSDA office, and set the date of the election.

##### **A. Written Notice:**

Written notice requesting nominations of candidates for election to the Board of Directors shall be sent by first class mail or electronically to each regular voting member in good standing on the date specified by the Election and Bylaws Committee, which shall be at least ~~120~~[100](#) days prior to the election. The nominations must be received either by mail or electronically by CSDA before the established deadline which shall be no later than 60 days prior to the election. Nominations received after the deadline date shall be deemed invalid. In the event an incumbent does not re-run for their seat, the nomination period for that network shall be extended by ten days.

##### **B. Balloting and Election:**

Voting for directors shall be by written ballot distributed by mail or by electronic transmission by CSDA directly or via authorized third-party to members eligible to vote in each network.

After the nomination period for directors is closed, a written ballot specifying the certified nominees in each network shall be distributed by first class mail or electronically to each regular voting member in that network. Each such regular member in good standing in each network shall be entitled to cast one vote for each of that network's open seats on the Board. In the event there is more than one seat available for election, regular members shall be entitled to a number of votes equal to the seats available for election in their network.

The ballot for each network shall contain all nominations accepted and approved by CSDA staff. In the event there is only one nomination in a network, the nominee shall automatically assume the Seat up for election and a ballot shall not be mailed or electronically transmitted. Staff will execute a Proof of Service certifying the date upon which all regular voting members of each network were sent a ballot, either by first class

mail or by electronic transmission. The form of written ballot and any related materials sent by electronic transmission by CSDA and completed ballots returned to CSDA by electronic transmission by participating members must comply with all of the requirements of Article II, Section 6(F-H) of these Bylaws. If a member does not consent to electronic communication for balloting purposes, a form of written ballot will be mailed to such participating member no later than 45 days prior to the date scheduled for such election. All written ballots shall indicate that each participating member may return the ballot by electronic communication or ~~first-class~~first-class mail.

All solicitations of votes by written ballot shall: (1) state the number of returned ballots needed to meet the quorum requirement ; (2) state, with respect to ballots for election of directors, that those nominees receiving the highest number of votes for each Board position subject to election will be certified as elected to that Board position.

Election of a nominee to a Board position shall be valid only when: (1) the number of votes cast by written ballot, transmitted either electronically or by first class mail, within the time specified, equals or exceeds the quorum required to be present at a meeting of members authorized in such action ; and (2) the number of written ballots approving the election of a nominee must be the highest number of votes cast for each respective Board position subject to election. ~~as would be required for an election of a nominee at a meeting of the members.~~

Written ballots shall be returned either by first class mail or by electronic mail communication to either the principal business address of CSDA or CSDA's designated electronic format specified on the ballot prior to the close of business (5:00 pm) on the designated election date, which shall be at least ~~45~~30 days prior to the Annual Conference. Written ballots received either by first class mail or electronic communication after the specified date shall be invalid and shall not be counted.

All written ballots received by mail shall remain sealed until opened in the presence of the Election and Bylaws Committee chairperson or their designee. All electronic ballots will be prepared, distributed, authenticated, received, tabulated, and kept secure and confidential. Election documents will be retained as outlined in CSDA's Board approved records retention policy.

### **Section 5. Event of Tie:**

In the event of a tie vote, a supplemental written ballot containing only the names of those candidates receiving the same number of votes shall be distributed either by first class mail or electronically to each regular voting member in the network where the tie vote occurred.

Those written ballots received by mail or electronically prior to the close of business (5:00 pm) on the date designated by the Election and Bylaws Committee shall be considered valid and counted. All supplemental written ballots received after the designated date whether by first class mail or electronically shall be deemed invalid. All written ballots received either by mail or electronically shall remain sealed as provided in Article III, Section 4.B of these Bylaws.

In the event the supplemental written ballot also results in a tie vote, the successful candidate will be chosen by a drawing by lot.

## **Section 6. Director Vacancy:**

In the event of a director vacating their seat on the Board of Directors, an individual who meets the qualifications as specified in [these Article III Section 3 of these Bylaws](#) may be appointed or elected to complete the director's unexpired term.

### **A. Two or Three Vacant Seats in the Same Network:**

In the event more than one seat on the CSDA Board of Directors in any one network is vacant at the same time, such vacancies shall be filled by election. A written ballot shall be prepared; listing all nominees for that network accepted and approved by CSDA and distributed to each regular voting member in each such network either by first class mail or by electronic communication pursuant to the provisions of Article III, Section 4.A and B of these Bylaws

Regular members of each network shall be entitled to cast one vote for each open seat in that network by returning a completed written ballot to CSDA either by first class mail or by electronic communication. The candidate receiving the most votes will be elected to the vacant seat with the longest remaining term. The candidate receiving the second highest number of votes will be elected to fill the vacant seat with the second longest remaining term. The candidate receiving the third highest number of votes will be elected to fill the vacant position with the third longest remaining term.

### **B. Vacancy Outside of Nomination Period**

In the event of a vacancy occurring outside of the nomination period timeframe, at the discretion of the CSDA Board, the vacancy may be filled by appointment or special election. The CSDA Board at its discretion may leave a vacancy that occurs outside of the nomination period unfilled until the next regularly scheduled election.

Should the CSDA Board choose to fill the vacancy by appointment, notification of the vacancy and request for nominations shall be sent by regular mail or electronic communication to all regular members in good standing in the network in which the vacancy occurred. The network's existing directors sitting on the CSDA Board shall interview all interested candidates of that network and bring a recommendation to the CSDA Board of Directors for consideration. The Board shall make the appointment to fill the unexpired term of the vacated Board position.

Should the CSDA Board choose to fill the vacancy by special election, written notification of the vacancy and request for nominations shall be sent either by first class mail or electronically to each regular member in good standing in the network in which the vacancy occurred. Nominations will be accepted for the vacant seat by first class mail or by electronic communication and shall be placed on the written ballot for election in that network. Such election shall be conducted pursuant to the provisions of Article III, Section 4.A and B hereof.

### **C. Vacancy During Nomination Period:**

In the event of a vacancy occurring during the nomination period, the vacancy shall be filled by election. Written notification of the vacancy and request for nominations shall be sent either by first class mail or electronically to each regular member in the network

in which the vacancy occurred. Nominations will be accepted for the vacant seat by first class mail or by electronic communication and shall be placed on the written ballot for election in that network. Such election shall be conducted pursuant to the provisions of Article III, Section 4.A and B ~~hereof~~of these bylaws.

### **Section 7. Director Disqualification:**

- A. A director shall be~~come~~ disqualified from further service on the Board of Directors or any committee upon the occurrence of any of the following:
1. A director's district is no longer a member of CSDA;
  - ~~2.~~ 3. A director is no longer a board member or an employee of a member district;
  - ~~2.3.~~ A director is no longer a board member or an managerial employee of a regular member district in the Network they were elected or appointed from;
  - ~~3.4.~~ A director is elected or appointed to the Board of Directors of the Special District Risk Management Authority (SDRMA) or
  - ~~4.5.~~ A director's resignation from CSDA.

Any officer or director may resign at any time by giving written notice to the President or CEO. Any such resignation shall take effect at the date of the receipt of such notice or at any time specified therein.

- B. The position of a director may be declared vacant by a majority vote of the CSDA Board of Directors when a director is unexcused and fails to attend three consecutive meetings of the Board or has not completed the Board Member requirements and expectations as outlined in policy.

### **Section 8. Powers of Directors:**

Subject to the limitations of these Bylaws, the Articles of Incorporation, and the California General Nonprofit Corporation Law, all corporate powers of the CSDA shall be exercised by or under the authority of the Board of Directors.

Directors shall serve without compensation. However, they shall be allowed reasonable reimbursement for pre-approved expenses incurred in the performance of their duties as Directors.

**Annual Report:** The Board of Directors shall cause an annual report to be sent to the members within 120 days after the end CSDA's fiscal year. That report shall contain the following information, in appropriate detail:

- The assets and liabilities of CSDA as of the end of the fiscal year;
- The principal changes in assets and liabilities;
- CSDA's revenue or receipts, both unrestricted and restricted to particular purposes;
- CSDA's expenses or disbursements for both general and restricted purposes.

The CSDA Annual Financial Audit shall serve as the Annual Report of CSDA.

### **Section 9. No Dual Directorships:**

During any period that CSDA is a participant in the Alliance Executive Council Memorandum of Understanding (MOU), the Board of Directors of CSDA shall appoint three (3) members of its board to serve as members of the Alliance Executive Council. No member of the Board of Directors of CSDA shall serve as a director on the board of SDRMA during the term of the MOU. In the event a director is elected to SDRMA, that director shall immediately be disqualified from further service on the Board of Directors of CSDA.

## **ARTICLE IV – DIRECTOR MEETINGS**

### **Section 1. Place of Meetings:**

Meetings of the Board of Directors shall be held in the state of California, at such places as the Board may determine. Directors may participate and have voting privileges remotely from other states and countries.

### **Section 2. Ratification Meeting:**

Following the election of Directors, the Board shall hold a meeting at such time and place as determined by the Board for the purpose of ratifying the newly elected directors and to transact other business of CSDA.

### **Section 3. Organization Meeting:**

After the ratification meeting, an organizational meeting of the Board shall be held at such time and place as determined by the Board for the purpose of electing the officers of the Board of Directors and the transaction of other business of CSDA.

### **Section 4. Planning Session:**

As directed by the Board of Directors, a special Strategic Planning Meeting shall be held to review, evaluate, and update the plans, policies and activities related to the business interests of CSDA. Timing and intervals of the Strategic Planning Meeting shall be determined by the Board of Directors.

### **Section 5. Regular Meetings:**

The dates of the regular meetings of the Board of Directors [on an annual basis](#) shall be ratified at the last Board meeting of the previous year. The meetings shall be held at such time and place as the Board may determine. The dates and places of the Board meetings shall be published in the CSDA's publications for the benefit of the members.

### **Section 6. Special Meetings:**

A special meeting of the Board of Directors may be called for any purpose at any time by the President or by any group of 10 directors or as described in Article II, Section 6.B.

Such meetings may be held at any place designated by the Board of Directors. In the event directors are unable to personally attend the special meeting, teleconferencing means will be made available.

Notice of the time and place of special meetings shall be given personally to the ~~directors,~~ or directors or sent by written or electronic communication. All written notices shall be sent at least ten days prior to the special meeting and electronic notices at least five days prior.

#### **Section 7. Board of Directors Meeting Quorum:**

A quorum of the Board of Directors for the purpose of transacting business of the CSDA shall consist of ten directors. A majority vote among at least ten directors present at a duly noticed meeting shall constitute action of the Board of Directors.

#### **Section 8. Board Meetings by Telephone and Electronic Communications:**

Any Board meeting may be held by conference telephone, use of web-based video communication software ~~video screen communication~~ or other electronic communications equipment. Participation in such a meeting under this Section shall constitute presence in person at the meeting if both of the following apply: (a) each Board member participating in the meeting can communicate concurrently with all other Board members; and (b) each member of the Board is provided a means of participating in all matters before the Board, including the capacity to propose or interpose an objection to a specific action to be taken by CSDA, and the capacity to vote on any proposal requiring action of the Board.

#### **Section 9. Official Records:**

All official records of the meetings of the CSDA shall be maintained at the principal business office of the CSDA or on official CSDA electronic file server(s).



## **ARTICLE V – OFFICERS**

### **Section 1. Number and Selection:**

The officers of CSDA shall be the President, Vice President, Secretary, Treasurer and the Immediate Past President. The officers shall be elected annually from the members of the Board of Directors without reference to networks. All officers shall be subordinate and responsible to the CSDA Board of Directors and shall serve without compensation.

Each officer shall hold office for the term of one year, or until resignation or disqualification.

The Board of Directors may appoint such other officers as the business of CSDA may require. Each of the appointed officers shall hold office for such period, have such authority, and perform such duties as are provided in these Bylaws or as the Board of Directors may determine.

### **Section 2. Duties of the President:**

The President shall be the chief officer of the CSDA and shall, subject to the approval of the Board of Directors, give supervision and direction to the business and affairs of CSDA.

The President shall preside at all Board of Director and membership meetings. The President shall be an ex-officio member of all Standing Committees. The President shall appoint committee chairs and vice-chairs and members of the Standing Committees, subject to confirmation by the Board of Directors.

The President shall have the general powers, duties and management usually vested in the office of the president of a corporation. The President shall have such other powers and duties as may be prescribed by these Bylaws or by the vote of the Board of Directors.

### **Section 3. Duties of the Vice President:**

In the absence of, or disability of the President, the Vice President shall perform all of the duties of the President. When so acting, the Vice President shall have all the powers of the President, and be subject to all the restrictions upon the President.

The Vice President shall be an ex-officio member of all of the Standing Committees.

### **Section 4. Duties of the Secretary:**

The Secretary or a designee appointed by the Board of Directors shall give notice of meetings to the Board of Directors, and notices of meetings to the members as provided by these Bylaws.

The Secretary or designee shall record and keep all motions and resolutions of the Board. A record of all meetings of the Board and of the members shall be maintained. All written records of the Secretary shall be kept at the business office of CSDA.

A list of the membership of CSDA shall be maintained by the Secretary or such designee. Such record shall contain the name, address and type of membership, of each member. The date of membership shall be recorded, and in the event the membership ceases, the date of termination.



The Secretary or designee shall perform such other duties as may be required by law, by these Bylaws, or by the Board of Directors.

#### **Section 5. Duties of the Treasurer:**

The Treasurer or a designee appointed by the Board of Directors shall keep and maintain adequate and correct accounts of the properties and the business transactions of CSDA, including accounts of its assets, liabilities, receipts, disbursements, gains and losses. The books of account shall at all times be open to inspection by any director or member of the CSDA.

The Treasurer or designee shall be responsible to cause the deposit of all moneys of the CSDA, and other valuables in the name and to the credit of CSDA, with such depositories as may be designated by the Board of Directors.

The Treasurer or designee, shall disburse, or cause to be disbursed by persons as authorized by resolution of the Board of Directors, the funds of CSDA, as ordered by the Board of Directors.

The Treasurer or designee shall serve as chair of the CSDA Fiscal Committee. The Treasurer shall render to the President and the Board of Directors an account of all financial transactions and the financial condition of CSDA at each Board meeting and on an annual basis, or upon request of the Board.

The Treasurer or designee shall, after the close of the fiscal year of CSDA, cause an annual audit of the financial condition of CSDA to be done.

The Treasurer or such designee shall perform such other duties as may be required by law, by these Bylaws, or by the Board of Directors.

#### **Section 6. Disbursement of Funds:**

No funds shall be disbursed by CSDA unless a check, draft or other evidence of such disbursement has been executed on behalf of CSDA by persons authorized by resolution of the Board of Directors.

#### **Section 7. Removal of Officers:**

Officers of the Board may be removed with or without cause at any meeting of the Board of Directors by the affirmative vote of a majority of the Board of Directors present at such meeting.

## ARTICLE VI – COMMITTEES

### **Section 1. Committee Structure:**

Each committee shall have a chair and a vice-chair. Committee chairs shall be a member of the Board of Directors, except for the CSDA Finance Corporation Committee. Committee Vice-Chairs may be individuals from Regular Member districts in good standing upon appointment by the CSDA Board President and ratification by the CSDA Board of Directors. Each committee shall have at least two Board members and no more than nine Board members. Directors may be appointed as alternate members of a committee, in the event of an absent committee member.

Other members of any committee may include designees of regular, associate or Business Affiliate members.

### **Section 2. Committee Actions:**

All actions of any committee of the CSDA shall be governed by and taken in accordance with the provisions of these Bylaws. All committees shall serve at the pleasure of the Board and have such authority as provided by the Board of Directors. Minutes of each committee meeting shall be kept-maintained and each committee shall present a report to the Board of Directors at each regularly scheduled Board meeting.

No committee may take any final action on any matter that, under these Bylaws, or under the California Nonprofit Public Benefit Corporation Law, also requires approval of the members of the CSDA.

All committees, regardless of Board resolution, are restricted from any of the following actions as imposed by the California Nonprofit Public Benefit Corporation Law:

- No committee may fill vacancies on the Board of Directors or on any committee that has authority of the Board, establish any other committees of the Board, or appoint the members of the committees of the Board.
- No committee may fix compensation of the directors for serving on the Board or on any committee, expend corporate funds to support a nominee for director, or approve any contract or transaction to which CSDA is a party and in which one or more of its directors has a material financial interest.
- No committee may amend or repeal Bylaws or adopt new Bylaws or amend or repeal any resolution of the Board that by its express terms is not subject to amendment or repeal.

### **Section 3. Committee Meetings:**

Meetings of the committees of CSDA shall be held in accordance with the provisions of these Bylaws. The time and place for regular meetings of such committees may be determined by the Board or by such committees. Special meetings of the committees may be called by the chair of such committee, or by the Board of Directors.

Written notice of any regular or special committee meeting may be given either personally, by first class mail, or by electronic transmission as specified in Article II, Section 6.C.2 of these Bylaws. Any committee meeting may also be held by conference telephone, [use of web-based video communication software](#) or other electronic communication equipment. Participation in such a meeting under this Section shall constitute presence in person at the committee meeting if both of the following apply: (a) each committee member participating in the meeting can communicate concurrently with all other committee members; and (b) each member of the committee is provided a means of participating in all matters before the committee, including the capacity to propose or interpose an objection to a specific action to be taken by that committee, and the capacity to vote on any proposal requiring action or recommendation by the committee.

#### **Section 4. Standing Committees:**

Standing Committees of CSDA shall be advisory in nature except for the Finance Corporation (see Section 4D). The Standing Committees are: Executive, Professional Development, Elections and Bylaw, Finance Corporation, Fiscal, Legislative, Member Services and Audit.

The President shall recommend the appointment of committee officers and members of each Standing Committee except the Executive Committee. All committee members are subject to ratification by the Board of Directors.

##### **A. Executive Committee:**

The Executive Committee shall consist of all officers of CSDA: the President, Vice President, Secretary, Treasurer and the Immediate Past President of CSDA. If the Immediate Past President is no longer a member of the Board of Directors, a previous past president may be appointed. If there are no directors who have served previously as President, the President shall appoint a current director to serve as a member of the Executive Committee.

Subject to these Bylaws and approval of the Board of Directors, the Executive Committee shall have full power, authority and responsibility for the operation and function of the CSDA.

##### **B. Professional Development Committee:**

The Professional Development Committee shall provide advice, feedback and general guidance for CSDA professional development programs and events.

##### **C. Election and Bylaws Committee:**

The Election and Bylaws Committee shall be responsible for conducting all elections for the CSDA Board of Directors as provided in these Bylaws. The Committee shall annually review the Bylaws and shall be responsible for membership vote on any bylaw changes and approval of election materials.

##### **D. Finance Corporation Committee:**

The Finance Corporation Committee shall serve as ex officio members of the Board of Directors of the CSDA Finance Corporation, a California non-profit public benefit corporation organized to provide financial assistance to CSDA members in acquiring, constructing and financing various public facilities and equipment for the use and benefit of the public. The Finance Corporation Committee is not an advisory committee, but rather has all of the powers described in the CSDA Finance Corporation Bylaws, which are incorporated herein by this reference. Such powers include the powers to manage and control the business affairs of the corporation, to approve policies for the corporation's operations, and to enter into all contracts necessary to provide financial assistance to CSDA members.

**E. Fiscal Committee:**

The Treasurer shall serve as the chair of the Fiscal Committee and shall, with the Committee, be responsible for oversight of all the financial transactions of the CSDA. An annual budget shall be reviewed by the committee and ratified by the Board of Directors.

**F. Legislative Committee:**

The Legislative Committee shall be responsible for the development of CSDA's legislative agenda and advocacy priorities. The Legislative Committee shall review, direct and assist the CSDA Advocacy and Public Affairs Department with legislative and public policy issues.

**G. Member Services Committee:**

The Member Services Committee shall be responsible for recruitment and retention activities as well as recommendation of new members and benefits to the CSDA Board of Directors. All new members shall be ratified by the Board of Directors.

**H. Audit Committee:**

The Audit Committee is responsible for maintaining and updating internal controls. The Committee selects the Auditor for Board of Directors approval and provides guidance to the auditors on possible audit and fraud risks. The Committee reviews the audit and management letter and makes recommendation to the Board of Directors for action.

**Section 5. Ad Hoc Committees:**

The President may appoint other Ad Hoc Committees and their officers as may be determined necessary for the proper operation of the CSDA. The Standing Committees and the Ad Hoc Committees shall plan and authorize such programs as may be directed by the Board of Directors.

The Ad Hoc Committees shall be advisory in nature and shall be composed of at least two members of the Board of Directors. Other members of such committees may include designees of regular, associate or professional members, or members of the public, as approved by the Board of Directors.

## **Section 6. Special Committee of the Board:**

A Special Committee may be granted authority of the Board as a Committee of the Board, as required by the California Nonprofit Public Benefit Corporation Law, provided by a specific resolution adopted by a majority of the Board of Directors then in office. In such case, the Special Committee shall be composed exclusively of two or more directors, but less than a quorum of the Board of Directors.

## **ARTICLE VII – INDEMNIFICATION**

### **Section 1. Right of Indemnity:**

To the fullest extent permitted by law, the CSDA shall defend, indemnify and hold harmless both its past and present directors, officers, employees and other persons described in Section 5238(a) of the California Corporations Code, against any and all actions, expenses, fines, judgments, claims, liabilities, settlements and other amounts reasonably incurred by them in connection with any “proceeding”, as that term is used in the Section 5238(a) of the California Corporations Code.

“Expenses”, as used in these Bylaws, shall have the same meaning as in Section 5238(a) of the California Corporations Code.

### **Section 2. Approval of Indemnity:**

On written request to the Board by any person seeking indemnification under Section 5238(b) or Section 5238(c) of the California Corporations Code, the Board shall promptly determine under Section 5238(e) of the California Corporations code whether the applicable standard of conduct set forth in Section 5238(b) or Section 5238(c) has been met, and if so, the Board shall authorize indemnification.

If the Board cannot authorize indemnification because the number of directors who are parties to the proceeding with respect to which indemnification is sought prevents the formation of a quorum of directors who are not parties to that proceeding, the Board shall promptly call a meeting of the members.

At the request for indemnification meeting, the members shall determine under Section 5238(e) of the California Corporations Code whether the applicable standard or conduct set forth in Section 5238(b) or Section 5238(c) has been met, and, if so, the members present at the meeting in person or by proxy shall authorize indemnification.

### **Section 3. Insurance:**

CSDA shall have the right to purchase and maintain insurance to the full extent permitted by law, on behalf of its officers, directors, employees, and agents, against any liability asserted against or incurred by any officer, director, employee or agent in such capacity, or arising out of the officer's, director's, employee's, or agent's status as such.

#### **Section 4. Liability:**

No member, individual, director, or staff member of the CSDA shall be personally liable to the CSDA's creditors, or for any indebtedness or liability. Any and all creditors shall look only to the CSDA's assets for payment.

### **ARTICLE VIII – AFFILIATED CHAPTERS**

#### **Section 1. Purpose:**

The purpose of affiliated chapters is to provide local forums of members for the discussion, consideration and interchange of ideas concerning matters relating to the purposes and powers of special districts and the CSDA.

The affiliated chapters may meet to discuss issues bearing upon special districts and the CSDA. The chapters may make recommendations to the CSDA's Board of Directors.

#### **Section 2. Organization:**

The regular voting members of CSDA are encouraged to create and establish affiliated chapters. In order to be recognized as a CSDA Chapter, each Chapter must approve and execute a Chapter Affiliation Agreement in order to obtain the right to use the CSDA name, logo, membership mailing list, intellectual property, endorsements, and CSDA staff support and technical assistance in conducting Chapter activities. The terms and conditions of the Chapter Affiliation Agreement are incorporated herein by this reference.

Each chapter formed prior to August 1, 2011 must have at least one CSDA member in their membership at all times, including but not limited to the following chapters: Alameda, Butte, Contra Costa, Kern, Marin, Monterey, Orange (ISDOC), Placer, Sacramento, San Bernardino, San Diego, San Luis Obispo, San Mateo, Santa Barbara, Santa Clara and Ventura. Such existing chapters may include as members: local organizations and businesses, districts and professionals who are not members of CSDA.

New chapters formed after August 1, 2011, are required to have 100 percent of their special district members as current members of CSDA in order to be a chapter affiliate of CSDA. Such chapters may include as members: local organizations/businesses and professionals who are not members of CSDA.

Affiliated chapters shall be determined upon approval and execution of the Chapter Affiliation Agreement by the chapter and approval and ratification of the Chapter Affiliation Agreement by the CSDA Board of Directors. The chapters shall be required to provide updated membership lists to the CSDA at least annually or upon request by the President or CEO.

No partnership or joint venture shall be established between CSDA and its affiliated chapters by reason of the provisions of these Bylaws or the Chapter Affiliation Agreement.

### **Section 3. Rules, Regulations and Meetings:**

Each affiliated chapter shall adopt such rules and regulations, meeting place and times as the membership of such affiliated chapter may decide by majority vote. Rules and regulations of the affiliated chapter shall not be inconsistent with the Articles of Incorporation or Bylaws of CSDA.

### **Section 4. Financing of Affiliated Chapters:**

No part of CSDA's funds shall be used for the operation of the affiliate chapters. CSDA is not responsible for the debts, obligations, acts or omissions of the affiliate chapters.

### **Section 5. Legislative Program Participation:**

Affiliate chapters may function as a forum regarding federal, state and local legislative issues. The chapters may assist CSDA in the distribution of information to their members.

## **ARTICLE IX – AMENDMENTS TO THE BYLAWS**

### **Section 1. Amendment Proposals:**

Any regular voting member in good standing may propose changes to these Bylaws. The proposed amendments shall be reviewed by the Board of Directors and submitted to the Election and Bylaws Committee for their study.

After examination by the Election and Bylaws Committee and upon approval by the Board of Directors the amendment proposals may be submitted for vote at the Annual Business meeting of the members held by CSDA, at a specially called meeting, or by mail or electronic ballot.

### **Section 2. Amendment Membership Meeting:**

Prior notice in writing of the proposed amendments to these Bylaws shall be given either by first class mail or by electronic transmission by the Board of Directors to the regular voting members in good standing, not later than 45 days in advance of the amendment meeting pursuant to the provisions of Article II, Section 6.C of these Bylaws. The electronic notice shall include copies of the proposed amendments.

Electronic copies of the proposed amendments shall also be available on the CSDA website for review by the regular voting members prior to the meeting. Copies of the proposed amendments shall also be available for the regular voting members at the amendment membership meeting.

The amendment membership meeting may be conducted as an electronic meeting pursuant to the provisions of Article II, Section 6.D of these Bylaws.

### **Section 3. Written Bylaw Amendment Ballot:**

The Board of Directors of CSDA may submit Bylaw amendments for approval of regular voting members by mail or electronic ballot rather than by means of an amendment membership meeting.

When a written ballot is used to amend these Bylaws, the ballot shall include the text of all proposed Bylaw amendments the Board of Directors intends to present for vote by the members. Such written ballot shall contain the information specified in Article II, Section 6.F of these Bylaws and shall be distributed to regular voting members either by first class mail or by electronic transmission at least 45 days in advance of the date designated for return of the ballot.

Written ballots shall be returned either by first class mail or by electronic communication to either the principal business address of CSDA or CSDA's designated electronic format specified on the ballot prior to the close of business (5:00 pm) on the designated election date. Written ballots received either by first class mail or electronic communication after the specified date shall not be counted and will be deemed invalid.



#### **Section 4. Bylaw Amendment Ratification:**

##### **A. Membership Meeting:**

The proposed Bylaw amendments shall be deemed adopted by the members when the number of votes cast by regular voting members present at such membership meeting meets or exceeds the required quorum of 25 regular voting members, and the number of votes cast approving the Bylaw amendments constitutes a majority of votes cast, i.e., 50% plus one of regular voting members casting ballots at such meeting.

##### **B. Mail or Electronic Ballot:**

The proposed Bylaw amendment/s shall be deemed adopted by a majority of the regular voting members by mail or electronic ballot when the provisions of Article II, Section 6.H of these Bylaws have been satisfied.



# **GENERAL MANAGER'S REPORT**

**October 2024**

## **I. OFFICE OF THE GENERAL MANAGER**

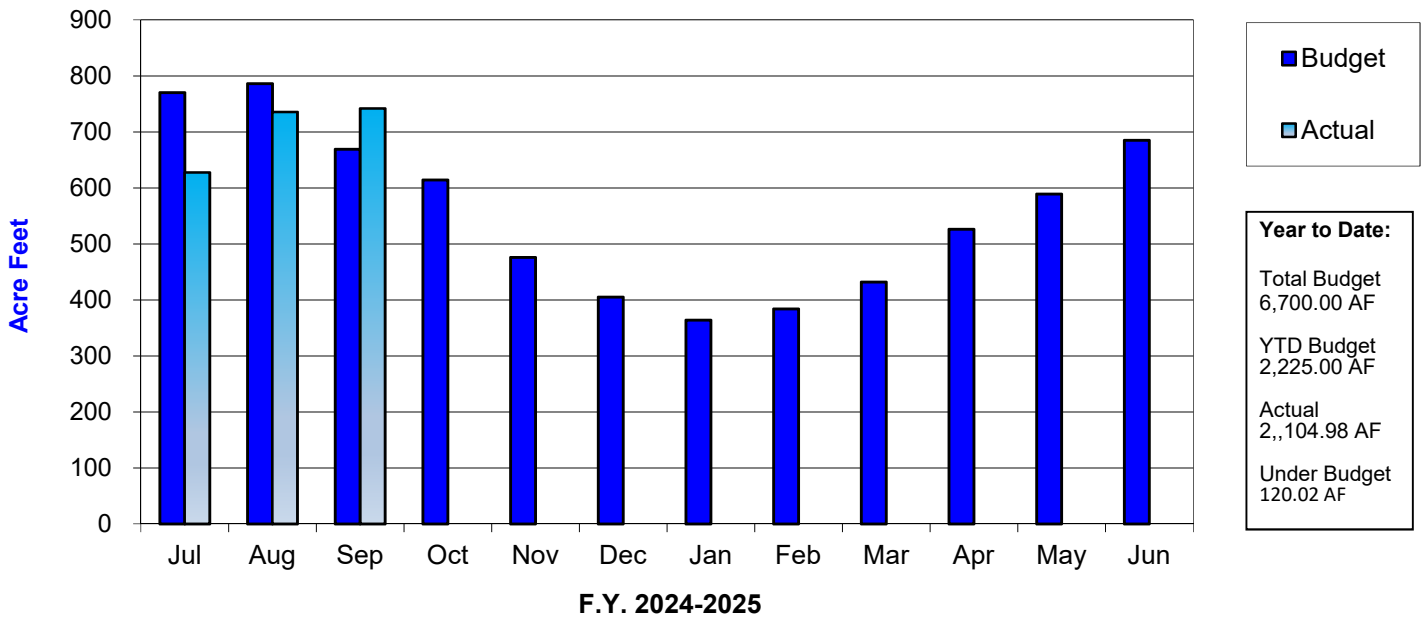
- MWDOC P&O Committee Meeting
- MWDOC / OCWD Joint Planning Committee Meeting
- MWDOC Managers Meeting
- SOCWA Member Agency Attorneys Meetings
- JRWSS Member Agencies Meeting
- Lunch Meeting with SCWD, SMWD & CSC Managers
- SDLF Essential Leadership Skills Webinar
- South Orange County Agencies Group Meeting
- Meeting with Congresswoman Young Kim staff
- Meeting with Kurt Wiemann - VMS
- Meeting with Raftelis
- Orange County Water Summit
- ETWD Capital Construction Meetings
- Aliso Creek Lift Station CEQA Kickoff Meeting
- Cross Connection Control Policy Handbook Coordination Meeting
- Next Gen CMMS Demonstration
- Meeting with Health Equity
- Meeting with Empower
- Website Redesign Kickoff Meeting
- Lake Forest Leadership Academy
- ETWD President / Vice President / GM Meetings
- ETWD RRC Meeting
- ETWD HR Committee Meeting
- ETWD Agenda Review Meeting
- ETWD Regular Engineering & Finance Committee Meetings
- ETWD Regular Board Meeting

## **II. DOMESTIC AND RECYCLED WATER SALES**

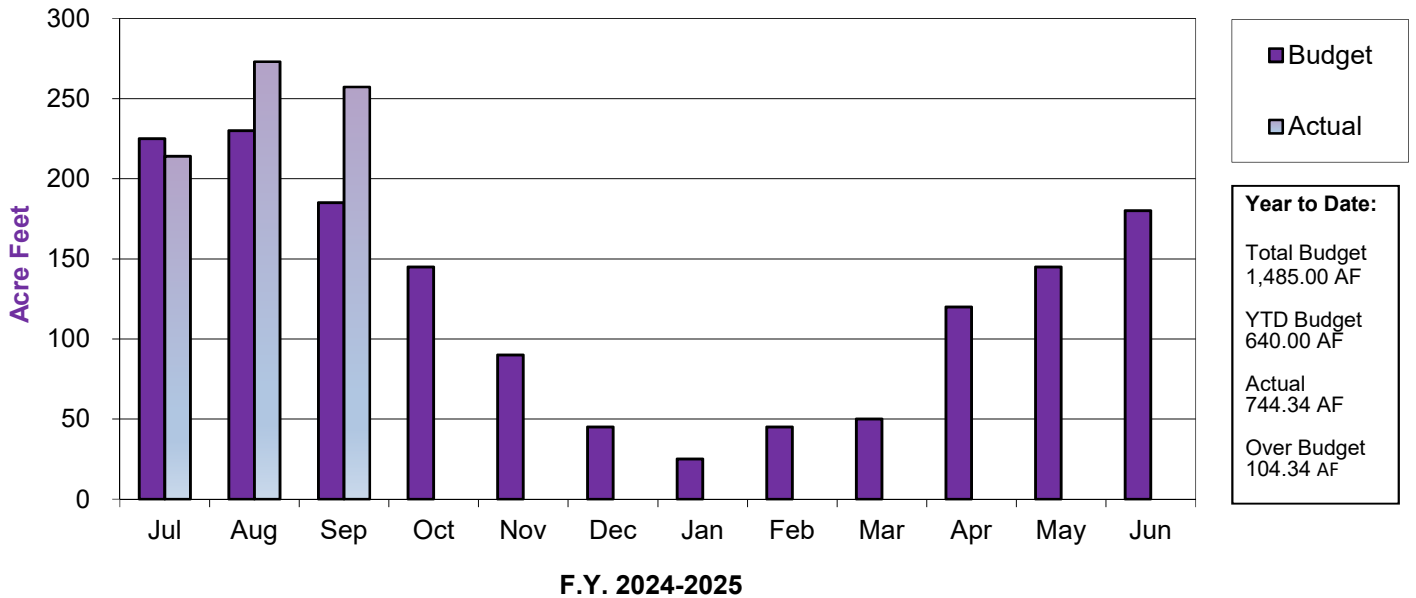
Actual domestic sales for the year-to-date as of September 30, 2024 are 2,104.98 acre-feet. This compares to year-to-date budgeted domestic sales of 2,225.00 acre-feet. The year-to-date variation in actual to budgeted sales reflects a decrease of 120.02 acre-feet. Actual sales are 235.65 acre-feet higher than last year-to-date actual sales for the same period.

Actual recycled sales for the year-to-date as of September 30, 2024 are 744.34 acre-feet. This compares to year-to-date budgeted recycled sales of 640.00 acre-feet. The year-to-date variation in actual to budgeted sales reflects an increase of 104.34 acre-feet. Actual sales are 215.94 acre-feet higher than last year-to-date actual sales for the same period.

## POTABLE WATER SALES



## RECYCLED WATER SALES



Customer Service Activity Report

| Regular Service Calls                                                     | Sep-24     | SEP 2023    | Telephone Calls                                                                                            | SEP 2024        | SEP 2023        |
|---------------------------------------------------------------------------|------------|-------------|------------------------------------------------------------------------------------------------------------|-----------------|-----------------|
| Serviceman Dispatched to Read, Connect/Disconnect Service                 | 54         | 57          | Change of Service: Connections and Disconnections                                                          | 53              | 71              |
| <b>Field Investigations:</b>                                              |            |             | Billing / Payments & Graph Inquires                                                                        | 274             | 152             |
| Check for leaks - calls to CS Office:(irrigation,meter,street leaks)      |            |             | Assistance with online payments and ETWD's portal (cc, e-checks, other.)                                   | 14              | 33              |
| Customer Responsible                                                      | 22         | 13          |                                                                                                            |                 |                 |
| District Responsible                                                      | 8          | 7           | Variance / Adjustment Inquiries                                                                            | 9               | 10              |
| None found/other                                                          | 7          | 8           | Variance / Adjustment Requests                                                                             |                 | 6               |
| High Reads Checked - High Consumption (Billing Dept.)                     |            |             | Processed                                                                                                  | 6               |                 |
| Cust Leaks:19 No Leaks:32                                                 | 51         | 62          | Ordinance Infraction / Water Waste Complaints                                                              | 2               | 0               |
| Check Stopped Slowed Meters-Low Consumption (Billing)                     | 17         | 12          | Outside Utility Districts                                                                                  | 34              | 47              |
| Re-Check Read                                                             | 5          | 10          | Phone calls Transfer to other Departments within ETWD                                                      | 68              | 28              |
| Ordinance Infraction                                                      | 0          | 1           | Phone calls for the Board of Directors                                                                     | 0               | 0               |
| Recycled Water                                                            | 0          | 0           | Recycled Water                                                                                             | 0               | 0               |
| Water Quality: Taste / Odor / Color                                       | 6          | 2           | Water Quality Taste - Odor - Color                                                                         | 3               | 2               |
| Phone response: 5 Field response: 1                                       |            |             | Leaks / Breaks                                                                                             | 13              | 13              |
| Construction (Hydrant) Meters issued                                      | 1          | 0           | Construction Meter calls (Hydrant)                                                                         | 2               | 3               |
| Sewer - Odor/Stoppage/ Manhole Covers                                     | 3          | 1           | Sewer Problems (odor / spills)                                                                             | 3               | 2               |
| Meter Box: 2 Lids:12 Covers Replaced:11                                   | 25         | 8           |                                                                                                            |                 |                 |
| Meter Box Clean, Digout                                                   | 3          | 0           | Backflow / Cross Connection (questions or yearly testing forms)                                            | 1               | 0               |
| Raised Meter Box                                                          | 1          | 0           | ETWD facilities inquiries: Boxes/Covers/Lids/Hydrants/Pump Stations/Graffiti/ "Gen. Maint"                 | 0               | 4               |
| Trim Bushes / Meter Obstruction                                           | 13         | 2           |                                                                                                            |                 |                 |
| General Maintenance Response                                              | 4          | 1           | Tyco (ADT) Calls (Alarms to ETWD facilities)                                                               | 0               | 0               |
| Fire Hydrants: Hit / Leaks / Caps                                         | 0          | 1           | ATT Calls (access to tower sites)                                                                          | 0               | 0               |
| Pressure(psi) Checks / Reads                                              | 6          | 3           | SCE Calls (access to tower sites)                                                                          | 0               | 2               |
| CSSOV (Angle Meter/Ball Valve/Gate Valve/Globe Valve) chk,repair,replaced | 13         | 6           | Pager Calls specifically for Pump Stations - SCADA                                                         | 0               | 0               |
| AMS angle-meter-stop replace/repair                                       | 0          | 1           |                                                                                                            |                 |                 |
| Bees Removed                                                              | 1          | 4           |                                                                                                            |                 |                 |
| Backflow / Cross Connection                                               | 4          | 0           | Payment Extensions                                                                                         | 11              | 17              |
| Fogged Registers                                                          | 18         | 0           | Delinquent Payment Calls to Customer 's prior to shut off per billing calendar (automatic courtesy dialer) | 0               | 31              |
| OMCOP: Old Meter Change - Out Program                                     | 0          | 1           | Return Calls from customers left on our voice mail system. Ext 500                                         | 11              | 15              |
| Other: (uncommon non-maintenance calls)                                   | 2          | 10          | Email Correspondence:                                                                                      | 108             | 32              |
| On-Call After Hrs. CS Response                                            | 26         | 19          | Maintenance Service Order Requests (bees, psi, fogged-dirty registers)                                     | 17              | 8               |
| # Posting Notice & 24 Hr. Door Hangers Hung                               | 0          | 83          | Misc. (other: employment, deliveries, sales calls)                                                         | 17              | 25              |
| #Shut Offs/Disconnect for Non-Payment (DNP)                               | 0          | 5           | Payment Processing Fee Complaints                                                                          | 0               | 0               |
| Removed Meter                                                             | 0          | 0           | Customers Complaints non bill related.                                                                     | 0               | 1               |
| New Meter                                                                 | 2          | 5           | Billing Disputes                                                                                           | 0               | 0               |
| Unread Meters                                                             | 2          | 3           |                                                                                                            |                 |                 |
| <b>Total Field Investigations</b>                                         | <b>294</b> | <b>325</b>  | <b>Total Telephone Calls</b>                                                                               | <b>646</b>      | <b>502</b>      |
| <b>Uncollectible Accounts:</b>                                            |            |             | <b>Credit Card Payments</b>                                                                                | <b>SEP 2024</b> | <b>SEP 2023</b> |
| Budget YTD                                                                | \$0.00     | \$ 4,251.00 | REGULAR                                                                                                    | 1,637           | \$360,369.01    |
| Actual YTD                                                                | \$0.00     | \$ 301.00   |                                                                                                            |                 | 1,175           |
|                                                                           |            |             |                                                                                                            |                 | \$253,309.77    |

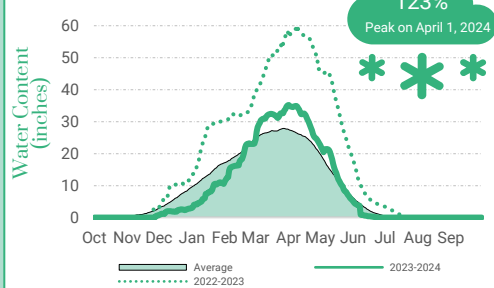


# The Metropolitan Water District of Southern California's Water Supply Conditions Report (WSCR)

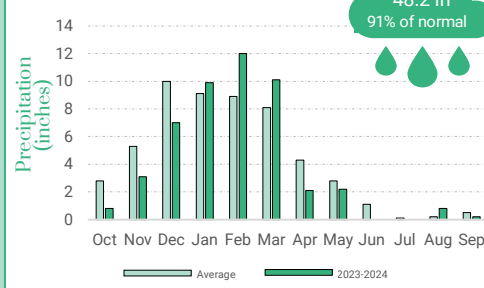
Water Year 2023-2024  
As of: 09/30/2024

State Water Project

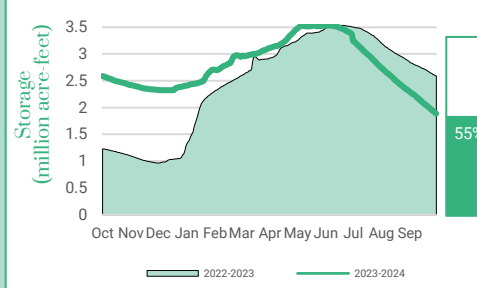
## Northern Sierra Snow



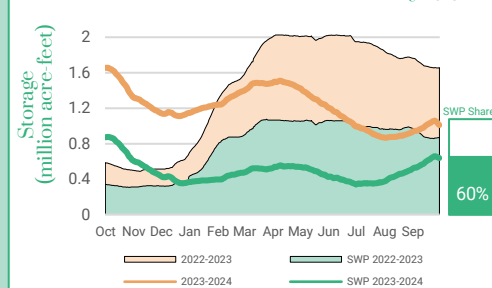
## 8 Station Index Rain



## Lake Oroville

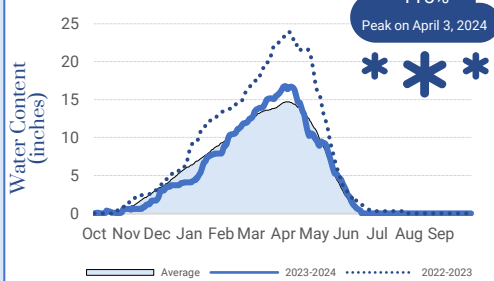


## San Luis Reservoir

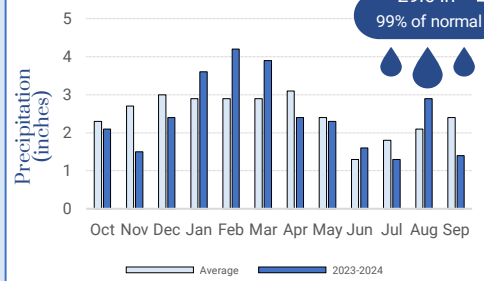


Colorado River

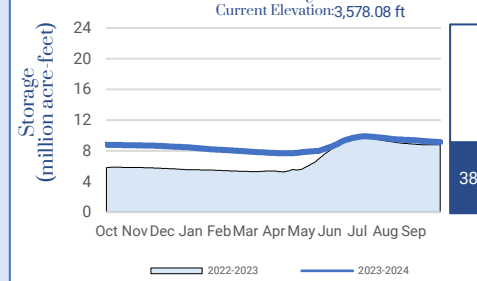
## Colorado River Basin Snow



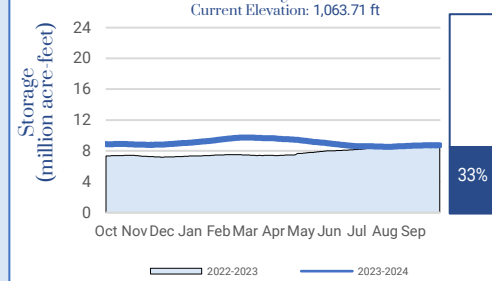
## Colorado River Basin Rain



## Lake Powell

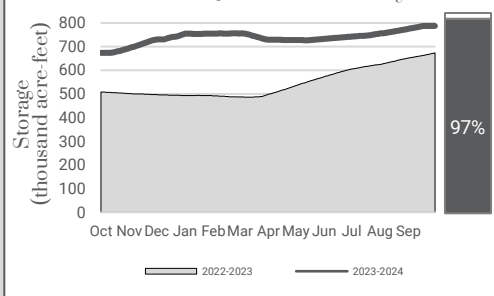


## Lake Mead

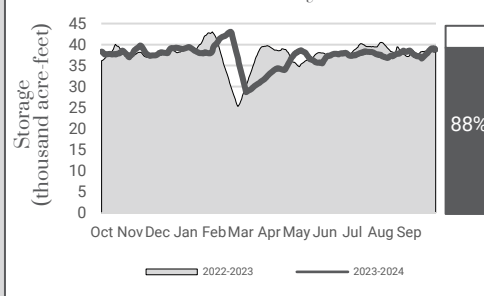


Metropolitan

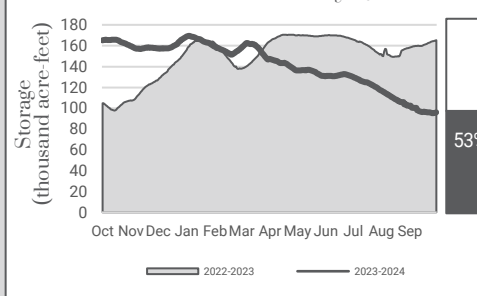
## Diamond Valley Lake



## Lake Skinner



## Lake Mathews



## Lake Mead – Operating Condition (August 2024 CRMMS ESP Projections)

|                                             | 2025 | 2026 | 2027* | 2028* | 2029* |
|---------------------------------------------|------|------|-------|-------|-------|
| Surplus<br>(above 1,145 ft)                 | 0%   | 0%   | 0%    | 0%    | 3%    |
| Normal Year<br>(between 1,075 and 1,145 ft) | 0%   | 7%   | 17%   | 20%   | 23%   |
| 1st Level<br>(between 1,050 and 1,075 ft)   | 100% | 93%  | 57%   | 53%   | 50%   |
| 2nd Level<br>(between 1,025 and 1,050 ft)   | 0%   | 0%   | 27%   | 13%   | 13%   |
| 3rd Level<br>(below 1,025 ft)               | 0%   | 0%   | 0%    | 13%   | 10%   |

\* Years beyond 2026 assume continuation of 2007 Interim Guidelines.  
Click on table for Reclamation page explaining the modeling and assumptions.

This report is produced by the Imported Supply Unit staff and contains information from various federal, state, and local agencies.  
The Metropolitan Water District of Southern California cannot guarantee the accuracy or completeness of this information.  
Readers should refer to the relevant state, federal, and local agencies for additional or for the most up to date water supply information.

<https://www.mwdh2o.com/WSCR>

# WILL SERVE SUMMARY REPORT

## September 2024

| PROJECT NAME                                             | PROJECT DESCRIPTION                                                                                                                                                                                                                           | PHASE        | CFF                |
|----------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------|--------------------|
| The Village at Laguna Hills (Retail Phase)               | Installation of various sized water, fire, and sewer services at the former mall site.                                                                                                                                                        | Plan Check   | Not Yet Calculated |
| The Village at Laguna Hills (Central Residential Phase)  | Installation of various sized water, fire, and sewer services at the former mall site.                                                                                                                                                        | Plan Check   | Not Yet Calculated |
| The Village at Laguna Hills (Southern Residential Phase) | Installation of various sized water, fire, and sewer services at the former mall site.                                                                                                                                                        | Plan Check   | Not Yet Calculated |
| Womens Health Pavilion                                   | New construction of a health pavilion with water services, irrigation services, sewer services, and fire water services.                                                                                                                      | Close-Out    | \$ 21,856          |
| Target                                                   | Addition of an irrigation service, fire services, and potable water services (24440 Alicia Pkwy Bldg B Suite "A" Potable Service, 24440 Alicia Pkwy Bldg B Fire Service, 24420 Alicia Pkwy Bldg A Fire Service, 24440 Alicia Pkwy Irrigation) | Construction | \$ 157,176         |
| Laguna Hills Inn Fire Sprinkler Upgrade                  | Fire System upgrades including conversion of a fire hydrant to private and addition of a 6-inch DCDA                                                                                                                                          | Construction | \$ -               |
| 25376 Maximus Group Home                                 | Upgrading the water service.                                                                                                                                                                                                                  | Plan Check   | Not Yet Calculated |
| Indian Super Mart Kitchen                                | Addition of a kitchen.                                                                                                                                                                                                                        | Plan Check   | Not Yet Calculated |
| Parentis Health Sewermain Relocation                     | Relocating an existing sewermain.                                                                                                                                                                                                             | Plan Check   | Not Yet Calculated |
| Whoop Axe Water Service Upgrade                          | Upgrade of existing water service.                                                                                                                                                                                                            | Plan Check   | Not Yet Calculated |
| Central Utilities Plant 24451 Health Center Drive        | Additional domestic and fire services for a medical central utility plant.                                                                                                                                                                    | Plan Check   | Not Yet Calculated |
| Yummyland Icecream and Juice Bar                         | Tenant improvement converting from a mail center into an icecream and juicebar.                                                                                                                                                               | Close-Out    | \$ 281             |
| 24178 Me Spa Massage                                     | Conversion of existing chiropractic office into a massage parlor.                                                                                                                                                                             | Plan Check   | Not Yet Calculated |
| 23272 Mill Creek                                         | Residential development for 43 attached condo units                                                                                                                                                                                           | Planning     | Not Yet Calculated |
| 23272 Mill Creek                                         | Residential development for 43 attached condo units                                                                                                                                                                                           | Planning     | Not Yet Calculated |
| Muirlands Veterinary Hospital                            | Converting existing commercial tenant space to a new general practice veterinary clinic                                                                                                                                                       | Plan Check   | Not Yet Calculated |
| 24953 Paseo De Valencia Bldg B Unit 17B                  | Converting existing pharmacy into a medical office                                                                                                                                                                                            | Construction | \$ 863             |
| Mill Creek                                               | Residential development for 415 new dwelling units                                                                                                                                                                                            | Planning     | Not Yet Calculated |
| Pet Food Express Backflow                                | Addition of backflow device                                                                                                                                                                                                                   | Construction | \$ 2,914           |

# NATURAL RESOURCE RESULTS

**To:** Board of Directors, *Municipal Water District of Orange County*  
**From:** Natural Resource Results  
**RE:** Monthly Board Report – October 2024

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## **Appropriations**

The House and Senate both passed a Continuing Resolution (CR) that funds the government through December 20<sup>th</sup>, heading off a potential government shutdown but punting some challenging issues into the Lame Duck session of Congress. Congress does not come back into session until after the election and will have a short period of time to wrap up legislative business for the year.

## **Water Legislation**

Because Congress adjourned early after passing a CR, the Senate Energy and Natural Resources Committee was forced to cancel a markup that included a number of water bills. However, we still expect that those bills will be in the mix for a year-end legislative package. Bills of note include:

- [S. 5012](#), to establish an interest-bearing account for the non-Federal contributions to the Lower Colorado River Multi-Species Conservation Program (Padilla); and
- [S. 4576](#), to amend the Energy and Water Development and Related Agencies Appropriations Act, 2015, to reauthorize the Colorado River System conservation pilot program (Hickenlooper/Barrasso).

## **Special Districts**

Progress continues on legislation to clarify that special districts are eligible for federal grant funding. H.R. 7525 has already passed the House and just last week was reported favorably out of the Senate Committee on Homeland Security and Government Affairs. Next step is to get the bill through the full Senate during the lame duck.

## **Colorado River**

Both the House and the Senate included language in the Energy and Water Appropriation reports addressing excess flows to Mexico. The language seeks to fix a need for better management of water deliveries coming from Lake Mead because there are times when excess flows go to Mexico. Some believe additional infrastructure is needed to fix the problem.



It has been reported that the Bureau of Reclamation will likely release chapters of the draft EIS for the post 2026 guidelines before the end of this year. These chapters will look at the various alternatives submitted as well as the Federal proposed alternative and how they compare when modeled by the technical team at the agency. This will likely be in a matrix form and will only be released to the states and tribes and not the public. There will not be a comment period this year. In the first half of 2025, we expect to see BOR release a draft EIS for post 2026 to the public. The goal is still to reach consensus among the 7 Basin States.

|       |                                                  |
|-------|--------------------------------------------------|
| To:   | MWDOC Workshop                                   |
| From: | Syrus Devers                                     |
| Date: | October 2nd, 2024                                |
| Re:   | End of Session Report - State Legislative Report |
|       |                                                  |

### **End of Session Report**

This year began with hand wringing. The water industry had been through two rough years and was due for a win, and we got it. A typical year starts with a list of 40 to 45 tracked bills, about a third of which begin as spot bills. (Bills that state an intent but contain no substantive language.) This year began with 58 tracked bills. Worse, about half were spot bills, which produces anxiety in water lobbyists because we have to assume the worst.

As this report is being prepared, there are still two bills supported by water lobbyists on the Governor's desk awaiting action, but we have already won enough to celebrate. The top priority is always to stop the bad bills, thereby preventing things from getting any worse than they already are. No opposed bills made it to the Governor's desk, while four supported bills made it through, two which have already been signed: SB 1072 and AB 1827. (See below) This report was prepared five days before the final deadline for the Governor to act on a bill. SDA will give a final tally of the legislative session during oral presentation, but water lobbyists are already taking a victory lap.

Update on bills active during End of Session: These are the bills that were still pending when the September report was prepared.

**AB 1827** (Papan) - The purpose of this bill is to validate the use of tiered rates under Prop 218. Although the bill had a fairly easy vote in committee, there was late concern about the vote on Third Reading and SDA was asked to help lobby.

Position: SUPPORT. Result: Signed into law.

**AB 2257** (Wilson) - Creates a requirement to exhaust administrative remedies before bringing a Prop 218 action against a special district. (ACWA sponsored.)

Position: SUPPORT. Result: Governor's desk awaiting action.

**SB 366** (Caballero): This is the industry sponsored bill that began with the financial support of dozens of water agencies last year. The final bill is a far cry from the original purpose, which was to lay out a financial pathway to fund California's future water supply requirements. The bill requires interim water

# Syrus Devers Advocacy

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supply goals for 2050, and requires regulatory agencies to consult with stakeholders, among other provisions. SDA took on a number of lobbying assignments throughout the process.

Position: SUPPORT. Result: Governor's desk awaiting action.

**SB 1072** (Padilla) - This bill is one of the three dealing with Prop 218 reform. This bill allows for Prop 218 fines to be paid through future rate reductions instead of lump sums, the goal being to give public agencies greater financial predictability.

Position: SUPPORT. Result: Signed into law.

**SB 1390** (Caballero) - This bill affirms and codifies the actions taken by the state to move emergency flood flows into storage without having to jump through all the hoops imposed by overlapping water rights. It includes a compromise among State Water Contractors that respects junior rights while allowing flood flows that cannot be utilized to be expeditiously diverted to storage. Late opposition arose from Central Valley water districts that prefer the *status quo*. SDA was asked to engage and rally client support. Given this agency's reliance on the State Water Project being utilized to the maximum extent possible, adopting a support position was an easy call.

Position: SUPPORT. Result: Dead. Note: This bill was an unfortunate victim of "hostage taking" on the last night of session. It was held in the Assembly for reasons unrelated to policy.

Actively lobbied bills in 2024: These are all the other bills SDA was tasked with actively supporting or opposing in 2024.

**AB 1573** (Friedman): This bill concerned native plant use in new construction. MWDOC did not take a position on the bill in print, but did oppose proposed amendments that would have modified the effective dates of last year's AB 1572 (Friedman) prohibiting non-functional turf, which MWDOC did oppose. The effort was successful and the bill died.

**AB 1820** (Schiavo): Limitations on fees for new housing developments. Special district lobbyists successfully sought amendments to limit the bill to cities and counties.

**AB 2409** (Papan): The bill would have required a permitting accountability transparency internet website (dashboard). MWDOC lobbied in favor but the bill never made it out of the house of origin.

**SB 937** (Weiner): The most significant of the bills intended to limit development fees on new construction. MWDOC adopted an "oppose unless amended," but removed opposition once water agencies were removed from the bill.

**SB 1210** (Skinner): Another of several bills to limit or prohibit development fees on new construction. MWDOC did adopt an "oppose unless amended", but that was moved to "watch" once special districts were removed from the bill.

# Syrus Devers Advocacy

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SB 1218 (Newman): support for emergency water supplies. This bill was sponsored by IRWD and supported by MWDOC, but the bill died on the infamous Suspense File. (This was a bummer.)

SB 1255 (Durazo): The “voluntary” LIRA program bill. This bill was covered extensively in previous reports and defeating it was one of the year’s major victories.

Watched bills: Once a year SDA invites the Board Members to scan the bills on the “Watch” list that were not brought to the attention of the Board. Some bills are in the watch section after opposition was removed. In this case, there will be a note recording when and why that happened. For all the others, staff did not elevate them to a priority for one of several reasons, one of which was waiting to see if there was any possibility of the bill moving before committing resources. Whatever the reason, there is always a chance that SDA mislabeled a bill that should have been a priority. If that happened, please let us know so that we can continue to improve.

## Administrative Report

The Department of Water Resources published a report back in July that for reasons unknown received no publicity. The bi-annual State Water Project Delivery Capability Report for 2024 disclosed an alarming reduction in the projected reliability of the State Water Project (SWP) in the event of an extended drought. To paraphrase, the SWP is projected to be about half as reliable as it was estimated to be as recently as 2021.

Governor Newsom is taking credit for a recent legal victory in the CEQA lawsuit against Sites Reservoir. Last year, Newsom pushed through Trailer Bill language to limit CEQA appeals on major infrastructure projects to 270 days. It received some criticism at the time because the deadline only applied “if feasible.” Nonetheless, the Sites Reservoir CEQA appeal lawsuit was denied in 256 days.

# ACKERMAN CONSULTING

## Legal and Regulatory

October 2, 2024

1. **Great Salt Lake Update:** We have previously reported on the decline in water in the Great Salt Lake. The lake is getting somewhat of a reprieve from Utah Lake and other contributors. Around 10,000-acre feet of water will be sent to the Salt Lake via the Jordan River in the next few weeks. The Jordan River connects the Great Salt Lake and Utah Lake. The majority of the water is coming from Utah Lake as a result the heavy 2023 snowpack in Utah. Just under half of the water is being sent to the Salt Lake from other water users and the Church of Jesus Christ of Latter-Day Saints. The latter contribution is result of voluntary agreements with the parties. The Great Salt Lake will need over a half a million additional acre feet every year to achieve its goal elevation of 4198 feet in the future. Utah water world is happy to see at least this small start.
2. **More Underground Storage Needed:** The University of California at Riverside has released a new study regarding agricultural water needs. Their solution for handling the agricultural demands is an increased emphasis on replenishing the underground aquifers in the region. They assert that additional resources should be made available in the Central Valley and coastal plains to enhance recharge in the depleted aquifers. They recommend additional recharge basins, more convenient structures to redistribute water in the impacted areas, spraying water on land and more cost-efficient ways to infuse water underground. They also recommend voluntary water markets and the extended use of enhanced treatment of wastewater. Their goal is to have a sustainable model for agriculture in California in the future.
3. **More PFAS Solutions:** ETH Zurich institute is studying new ways to break down forever chemicals. Their current study tries to make it easier to break down the carbon fluoride bond in PFAS. Generally, it requires much energy to break these bonds. They have come up with a new method involving piezocatalysis to accelerate this process. Piezo refers to the electric charge generated during the mechanical processes. They have developed nanomaterials that are piezoelectric and can accomplish this mission. Thus far their success rate of degrading PFAS molecules is above 90%. While this process is not yet commercially feasible that is their next challenge. This method is less expensive and easier on the environment than other alternatives.
4. **SGMA Challenged:** The Sustainable Groundwater Management Act is again being challenged in court. The Kings County Farm Bureau has sued the State Water Resources Control Board and received an injunction against them enforcing costly orders on the water boards involved. The courts rationale was that the water board's process was not transparent and had been negotiated in secret. The process did not allow for any appeal of decisions and the board failed to consider other solutions offered by the plaintiff. Other water boards who are on probation or being threatened by the State will likely see this as a positive outcome for their issues. The next hearing for this matter is set for January of 2025.

5. **Garbage Patch Cleanup:** A nonprofit group known as Ocean Cleanup has put forth an offer to clean up the great Pacific garbage patch. This mess in the ocean which is twice the size of Texas has been the object of discussion for many years. This group has said that they can clean up the patch in 10 years for a price of \$7.5 billion. Their plan is to capture plastic and garbage in various rivers around the world before it makes its way to the sea and cleaning up the accumulation existing. In the past this group has removed over 1,000,000 lbs. of trash from the ocean. Their rationale is that the cost to the world is over 2 1/2 trillion dollars. So far, they have not come up with anyone to give them a contract.
6. **More Rain in Cities?:** A study from the University of Texas examined rainfall in major cities throughout the world. Of the over 1000 cities which they examined more than 60% of those receive more rainfall than their surrounding areas. The most significant was Houston TX which received 5 inches more rain per year than its surrounding rural areas. This creates problems for water management and flash flood episodes. Some of the cities studied actually received less rain than their surrounding areas. Typically, they are situated in valleys or lowlands where the weather patterns were controlled by the mountains. An example of one of those cities is Seattle. Their studies showed that buildings had the greatest influence on the weather patterns. The high buildings slowed down winds and changed weather conditions which influence rainfall. Typically, the cities with more rainfall also had warmer temperatures.
7. **Colorado River Law Changes:** The University of Virginia has been studying the Colorado River and the impact of laws on the current shortage on the river, in particular, a regulation called the “free river condition”. This regulation states that if the river has sufficient water for everyone’s needs, that anyone whether or not they have existing water rights could take as much water from the river that they want. This has been discussed in various articles regarding loopholes in water rights in Colorado. During the year of 2017 as a result of free river conditions water utility users diverted approximately 90,000-acre feet more than their water rights allowed. While this amount is not large, they believe that any changes to increase the available amount of water for the basin would help the negotiations for all the states.
8. **Better Water Treatment:** The key to better water treatment worldwide is better membranes and filtration methods. The key to this process is economical methods, reduce maintenance, and have better anti fouling features. A recent study from the University of Sharjah in the United Arab Republic has come up with a natural element which could achieve many of these goals. The use of manganese nanoparticles is having excellent results in test studies. Thus far, it has shown to be economical, easy to maintain, and has very excellent biofouling characteristics. This makes it an excellent candidate for water treatment plants everywhere and could also be used in desalinization plants. Its current effectiveness rate is over 95% and its reuse factor exceeds 88%.
9. **Moon Water Rover:** NASA has just cancelled a 1/2-billion-dollar water rover designed for exploration on the moon. Nicknamed the Viper, this machine is practically ready to go to the moon to explore the possibility of water or other minerals on the moon. The cancellation was due to budgetary concerns. They are now trying to find alternate vendors to finish the job. The mission of Viper is very important for future moon exploration and potential lunar settlement. This device has the capability of collecting and analyzing samples and drilling holes in

the moon surface. Members of Congress are weighing in to support the program. They have the power to reverse the NASA decision. I suggest they call Elon Musk.

10. **Drone Warning:** New York City has added a complement of drones to warn residents of emergencies and other extreme weather conditions. The current drone teams are assigned to neighborhoods prone to flooding and use a loudspeaker system on the drone to warn of impending weather. The drones are being used in addition to other forms of warning including social media, text alerts, and community-based systems. The drones are also used to monitor large gatherings and to look for sharks on the beaches.
11. **Artificial Turf On The Run:** Artificial grass first came on the scene in the 1960s. It was advertised as the cheaper substitute for grass and a water saver. It's primary and most public exposure has been in athletic fields. There are presently over 12,000 artificial turf fields in America with over 1000 being added each year. However now that trend is getting significant pushback. The New Jersey Institute of Technology has examined the safety risk and has found many. The artificial turf generally operates at a much higher temperature than the surrounding area. It can also cause burns, dehydration, and heat related ailments. The chemicals used in the turf also leach into the surrounding area and people coming in contact with it. It is also heavy with PFAS. The turf cannot be recycled and is now considered a hardscape as opposed to historical landscape designation. California has limited watering of non-functional synthetic grass and many states including New York have put moratoriums or limitations on its use. The City of Los Angeles is considering an outright ban. The New Jersey Institute is making the case for the use of real grass in many of the areas where artificial turf has dominated. They are now saying it may be worth the additional cost in water and the benefits of real grass.



October 2, 2024

TO: MWDOC Board of Directors

FROM: Peter Whittingham

SUBJECT: October 2024 Report

The month of September was marked by a week-long heat wave and three wildfires that stretched resources at dozens of agencies. Following is a few of the more notable developments and issues of the month:

- The City of Newport Beach approved a Memorandum of Understanding with the Laguna Beach County Water District (LBCWD) to explore the viability of a new water well. Newport Beach identified the need for a new well within its 2019 Water Master Plan and has subsequently been seeking potential sites in the City of Fountain Valley. LBCWD has located and purchased a vacant property on Bushard Street in Fountain Valley that could serve as a new water well site for both Newport Beach and Laguna Beach, which already share several pipeline and groundwater agreements.
- The Seal Beach City Council approved an agreement for sharing consultant costs with MWDOC for completion of the Orange County Water and Wastewater Multi-Jurisdictional Hazard Mitigation Plan and America Water Infrastructure Act of 2018 Projects.
- Cadiz Inc., which has been working for more than two decades to deliver water from the Fenner Valley in San Bernardino to a number of water districts in the region, including Santa Margarita Water District, announced it has acquired additional idled pipelines to facilitate its potential delivery to the California Aqueduct. Cadiz announced last month that it had secured a water supply agreement with Cucamonga Valley Water District (CVWD) for up to 5,000 acre-feet of water annually.
- The Orange County Board of Supervisors received a presentation of its Preliminary Climate Action Plan, which provides a base document for the continuation of development of the final Climate Action Plan and a status update on progress made during the last six months. The report includes input received during seven forums held throughout the County, from the formal public review and comment period, the stakeholders and from internal departments. Measures

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contained within the document will be further evaluated to determine specific emission reductions and cost-effectiveness and the document will also go through a full evaluation under the California Environmental Quality Act (CEQA) with the goal of reducing the cost and time associated with the process on a project-by-project basis.

- National Public Radio (NPR) profiled the Yorba Linda Water District and its PFAS treatment plant, noting it is the largest of its kind. The NPR report quoted Board members and Todd Colvin, chief water system operator for the district. Every gallon of water pumped from the district's wells now passes through a few of the 22 tanks at the site for treatment before going to the homes and businesses of the 80,000 residents YLWD serves.
- The Orange County Board of Supervisors voted unanimously to censure First District Supervisor Andrew Do amid federal investigation into the County's allocation of several million dollars to a non-profit organization that has failed to provide an accounting of expenditure of the funds and at which the Supervisor's daughter was employed.

It is a pleasure to work with you and to represent the Municipal Water District of Orange County.

Sincerely,



Peter Whittingham

# MWDOC Workshop

Prepared by SDA Government Relations

September, 2024

NOTE: Several bills have ~~striketrough~~ lines in the “position” and “priority” lines. This is a function of the bill tracking program. It shows which bills were removed from the Bill Matrix earlier in the year but still tracked.

## Priority: A. High

### [AB 460](#) ([Bauer-Kahan, D](#)) State Water Resources Control Board: water rights and usage: civil penalties.

**Status:** 09/22/2024 - Chaptered by Secretary of State - Chapter 342, Statutes of 2024

**Summary:** Under current law, the diversion or use of water other than as authorized by specified provisions of law is a trespass, subject to specified civil liability. This bill would require the State Water Resources Control Board to adjust for inflation, by January 1 of each year, beginning in 2026, the amounts of civil and administrative liabilities or penalties imposed by the board or in water right actions brought at the request of the board, as specified. (Based on 09/22/2024 text)

**Position:** B. Watch

**Priority:** A. High

**Notes** - Amended to only address fines

### [AB 1337](#) ([Wicks, D](#)) State Water Resources Control Board: water diversion curtailment.

**Status:** 07/02/2024 - Failed Deadline pursuant to Rule 61(b)(13). (Last location was N.R. & W. on 6/7/2023)

**Summary:** Under existing law, the diversion or use of water other than as authorized by specified provisions of law is a trespass, subject to specified civil liability. This bill would expand the instances when the diversion or use of water is considered a trespass. This bill contains other related provisions and other existing laws. (Based on 05/18/2023 text)

**Position:** watch

**Priority:** A. High

### [AB 1567](#) ([Garcia, D](#)) Safe Drinking Water, Wildfire Prevention, Drought Preparation, Flood Protection, Extreme Heat Mitigation, Clean Energy, and Workforce Development Bond Act of 2024.

**Status:** 08/31/2024 - Failed Deadline pursuant to Rule 61(b)(17). (Last location was N.R. & W. on 5/22/2024)

**Summary:** Would enact the Safe Drinking Water, Wildfire Prevention, Drought Preparation, Flood Protection, Extreme Heat Mitigation, Clean Energy, and Workforce Development Bond Act of 2024, which, if approved by the voters, would authorize the issuance of bonds in the amount of \$15,995,000,000 pursuant to the State General Obligation Bond Law to finance projects for safe drinking water, wildfire prevention, drought preparation, flood protection, extreme heat mitigation, clean energy, and workforce development programs. (Based on 05/26/2023 text)

**Position:** watch

**Priority:** A. High

### [AB 1573](#) ([Friedman, D](#)) Water conservation: landscape design: model ordinance.

**Status:** 08/31/2024 - Failed Deadline pursuant to Rule 61(b)(17). (Last location was INACTIVE FILE on 9/7/2023)

**Summary:** The Water Conservation in Landscaping Act provides for a Model Water Efficient Landscape Ordinance that is adopted and updated at least every 3 years by the Department of Water Resources, unless the department makes a specified finding. Current law requires a local agency to adopt the model ordinance or to adopt a water efficient landscape

ordinance that is at least as effective in conserving water as the updated model ordinance, except as specified. Current law specifies the provisions of the updated model ordinance, as provided. Current law includes a related statement of legislative findings and declarations. This bill would require the updated model ordinance to include provisions that require that plants included in a landscape design plan be selected based on their adaptability to climatic, geological, and topographical conditions of the project site, as specified. The bill would also exempt landscaping that is part of a culturally specific project, as defined, ecological restoration projects that do not require a permanent irrigation system, mined-land reclamation projects that do not require a permanent irrigation system, and existing plant collections, as part of botanical gardens and arboretums open to the public, from the model ordinance. The bill would require the updated model ordinance to include provisions that, among other changes, prohibit the use of traditional overhead sprinklers on all new and rehabilitated landscapes and require that new and rehabilitated landscapes use only water efficient irrigation devices. (Based on 09/01/2023 text)

**Position:** watch

**Priority:** A. High

**AB 1820 (Schiavo, D) Housing development projects: applications: fees and exactions.**

**Status:** 09/22/2024 - Chaptered by Secretary of State - Chapter 358, Statutes of 2024

**Summary:** Current law requires a city or county to deem an applicant for a housing development project to have submitted a preliminary application upon providing specified information about the proposed project to the city or county from which approval for the project is being sought. Current law requires a housing development project be subject only to the ordinances, policies, and standards adopted and in effect when the preliminary application was submitted. This bill would authorize a development proponent that submits a preliminary application for a housing development project to request a preliminary fee and exaction estimate, as defined, and would require a city, county, or city and county to provide the estimate within 30 business days of the submission of the preliminary application. For development fees imposed by an agency other than a city, county, or city and county, the bill would require the development proponent to request the fee schedule from the agency that imposes the fee and would require the agency that imposes the fee to provide the fee schedule to the development proponent without delay. (Based on 09/22/2024 text)

**Position:** watch

**Priority:** A. High

**Notes** - Flagged by CSDA

**AB 1827 (Papan, D) Local government: fees and charges: water: higher consumptive water parcels.**

**Status:** 09/22/2024 - Chaptered by Secretary of State - Chapter 359, Statutes of 2024

**Summary:** The California Constitution specifies various requirements with respect to the levying of assessments and property-related fees and charges by a local agency, including requiring that the local agency provide public notice and a majority protest procedure in the case of assessments and submit property-related fees and charges for approval by property owners subject to the fee or charge or the electorate residing in the affected area following a public hearing. Current law, known as the Proposition 218 Omnibus Implementation Act, prescribes specific procedures and parameters for local jurisdictions to comply with these requirements and, among other things, authorizes an agency providing water, wastewater, sewer, or refuse collection services to adopt a schedule of fees or charges authorizing automatic adjustments that pass through increases in wholesale charges for water, sewage treatment, or wastewater treatment or adjustments for inflation under certain circumstances. Current law defines, among other terms, the term "water" for these purposes to mean any system of public improvements intended to provide for the production, storage, supply, treatment, or distribution of water from any source. This bill would provide that the fees or charges for property-related water service imposed or increased, as specified, may include the incrementally higher costs of water service due to specified factors, including the higher water usage demand of parcels. (Based on 09/22/2024 text)

**Position:** support

**Priority:** A. High

**Notes** - Support position adopted on May 1st

**AB 2257 (Wilson, D) Local government: property-related water and sewer fees and assessments: remedies.**

**Status:** 09/05/2024 - Enrolled and presented to the Governor at 4 p.m.

**Summary:** The California Constitution specifies various requirements with respect to the levying of assessments and property-related fees and charges by a local agency, including notice, hearing, and protest procedures, depending on the character of the assessment, fee, or charge. Current law, known as the Proposition 218 Omnibus Implementation Act, prescribes specific procedures and parameters for local jurisdictions to comply with these requirements. This bill would prohibit, if a local agency complies with specified procedures, a person or entity from bringing a judicial action or proceeding alleging noncompliance with the constitutional provisions for any new, increased, or extended fee or assessment, as defined, unless that person or entity has timely submitted to the local agency a written objection to that fee or assessment

that specifies the grounds for alleging noncompliance, as specified. This bill would provide that local agency responses to the timely submitted written objections shall go to the weight of the evidence supporting the agency's compliance with the substantive limitations on fees and assessments imposed by the constitutional provisions. The bill would also prohibit an independent cause of action as to the adequacy of the local agency's responses. (Based on 08/29/2024 text)

**Position:** support

**Priority:** A. High

**Notes** - ACWA sponsored. Support position adopted May 1st.

**AB 2409 (Papan, D) Office of Planning and Research: permitting accountability transparency dashboard.**

**Status:** 05/16/2024 - Failed Deadline pursuant to Rule 61(b)(8). (Last location was APPR. SUSPENSE FILE on 5/1/2024)

**Summary:** Would require the Office of Planning and Research, on or before January 1, 2026, to create and maintain, as specified, a permitting accountability transparency internet website (dashboard). The bill would require the dashboard to include a display for each permit to be issued by specified state agencies for all covered projects. The bill would define various terms for these purposes. The bill would also require the dashboard to include, but not be limited to, information for each permit to be issued by a state agency that is required for the completion of the project, including, among other requirements, the permit application submission date. The bill would require each state agency with a responsibility for issuing a permit for a covered project to provide information in the appropriate time and manner as determined by the office. The bill would also make related findings and declarations. (Based on 04/11/2024 text)

**Position:** support

**Priority:** A. High

**Notes** ~~CMUA sponsored bill. Support position adopted on March 6th.~~

**AB 3219 (Sanchez, R) Advanced Clean Fleets Regulation: local governments.**

**Status:** 05/02/2024 - Failed Deadline pursuant to Rule 61(b)(6). (Last location was TRANS. on 3/11/2024)

**Summary:** The California Global Warming Solutions Act of 2006 establishes the State Air Resources Board as the state agency responsible for monitoring and regulating sources emitting greenhouse gases and requires the state board to adopt rules and regulations to achieve the maximum technologically feasible and cost-effective greenhouse gas emission reductions from those sources. Pursuant to its authority, the state board has adopted the Advanced Clean Fleets Regulation, which imposes various requirements for transitioning local, state, and federal government fleets of medium- and heavy-duty trucks, other high-priority fleets of medium- and heavy-duty trucks, and drayage trucks to zero-emission vehicles. The Advanced Clean Fleets Regulation authorizes entities subject to the regulation to apply for exemptions from its requirements under certain circumstances. This bill would provide that the requirements of the Advanced Clean Fleets Regulation do not apply to the purchase by a local government of vehicles with a gross vehicle weight rating greater than 8,500 pounds if the price of the zero-emission version of a vehicle is more than an unspecified percentage of the price of a comparable internal combustion engine version of that vehicle. (Based on 03/11/2024 text)

**Position:** watch

**Priority:** A. High

**Notes** ~~Possible support~~

**SB 366 (Caballero, D) The California Water Plan: long-term supply targets.**

**Status:** 09/09/2024 - Enrolled and presented to the Governor at 3 p.m.

**Summary:** Current law requires the Department of Water Resources to update every 5 years the plan for the orderly and coordinated control, protection, conservation, development, and use of the water resources of the state, which is known as "The California Water Plan." Current law requires the department to include a discussion of various strategies in the plan update, including, but not limited to, strategies relating to the development of new water storage facilities, water conservation, water recycling, desalination, conjunctive use, water transfers, and alternative pricing policies that may be pursued in order to meet the future needs of the state. Current law requires the department to establish an advisory committee to assist the department in updating the plan. This bill would revise and recast certain provisions regarding The California Water Plan to, among other things, require the department to expand the membership of the advisory committee to include tribes, labor, and environmental justice interests. The bill would require the department, as part of the 2033 update to the plan, to update the interim planning target for 2050, as provided. The bill would require the target to consider the identified and future water needs for all beneficial uses and ensure safe drinking water for all Californians, among other things. (Based on 09/03/2024 text)

**Position:** support

**Priority:** A. High

**Notes** - CMUA sponsored bill from 2023

**SB 867 (Allen, D) Safe Drinking Water, Wildfire Prevention, Drought Preparedness, and Clean Air Bond Act of 2024.**

**Status:** 07/03/2024 - Chaptered by Secretary of State - Chapter 83, Statutes of 2024

**Summary:** Would enact the Safe Drinking Water, Wildfire Prevention, Drought Preparedness, and Clean Air Bond Act of 2024, which, if approved by the voters, would authorize the issuance of bonds in the amount of \$10,000,000,000 pursuant to the State General Obligation Bond Law to finance projects for safe drinking water, drought, flood, and water resilience, wildfire and forest resilience, coastal resilience, extreme heat mitigation, biodiversity and nature-based climate solutions, climate-smart, sustainable, and resilient farms, ranches, and working lands, park creation and outdoor access, and clean air programs. (Based on 07/03/2024 text)

**Position:** watch

**Priority:** A. High

**SB 1072 (Padilla, D) Local government: Proposition 218: remedies.**

**Status:** 09/20/2024 - Chaptered by Secretary of State - Chapter 323, Statutes of 2024

**Summary:** The California Constitution sets forth various requirements for the imposition of local taxes. The California Constitution excludes from classification as a tax assessments and property-related fees imposed in accordance with provisions of the California Constitution that establish requirements for those assessments and property-related fees. Under these requirements, an assessment is prohibited from being imposed on any parcel if it exceeds the reasonable cost of the proportional special benefit conferred on that parcel, and a fee or charge imposed on any parcel or person as an incident of property ownership is prohibited from exceeding the proportional cost of the service attributable to the parcel. The Proposition 218 Omnibus Implementation Act prescribes specific procedures and parameters for local compliance with the requirements of the California Constitution for assessments and property-related fees. This bill would require a local agency, if a court determines that a fee or charge for a property-related service, as specified, violates the above-described provisions of the California Constitution relating to fees and charges, to credit the amount of the fee or charge attributable to the violation against the amount of the revenues required to provide the property-related service, unless a refund is explicitly provided for by statute. (Based on 09/20/2024 text)

**Position:** watch

**Priority:** A. High

**SB 1164 (Newman, D) Property taxation: new construction exclusion: accessory dwelling units.**

**Status:** 08/31/2024 - Failed Deadline pursuant to Rule 61(b)(17). (Last location was REV. & TAX on 6/3/2024)

**Summary:** The California Constitution generally limits ad valorem taxes on real property to 1% of the full cash value of that property. For purposes of this limitation, "full cash value" is defined as the assessor's valuation of real property as shown on the 1975–76 tax bill under "full cash value" or, thereafter, the appraised value of that real property when purchased, newly constructed, or a change in ownership has occurred. This bill would exclude from classification as "newly constructed" and "new construction" the construction of an accessory dwelling unit, as defined, if construction on the unit is completed on or after January 1, 2025, and before January 1, 2030, until one of specified events occurs. The bill would require the property owner to, among other things, notify the assessor that the property owner intends to claim the exclusion for an accessory dwelling unit and submit an affidavit stating that the owner shall make a good faith effort to ensure the unit will be used as residential housing for the duration the owner receives the exclusion. (Based on 05/16/2024 text)

**Position:** watch

**Priority:** A. High

**Notes** - Brought up on 4/3. Keep watch position pending feedback from agencies.

**SB 1210 (Skinner, D) New housing construction: electrical, gas, sewer, and water service: service connection information.**

**Status:** 09/03/2024 - Enrolled and presented to the Governor at 3 p.m.

**Summary:** Current law vests the Public Utilities Commission with regulatory authority over public utilities, including electrical corporations, gas corporations, sewer system corporations, and water corporations, while local publicly owned utilities, including municipal utility districts, public utility districts, and irrigation districts, are under the direction of their governing boards. This bill would, for new housing construction, require the above-described utilities, on or before January 1, 2026, to publicly post on their internet websites (1) the schedule of estimated fees for typical service connections for each housing development type, including, but not limited to, accessory dwelling unit, mixed-use, multifamily, and single-family developments, except as specified, and (2) the estimated timeframes for completing typical service connections needed for each housing development type, as specified. The bill would exempt from its provisions a utility with fewer than 4,000 service connections that does not establish or maintain an internet website due to a hardship and would authorize the utility to establish that a hardship exists by annually adopting a resolution that includes detailed findings, as provided. (Based on 08/28/2024 text)

**Position:** watch

**Priority:** A. High

**Notes** - OUA adopted on 4/3. Amendments removed impacts to special districts. Moved to "watch."

**SB 1218 (Newman, D) Water: emergency water supplies.**

**Status:** 08/15/2024 - Failed Deadline pursuant to Rule 61(b)(14). (Last location was APPR. SUSPENSE FILE on 8/7/2024)

**Summary:** The Urban Water Management Planning Act requires every public and private urban water supplier that directly or indirectly provides water for municipal purposes to prepare and adopt an urban water management plan. The act requires an urban water management plan to include a water shortage contingency plan, as provided. This bill would declare that it is the established policy of the state to encourage, but not mandate, the development of emergency water supplies, and to support their use during times of drought or unplanned service or supply disruption, as provided. (Based on 06/18/2024 text)

**Position:** support

**Priority:** A. High

**Notes** - IRWD sponsored. Support position adopted on March 6th.

**SB 1255 (Durazo, D) Public water systems: needs analysis: water rate assistance program.**

**Status:** 08/15/2024 - Failed Deadline pursuant to Rule 61(b)(14). (Last location was APPR. SUSPENSE FILE on 8/7/2024)

**Summary:** Current law establishes the Safe and Affordable Drinking Water Fund in the State Treasury to help water systems provide an adequate and affordable supply of safe drinking water in both the near and long terms. Current law requires the state board to annually adopt a fund expenditure plan, as provided, and requires expenditures from the fund to be consistent with the fund expenditure plan. Current law requires the state board to base the fund expenditure plan on data and analysis drawn from a specified drinking water needs assessment. This bill would require the state board to update a needs analysis of the state's public water systems to include an assessment, as specified, of the funds necessary to provide a 20% bill credit for low-income households served by community water systems with fewer than 3,300 service connections and for community water systems with fewer than 3,300 service connections to meet a specified affordability threshold on or before July 1, 2026, and on or before July 1 of every 3 years thereafter. (Based on 06/19/2024 text)

**Position:** oppose

**Priority:** A. High

**Notes** - Oppose position adopted on 7/3

**SB 1390 (Caballero, D) Groundwater recharge: floodflows: diversion.**

**Status:** 09/01/2024 - Failed Deadline pursuant to Rule 61(b)(17). (Last location was THIRD READING on 8/31/2024)

**Summary:** Current law declares that all water within the state is the property of the people of the state, but the right to the use of the water may be acquired by appropriation in the manner provided by law. Current law requires the appropriation to be for some useful or beneficial purpose. Current law provides, however, that the diversion of floodflows for groundwater recharge does not require an appropriative water right if certain conditions are met, including that a local or regional agency that has adopted a local plan of flood control or has considered flood risks as part of its most recently adopted general plan has given notice, as provided, of imminent risk of flooding and inundation of lands, roads, or structures. Current law defines "floodflow" for these purposes, to include circumstances in which flows would inundate ordinarily dry areas in the bed of a terminal lake to a depth that floods dairies and other ongoing agricultural activities, or areas with substantial residential, commercial, or industrial development. Current law defines "imminent" for these purposes to mean a high degree of confidence that a condition will begin in the immediate future. Current law also requires the person or entity making the diversion for groundwater recharge purposes to file with the State Water Resources Control Board and any applicable groundwater sustainability agency for the basin, a notice containing specified information no later than 48 hours after initially commencing diversion of floodflows for groundwater recharge, a preliminary report no later than 14 days after initially commencing that diversion, and a final report no later than 15 days after the diversions cease. These requirements apply to diversions commenced before January 1, 2029. This bill would, among other things, expand the conditions that are required to be met for the diversion of floodwaters for groundwater recharge that do not require an appropriative water right. The bill would expand the definition of "floodflow" to include flows that are projected by the local or regional agency to inundate ordinarily dry areas in the bed of a terminal lake, as described above. The bill would revise the definition of "imminent" to mean a high degree of confidence that a condition will begin or is projected to begin within the next 72 hours. (Based on 08/22/2024 text)

**Position:** support

**Priority:** A. High

**Notes** - SUPPORT based on Policy Principles



## Priority: B. Watch

### [AB 2579](#) (Quirk-Silva, D) Inspections: exterior elevated elements.

**Status:** 08/28/2024 - Enrolled and presented to the Governor at 4 p.m.

**Summary:** Current law provides authority for an enforcement agency to enter and inspect any buildings or premises whenever necessary to secure compliance with or prevent a violation of the building standards published in the California Building Standards Code and other rules and regulations that the enforcement agency has the power to enforce. Current law requires an inspection, by January 1, 2025, and by January 1 every 6 years thereafter, of exterior elevated elements and associated waterproofing elements, as defined, including decks and balconies, for buildings with 3 or more multifamily dwelling units, as specified. Current law that provides that, if the property was inspected within 3 years prior to January 1, 2019, as specified, no new inspection is required until January 1, 2025. This bill would extend the deadline for initial inspection until January 1, 2026. (Based on 08/26/2024 text)

**Position:** watch

**Priority:** B. Watch

### [AB 2626](#) (Dixon, R) Advanced Clean Fleets regulations: local governments.

**Status:** 04/25/2024 - Failed Deadline pursuant to Rule 61(b)(5). (Last location was TRANS. on 3/4/2024)

**Summary:** Current law requires the State Air Resources Board to adopt and implement motor vehicle emission standards, in-use performance standards, and motor vehicle fuel specifications for the control of air contaminants and sources of air pollution that the state board has found necessary, cost effective, and technologically feasible. Pursuant to its authority, the state board has adopted the Advanced Clean Fleets Regulation, which imposes various requirements for transitioning local, state, and federal government fleets of medium- and heavy-duty trucks, other high-priority fleets of medium- and heavy-duty trucks, and drayage trucks to zero-emission vehicles. The Advanced Clean Fleets Regulation authorizes entities subject to the regulation to apply for exemptions from its requirements under certain circumstances. This bill would extend the compliance dates for local government set forth in the Advanced Clean Fleets Regulation by 10 years. The bill would prohibit the state board from taking enforcement action against a local government for violating the Advanced Clean Fleets Regulation if the alleged violation occurs before January 1, 2025. (Based on 02/14/2024 text)

**Position:** B. Watch

**Priority:** B. Watch

**Notes:** Possible support

### [AB 2661](#) (Soria, D) Electricity: Westlands Water District.

**Status:** 09/13/2024 - Enrolled and presented to the Governor at 4 p.m.

**Summary:** Would authorize the Westlands Water District to provide, generate, and deliver solar photovoltaic or hydroelectric electricity and to construct, operate, and maintain works, facilities, improvements, and property necessary or convenient for generating and delivering that electricity. The bill would require the district to use the electricity for the district's own purposes, and the bill would authorize the district to sell surplus electricity to a public or private entity engaged in the distribution or sale of electricity. The bill would also authorize the district to construct, operate, and maintain energy storage systems and electric transmission lines, and to construct, operate, and maintain works, facilities, improvements, and property necessary or convenient for the operation of the energy storage system and electric transmission lines, within the boundaries of the district, as specified. The bill would require the district to report the amount of income, and the purposes for expenditure of that income, from these electricity facilities in a specified report. The bill would require the district to establish a community benefits agreement plan for a specified electrical infrastructure development plan and related transmission and other electrical projects, as provided. This bill would make legislative findings and declarations as to the necessity of a special statute for the Westlands Water District. (Based on 09/05/2024 text)

**Position:** watch

**Priority:** B. Watch

### [AB 2911](#) (McKinnor, D) Campaign contributions: agency officers.

**Status:** 08/31/2024 - Failed Deadline pursuant to Rule 61(b)(17). (Last location was E. & C.A. on 5/29/2024)

**Summary:** The Political Reform Act of 1974 prohibits an officer of an agency from accepting, soliciting, or directing a contribution of more than \$250 from any party, participant, or a party or participant's agent, while a proceeding involving a license, permit, or other entitlement for use is pending before the agency and for 12 months following the date a final decision is rendered in the proceeding, if the officer knows or has reason to know that the participant has a financial interest, as defined. Current law permits an officer who violates this prohibition to cure the violation by returning the contribution, or portion of the contribution in excess of \$250, within 14 days of accepting, soliciting, or directing the

contribution, as specified. Current law also prohibits a party or party's agent from making a contribution of more than \$250 to any officer of an agency while a proceeding involving a license, permit, or other entitlement for use is pending before the agency and for 12 months following the date a final decision is rendered by the agency in that proceeding. This bill would raise the threshold for contributions regulated by these provisions to \$1,500, as specified. (Based on 04/16/2024 text)

**Position:** watch

**Priority:** B. Watch

**AB 2933 (Low, D) Multiunit residential structures and mixed-use residential and commercial structures: water conservation.**

**Status:** 05/16/2024 - Failed Deadline pursuant to Rule 61(b)(8). (Last location was APPR. SUSPENSE FILE on 5/8/2024)

**Summary:** Current law establishes the Building Standards Administration Special Revolving Fund, and makes the moneys in the fund available, upon appropriation, to state entities to carry out various related provisions, as specified. Current law requires the Department of Housing and Community Development to propose the adoption, amendment, or repeal of building standards to the California Building Standards Commission, and the department to adopt, amend, and repeal other rules and regulations for the protection of the public health, safety, and general welfare of the occupant and the public governing the erection, construction, enlargement, conversion, alteration, repair, moving, removal, demolition, occupancy, use, height, court, area, sanitation, ventilation, and maintenance of all hotels, motels, lodging houses, apartment houses, and dwellings, and buildings and structures accessory thereto, as specified. Current law authorizes those standards to include voluntary best practice and mandatory requirements related to environmentally preferable water using devices and measures. Current law requires the department and the commission to research, develop, and propose building standards to reduce potable water use in new residential and nonresidential buildings, including consideration of requiring installation of water reuse systems and consideration of requiring preplumbing of buildings to allow future use of recycled water, onsite treated graywater, or other alternative water sources. This bill would enact the California Multiunit Residential Structure and Mixed-Use Residential and Commercial Structure Water Conservation Act. The bill would state findings and declarations of the Legislature relating to wasted water due to plumbing leaks. The bill would require the department to investigate whether additional water conservation and efficiency measures are warranted for existing and new multifamily residential construction and mixed use commercial structures, including, but not limited to, point-of-use systems, as defined. The bill would authorize the department, if it determines that changes to the California Green Building Standards are warranted, to develop voluntary or mandatory proposals to be submitted to the commission for consideration. (Based on 04/18/2024 text)

**Position:** B. Watch

**Priority:** B. Watch

**Notes** ~~Possible support. Update building standards to conserve water.~~

**AB 2947 (Lackey, R) Water: turfgrass conversion.**

**Status:** 05/16/2024 - Failed Deadline pursuant to Rule 61(b)(8). (Last location was APPR. SUSPENSE FILE on 5/1/2024)

**Summary:** Would prohibit the Department of Water Resources, when it allocates funding for turf replacement programs, from excluding urban water suppliers' turfgrass conversion rebate programs if the rebate program requires the recipient of a rebate to achieve a net water savings and to use the most efficient turfgrass irrigation equipment, as provided. The bill would require an urban water supplier that offers a turfgrass conversion rebate program using funds awarded by the department after January 1, 2025, to report annually to the department on the number of turfgrass conversions that are funded through the program and the estimated water savings from the program until the funds are exhausted. (Based on 04/08/2024 text)

**Position:** watch

**Priority:** B. Watch

**AB 3121 (Petrie-Norris, D) Public utilities: incentive programs.**

**Status:** 08/31/2024 - Failed Deadline pursuant to Rule 61(b)(17). (Last location was E. U., & C. on 8/29/2024)

**Summary:** Current law establishes the Multifamily Affordable Housing Solar Roofs Program. Current law requires the Public Utilities Commission (PUC), as part of the program, to authorize the award of monetary incentives for qualifying solar energy systems, as defined, that are installed on multifamily residential properties of at least 5 rental housing units that are operated to provide deed-restricted low-income residential housing, as defined, and that meet one or more specified requirements, as provided. Current law requires the PUC to annually authorize the allocation of \$100,000,000 or 66.67% of available funds, whichever is less, beginning with the fiscal year commencing July 1, 2016, and ending with the fiscal year ending June 30, 2020, to the program from certain greenhouse gas allowance revenues received by electrical corporations and set aside for clean energy and energy efficiency projects, as provided. Current law requires the PUC to continue authorizing the allocation of these funds through June 30, 2026, if the PUC determines that revenues are available after 2020 and that there is adequate interest and participation in the program. Current law requires the PUC to evaluate the program every 3 years and requires the PUC to make necessary adjustments to the program to ensure that the goals of the program are being met, as specified. Current law authorizes the PUC to credit uncommitted funds back to ratepayers if the



PUC, upon review, finds that there is insufficient participation in the program. This bill would require the PUC to credit no more than 1/2 of the program funds that are unencumbered as of January 1, 2025, back to the residential retail customers of electrical corporations, as specified. (Based on 08/28/2024 text)

**Position:** watch

**Priority:** B. Watch

**SB 903 (Skinner, D) Environmental health: product safety: perfluoroalkyl and polyfluoroalkyl substances.**

**Status:** 05/16/2024 - Failed Deadline pursuant to Rule 61(b)(8). (Last location was APPR. SUSPENSE FILE on 4/29/2024)

**Summary:** Would, beginning January 1, 2032, prohibit a person from distributing, selling, or offering for sale a product that contains intentionally added perfluoroalkyl and polyfluoroalkyl substances (PFAS), as defined, unless the Department of Toxic Substances Control has made a determination that the use of PFAS in the product is a currently unavoidable use, the prohibition is preempted by federal law, or the product is previously used. The bill would specify the criteria and procedures for determining whether the use of PFAS in a product is a currently unavoidable use, for renewing that determination, and for revoking that determination. The bill would require the department to maintain on its internet website a list of each determination of currently unavoidable use, when each determination expires, and the products and uses that are exempt from the prohibition. The bill would impose an administrative penalty for a violation of the prohibition, as specified. The bill would establish the PFAS Penalty Account and require all administrative penalties received to be deposited into that account and, upon appropriation by the Legislature, to be used for the administration and enforcement of these provisions, as specified. (Based on 04/11/2024 text)

**Position:** watch

**Priority:** B. Watch

**SB 937 (Wiener, D) Development projects: fees and charges.**

**Status:** 09/19/2024 - Chaptered by Secretary of State - Chapter 290, Statutes of 2024

**Summary:** The Mitigation Fee Act regulates fees for development projects, fees for specific purposes, including water and sewer connection fees, and fees for solar energy systems, among others. The act, among other things, requires local agencies to comply with various conditions when imposing fees, extractions, or charges as a condition of approval of a proposed development or development project. The act prohibits a local agency that imposes fees or charges on a residential development for the construction of public improvements or facilities from requiring the payment of those fees or charges until the date of the final inspection or the date the certificate of occupancy is issued, whichever occurs first, except for utility service fees, which the local agency is authorized to collect at the time an application for utility service is received. The act exempts specified units in a residential development proposed by a nonprofit housing developer if the housing development meets certain conditions. This bill would limit the utility service fees exception described above to utility service fees related to connections, and cap those fees at the costs incurred by the utility provider resulting from the connection activities. (Based on 09/19/2024 text)

**Position:** watch

**Priority:** B. Watch

**Notes** - OUA position adopted on 4/3. Amendments removed opposed provisions. Move to "watch."

**SB 1110 (Ashby, D) Water reports: urban retail water suppliers: informational order: conservation order.**

**Status:** 08/15/2024 - Failed Deadline pursuant to Rule 61(b)(14). (Last location was APPR. SUSPENSE FILE on 8/7/2024)

**Summary:** Current law authorizes the State Water Resources Control Board, on and after January 1, 2024, to issue informational orders pertaining to water production, water use, and water conservation to an urban retail water supplier that does not meet its urban water use objective, as provided. Current law authorizes the board, on and after January 1, 2025, to issue a written notice to an urban retail water supplier that does not meet its urban water use objective. Current law authorizes the board, on and after January 1, 2026, to issue a conservation order to an urban retail water supplier that does not meet its urban water use objective. This bill would instead authorize the board to issue the informational orders on and after January 1, 2026, the written notice on and after January 1, 2027, and the conservation order on and after January 1, 2028. (Based on 06/26/2024 text)

**Position:** watch

**Priority:** B. Watch

**SB 1121 (Grove, R) Recycled water: onsite treated nonpotable water systems: local jurisdiction permitting.**

**Status:** 05/02/2024 - Failed Deadline pursuant to Rule 61(b)(6). (Last location was E.Q. on 2/21/2024)

**Summary:** Current law requires the State Water Resources Control Board, in consultation with the California Building Standards Commission and the Department of Housing and Community Development, to adopt regulations for risk-based water quality standards for the onsite treatment and reuse of nonpotable water, and requires a local jurisdiction that elects

to establish a program for onsite treated nonpotable water systems to establish design criteria, permitting, cross-connection control, and enforcement procedures, as provided. This bill would require those local jurisdictions to ensure their permitting procedures require the approval of a permit for an onsite treated nonpotable water system within 60 days from the date the permit application is submitted if the application demonstrates that the project meets or exceeds the state board's water quality standards for the onsite treatment and reuse of nonpotable water for nonpotable uses in multifamily residential, commercial, and mixed-use buildings. (Based on 02/13/2024 text)

**Position:** watch

**Priority:** B. Watch

**SB 1181 (Glazer, D) Campaign contributions: agency officers.**

**Status:** 09/12/2024 - Enrolled and presented to the Governor at 3 p.m.

**Summary:** The Political Reform Act of 1974 prohibits certain contributions of more than \$250 to an officer of an agency by any party, participant, or party or participant's agent in a proceeding while a proceeding involving a license, permit, or other entitlement for use is pending before the agency and for 12 months following the date a final decision is rendered in the proceeding, as specified. The act requires disclosure on the record of the proceeding, as specified, of certain contributions of more than \$250 within the preceding 12 months to an officer from a party or participant, or party's agent. This bill would exempt a city attorney or county counsel providing legal advice to the agency who does not have the authority to make a final decision in the proceeding from the definition of "officer" for purposes of these provisions. (Based on 09/06/2024 text)

**Position:** watch

**Priority:** B. Watch

**SB 1185 (Niello, R) Water conservation: water use objectives.**

**Status:** 04/25/2024 - Failed Deadline pursuant to Rule 61(b)(5). (Last location was N.R. & W. on 4/3/2024)

**Summary:** Existing law requires all water suppliers to increase the efficient use of water. Existing law establishes various water use objectives and restrictions, including urban water use objectives. Existing law requires the State Water Resources Control Board, in coordination with the Department of Water Resources, to adopt long-term standards for the efficient use of water, including standards for, among other things, a volume for water loss, and requires the board, when adopting the standards, to consider policies relating to urban water use objectives and proposed efficiency standards' effects on local wastewater management, developed and natural parklands, and urban tree health. This bill would delete the requirement that the board adopt standards, for purposes of urban water use objectives, for water loss and would instead require the board to consider the policies relating to urban water use objectives and proposed efficiency standards' effects on water loss. The bill would also set forth standards, policies, and procedures relating to water use objectives, generally, including, among other things, a prohibition against any water use objective established by the board that causes a reduction of more than 20% when compared to a water supplier's actual water use in 2023 or that exceeds a water use standard recommended by the department. (Based on 03/18/2024 text)

**Priority:** B. Watch

**SB 1243 (Dodd, D) Campaign contributions: agency officers.**

**Status:** 09/12/2024 - Enrolled and presented to the Governor at 3 p.m.

**Summary:** The Political Reform Act of 1974 prohibits certain contributions of more than \$250 to an officer of an agency by any party, participant, or party or participant's agent in a proceeding while a proceeding involving a license, permit, or other entitlement for use is pending before the agency and for 12 months following the date a final decision is rendered in the proceeding, as specified. The act requires disclosure on the record of the proceeding, as specified, of certain contributions of more than \$250 within the preceding 12 months to an officer from a party or participant, or party's agent. The act disqualifies an officer from participating in a decision in a proceeding if the officer has willfully or knowingly received a contribution of more than \$250 from a party or a party's agent, or a participant or a participant's agent, as specified. The act allows an officer to cure certain violations of these provisions by returning a contribution, or the portion of the contribution of in excess of \$250, within 14 days of accepting, soliciting, or receiving the contribution, whichever comes latest. This bill would raise the threshold for contributions regulated by these provisions to \$500, as specified. The bill would extend the period during which an officer may cure a violation to within 30 days of accepting, soliciting, or directing the contribution, whichever is latest. The bill would specify that a person is not a "participant" for the purposes of these provisions if their financial interest in a decision results solely from an increase or decrease in membership dues. (Based on 09/06/2024 text)

**Position:** watch

**Priority:** B. Watch

**SB 1330 (Archuleta, D) Urban retail water supplier: water use.**

**Status:** 08/15/2024 - Failed Deadline pursuant to Rule 61(b)(14). (Last location was APPR. SUSPENSE FILE on 8/7/2024)

**Summary:** Current law requires an urban retail water supplier to calculate its urban water use objective no later than January 1, 2024, and by January 1 every year thereafter, and to be composed of the sum of specified data, including aggregate residential water use. Current law requires each urban retail water supplier's water use objective to be composed of the sum of specified aggregate estimates, including efficient outdoor irrigation of landscape areas with dedicated irrigation meters or equivalent technology in connection with water used by commercial water users, industrial water users, institutional water users, and large landscape water users (CII). Current law requires an urban retail water supplier to submit reports to the Department of Water Resources, as provided, by the same dates. This bill would require the department to, no later than January 1, 2035, conduct necessary studies and investigations regarding the efficiency performance of newly constructed residential landscapes and landscape areas with dedicated irrigation meters in connection with CII water use, as specified. (Based on 06/26/2024 text)

**Position:** watch

**Priority:** B. Watch

**Metropolitan Water District of Southern California**  
**State Legislative Matrix**  
**October 8, 2024 – Second Year of Legislative Session**

Item No. 2e

| Bill Number<br>Author                                                                                                                            | Amended Date<br>Location                                              | Title-Summary                                                                                                                                                                                                                                                                                                                                                  | MWD Position                                                                                                                                            | Effects on Metropolitan                                                                                                                                                                                                                      |
|--------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>AB 400</b><br><b>B. Rubio (D – Baldwin Park)</b><br><br>Sponsors:<br>California State Association of Counties,<br>League of California Cities | Chaptered<br><br>Signed by Governor<br>Chapter 201, Statutes of 2023  | <b>Local agency design-build projects: authorization.</b><br><br>This measure would extend the existing sunset date to January 1, 2031, for the use of design-build as a delivery method for public works contracts.                                                                                                                                           | <b>Support</b><br><br>Based on<br>October 2021<br>Board Action                                                                                          | Metropolitan’s current authority to use design-build under AB 1845 (Calderon, CH. 275, 2022) will sunset on January 1, 2028. The provisions of this bill allow Metropolitan to use design-build for future projects through January 1, 2031. |
| <b>AB 460 Bauer-Kahan (D – Orinda)</b>                                                                                                           | Chaptered<br><br>Signed by Governor,<br>Chapter 342, Statutes of 2024 | <b>State Water Resources Control Board: water rights and usage: civil penalties.</b><br><br>This bill would require the State Water Resources Control Board to adjust for inflation, by January 1 of each year, beginning in 2025, the amounts of civil and administrative liabilities or penalties imposed by the board in water right actions, as specified. | <b>Support</b><br><br>Based on<br>Metropolitan<br>Policy Principles<br>for<br>Modernization<br>of Water Rights<br>Administration,<br>adopted April 2023 | The bill now will provide for enhanced civil penalties for violations of any State Board regulation or curtailment order.                                                                                                                    |

# Metropolitan Water District of Southern California

## State Legislative Matrix

### October 8, 2024 – Second Year of Legislative Session

| Bill Number<br>Author                                                                                                           | Amended Date<br>Location                                                                               | Title-Summary                                                                                                                                                                                                                                                                                                                                                                                           | MWD Position                                                                                                                      | Effects on Metropolitan                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
|---------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| AB 1337 Wicks (D - Oakland)                                                                                                     | Amended 5/18/23<br><br>Dead                                                                            | <b>State Water Resources Control Board: water diversion curtailment.</b><br><br>This bill would authorize SWRCB to adopt regulations for various water conservation purposes and implement these regulations through orders curtailing the diversion or use of water under any claim of right.                                                                                                          | <b>Oppose</b><br><br>Based on Metropolitan Policy Principles for Modernization of Water Rights Administration, adopted April 2023 | Regardless of whether there is a drought emergency, this bill would allow the State Board, by regulation, to permanently reduce permit rights (including SWP, Colorado River pre-1914 rights, or Delta Island license, pre-1914 or riparian right diversions) upon a finding that current diversions result in a waste or unreasonable use of water or that they harm public trust (fish and wildlife) resources. This would be a new broad power to the State Board that could permanently reallocate any water rights under any water year conditions without the protection or process of individual adjudications. |
| AB 1567 Garcia (D-Coachella)                                                                                                    | Amended 5/26/2023<br><br>Two-year bill<br><br>Senate Natural Resources and Water Committee<br><br>Dead | <b>Safe Drinking Water, Wildfire Prevention, Drought Preparation, Flood Protection, Extreme Heat Mitigation, Clean Energy, and Workforce Development Bond Act of 2024.</b><br><br>This measure would authorize a \$15.995 billion general obligation bond for the March 5, 2024, ballot to fund a broad range of resource-based programs that will assist California to improve its climate resiliency. | <b>Support, if Amended</b><br><br>Based on June 2023 Board Action                                                                 | This measure is consistent with Metropolitan's current policy priorities and supports the objectives of Metropolitan's Climate Adaptation Master Plan.<br><br>Metropolitan is seeking amendments to increase funding for recycled water, dam safety, regional conveyance, drought and conservation projects.                                                                                                                                                                                                                                                                                                           |
| AB 1572 Friedman (D - Glendale)<br><br>Co-sponsors: Governor, Metropolitan, Imperial Valley, National Resources Defense Council | Chartered<br><br>Signed by Governor Chapter 849, Statutes of 2023                                      | <b>Potable water: nonfunctional turf.</b><br><br>This measure prohibits the use of potable water for the irrigation of non-functional turf located on commercial, industrial, institutional. This measure provides the State Water Resources Control Board with the authority to postpone compliance dates as prescribed.                                                                               | <b>Co-sponsor</b><br><br>Based on April 2023 Board action                                                                         | Based on input from the Board and member agencies, Metropolitan secured amendments to exclude multi-family residential buildings and protect the authority and local control of public water systems. Metropolitan is a co-sponsor of this measure.                                                                                                                                                                                                                                                                                                                                                                    |

# Metropolitan Water District of Southern California

## State Legislative Matrix

### October 8, 2024 – Second Year of Legislative Session

| Bill Number<br>Author                                                                                                  | Amended Date<br>Location                                                                 | Title-Summary                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          | MWD Position                                                                                     | Effects on Metropolitan                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
|------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>AB 1573</b><br><b>Friedman (D - Glendale)</b><br><br>Sponsor:<br>Earth Advocacy and California Native Plant Society | Amended<br>9/1/2023<br><br>Two Year Bill<br><br>Senate Floor – Inactive File<br><br>Dead | <b>Water conservation: landscape design: model ordinance.</b><br><br>This measure would update the model water efficient landscape ordinance for new or renovated nonresidential areas to require at least 25% local native plants beginning January 1, 2026. This measure would also prohibit the use of nonfunctional turf in nonresidential landscape projects after January 1, 2026.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               | <b>Support</b><br><br>Based on 2023 Legislative Priorities and Principles, adopted December 2022 | This measure is consistent with Metropolitan's effort to reduce nonfunctional turf within its service area Metropolitan staff further solicited input from member agencies and worked with the author's office to develop amendments for an alternative NFT proposal, consistent with existing legislative policy principles, which was not adopted due to time constraints with end of session.                                                                                                                       |
| <b>AB 1581</b><br><b>A. Kalra (D – San Jose)</b>                                                                       | Amended 8/23/2024<br><br>Pending Governor's Signature                                    | <b>Conservation: Restoration Management Permit Act and California State Safe Harbor Agreement Program Act</b><br><br>This bill would authorize the California Department of Fish and Wildlife to (1) issue a restoration management permit to authorize the take, possession, import, or export of any species or subspecies of fish, wildlife, or plants in association with a management or propagation project that, among other things, has the primary purpose of restoring native fish, wildlife, plants, or their habitat and (2) authorize any impacts to fish and wildlife resources as a result of activities otherwise subject to the Lake and Streambed Alteration Program, as provided. The bill would exempt these management or restoration projects from various legal requirements, including, among others, the above-described prohibitions regarding the take or possession of fully protected fish, as specified. | <b>Support, if Amended</b>                                                                       | This bill proposes a one-stop-shop permitting process that would maximize its benefit to the environment by including environmental mitigation. The author's office negotiated language that would limit the scope to only include voluntary restoration projects, or projects that go beyond required mitigation. Metropolitan requested amendments that would allow projects undertaken as mitigation for regulatory compliance to be a "qualifying restoration project" under this proposed streamlining authority. |

# Metropolitan Water District of Southern California

## State Legislative Matrix

### October 8, 2024 – Second Year of Legislative Session

| Bill Number<br>Author                 | Amended Date<br>Location                                                 | Title-Summary                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 | MWD Position                                                                                     | Effects on Metropolitan                                                                                                                                                                                                                                                                                                                                  |
|---------------------------------------|--------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| AB 1648<br>Bains (D -<br>Bakersfield) | Amended 3/16/2023<br><br>Dead                                            | <b>Water: Colorado River Conservation</b><br><br>This measure would specifically prohibit Metropolitan and LADWP to offset federally required reductions on Colorado River resources with increased water deliveries from other regions of California, including the Delta, retroactively as of January 1, 2023.                                                                                                                                                                                                                                                              | <b>Oppose</b><br><br>Based on 2023 Legislative Priorities and Principles, adopted December 2022  | This measure would impair Metropolitan's flexibility with its entire water portfolio, including the Integrated Water Resources Plan and the Annual Operating Plan. Metropolitan's reliability and its ability to meet demands would also be impaired by restrictions on partnerships with its State Water Project and Colorado River Basin stakeholders. |
| AB 1827 D. Papan<br>(D – San Mateo)   | Chaptered<br><br>Signed by Governor,<br>Chapter 359, Statutes of<br>2024 | <b>Local government: fees and charges:</b><br><br>The Legislature passed the Proposition 218 Omnibus Implementation Act in 1997 to provide guidance for implementation of the new constitutional provisions. AB 1827 (Papan) proposes to add Government Code section 53750.6 to the Act to clarify that the costs that may be recovered through retail water service fees may include the incrementally higher costs of water service due to (1) the higher water usage demand of parcels, (2) the maximum potential water use of parcels, or (3) projected peak water usage. | <b>Support</b><br><br>Based on 2024 Legislative Priorities and Principles, adopted January 2024. | Metropolitan's wholesale water service rates to its co-op members are not subject to Proposition 218 and therefore, the bill does not have an effect on Metropolitan. It will, however, provide clearer guidance for its member agencies that provide retail water service and any retail water service provider within Metropolitan service area.       |

# Metropolitan Water District of Southern California

## State Legislative Matrix

### October 8, 2024 – Second Year of Legislative Session

| Bill Number<br>Author               | Amended Date<br>Location                                     | Title-Summary                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                | MWD Position                                                                                                                                                                                                                                           | Effects on Metropolitan                                                                                                                                                                                                                                                                                                                                                                  |
|-------------------------------------|--------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| AB 2060<br>E. Soria (D –<br>Fresno) | Amended<br>8/15/2024<br><br>Senate Inactive File<br><br>Dead | <p><b>Lake and streambed alteration agreements: exemptions.</b></p> <p>This bill would exempt qualifying temporary permit diversions of water from streams at or near flood stage to groundwater storage from the requirements of Fish &amp; Game Code section 1602. Section 1602 requires anyone proposing to substantially alter the bed, banks or natural flows of a stream, river or lake to notify the California Department of Fish and Wildlife (CDFW). If CDFW determines the proposed activity may have a significant adverse impact on fish or wildlife, it will require a Lake or Stream Alteration Agreement (LSAA) that functions as a permit for the activity, and which always requires mitigation, monitoring and reporting to CDFW. AB 2060 would exempt qualifying diversions from this requirement. The only “mitigation” required to qualify is installation of basic fish screens, with no requirement that they meet any standards, including those adopted by CDFW and the federal fish services.</p> | <p><b>Support if Amended</b></p> <p>Based on Metropolitan Policy Principles for Modernization of Water Rights Administration 2023 Water Rights Principles, adopted April 2023 and 2024 Legislative Priorities and Principles, adopted January 2024</p> | <p>This bill was amended to ensure the temporary permit authorization is consistent with existing law on diversion authorizations for current water rights holders. Metropolitan was seeking additional amendments to ensure the inclusion of fish screens on all intakes, not just “temporary pump” intakes, and that the screens minimize both entrainment <i>and</i> impingement.</p> |



# Metropolitan Water District of Southern California

## State Legislative Matrix

### October 8, 2024 – Second Year of Legislative Session

| Bill Number<br>Author                     | Amended Date<br>Location                                   | Title-Summary                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             | MWD Position                                                                                           | Effects on Metropolitan                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |
|-------------------------------------------|------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| AB 2257 L.<br>Wilson (D –<br>Suisun City) | Amended<br>8/5/2024<br><br>Pending Governor's<br>Signature | <p><b>Local government: property-related water and sewer fees and assessments: remedies.</b></p> <p>AB 2257 establishes a process for objections to be submitted by any party objecting to the proposed fee or assessment, notice to the public of the requirements, and prerequisites for suing an agency on the basis of the validity of the fee or assessment. The bill requires exhaustion of the administrative procedures provided therein before a plaintiff may file suit and it limits the administrative record that may be reviewed in that litigation to evidence presented to or available to the agency prior to the adoption of the fee or assessment.</p> | <p><b>Support</b></p> <p>Based on 2024 Legislative Priorities and Principles, adopted January 2024</p> | <p>Metropolitan does not currently collect any fee or assessment on properties within its service area that is subject to Article XIII D. It does, however, have the authority to do so. Should it decide to adopt such a fee or assessment, it would be required to follow these proposed additional procedural requirements. Any litigation challenging such a fee or assessment would also be subject to the administrative remedy exhaustion and evidence limitation provided for by AB2257.</p> |

# Metropolitan Water District of Southern California

## State Legislative Matrix

### October 8, 2024 – Second Year of Legislative Session

| Bill Number<br>Author                   | Amended Date<br>Location         | Title-Summary                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          | MWD Position                                                                                           | Effects on Metropolitan                                                                                                                                                                                                                                                                                  |
|-----------------------------------------|----------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| AB 2610<br>E. Garcia (D –<br>Coachella) | Amended<br>4/10/2024<br><br>Dead | <p><b>Protected species: authorized take: Salton Sea Management Program: System Conservation Implementation Agreement.</b></p> <p>Current law authorizes the Department of Fish and Wildlife, if certain conditions are fulfilled, to authorize the take of species, including fully protected species, resulting from impacts attributable to implementation of the Quantification Settlement Agreement on specified lands and bodies of water, including the Salton Sea. This bill would additionally authorize the department, if certain conditions are fulfilled, to authorize the take of species resulting from impacts attributable to the implementation of the Salton Sea Management Program or implementation of any System Conservation Implementation Agreement between the United States Bureau of Reclamation and the Imperial Irrigation District to implement the Lower Colorado River Basin System Conservation and Efficiency Program, as provided, on the specified lands and bodies of water.</p> | <p><b>Support</b></p> <p>Based on 2024 Legislative Priorities and Principles, adopted January 2024</p> | <p>This bill will help to advance conservation agreements and collective conservation goals related to reducing reliance of the Colorado River in order to account for changes in climate and low water supplies by allowing IID to advance their short-term conservation goals between 2024 – 2026.</p> |

# Metropolitan Water District of Southern California

## State Legislative Matrix

### October 8, 2024 – Second Year of Legislative Session

| Bill Number<br>Author                                               | Amended Date<br>Location                                                   | Title-Summary                                                                                                                                                                                                                                                                                                                                                                                                                                           | MWD Position                                                                                                                                                               | Effects on Metropolitan                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
|---------------------------------------------------------------------|----------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>SB 122</b><br>Senate Committee<br>on Budget and<br>Fiscal Review | Chartered<br><br>Signed by the Governor<br>Chapter 51, Statutes of<br>2023 | <b>Flood Flow Streamlining</b><br><br>Provisions in this trailer bill provide that diversion of flood flows for groundwater recharge do not require an appropriate water right if specified conditions regarding the diversion are met. These provisions exempt from the California Environmental Quality Act (CEQA) specified actions related to the implementation of Colorado River water conservation agreements with the US Bureau of Reclamation. | <b>Seek Amendments</b><br><br>Based on Metropolitan Policy Principles for Modernization of Water Rights Administration<br>2023 Water Rights Principles, adopted April 2023 | The no-permit authorization poses a significant concern to Metropolitan's State Water Project supplies. There is no protest process, no requirement that diverters avoid harm to other legal water users with water rights senior to the flood flow diverter, and no protection of SWP and CVP rights to divert "excess flows" when they exist in the system up to the full capacity of the projects.<br><br>Metropolitan will work with the Administration to address these issues as the program is implemented. |
| <b>SB 124</b><br>Senate Committee<br>on Budget and<br>Fiscal Review | Chartered<br><br>Signed by the Governor<br>Chapter 53, Statutes of<br>2023 | <b>Green Financing Programs for Federal IRA Funding</b><br><br>This measure contains various provisions to implement the 2023 State Budget Act, which includes authorizing the State Infrastructure and Economic Development Bank and the Department of Water Resources (DWR) to access and utilize federal funding in the Inflation Reduction Act to finance projects that reduce greenhouse emissions.                                                | <b>Support</b><br><br>Based on 2023 Legislative Priorities and Principles, adopted December 2022                                                                           | For the State Water Project, DWR's direct investment in qualifying projects could lower its capital costs, which would ultimately be passed on to Metropolitan and other SWP contractors.                                                                                                                                                                                                                                                                                                                          |

# Metropolitan Water District of Southern California

## State Legislative Matrix

### October 8, 2024 – Second Year of Legislative Session

| Bill Number<br>Author                           | Amended Date<br>Location                                            | Title-Summary                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             | MWD Position                                                                                               | Effects on Metropolitan                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
|-------------------------------------------------|---------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>SB 146</b><br><b>Gonzalez (D-Long Beach)</b> | Chaptered<br>Signed by the Governor<br>Chapter 58, Statutes of 2023 | <b>Public resources: infrastructure: contracting.</b><br><br>This measure is part of the negotiated infrastructure trailer bill package and authorizes DWR to use the progressive design-build (PDB) project delivery method for up to eight public works projects that exceed \$25 million. The Delta conveyance facilities and seawater desalination are expressly prohibited under this measure.                                                                                                                                                       | <b>Support</b><br><br>Based on October 2021 Board Action                                                   | By utilizing PDB and awarding a project contract prior to the completion of all design work, DWR can potentially reduce overall costs and execute shorter project delivery schedules. This could lead to reduced costs for SWP-related projects resulting in cost savings being passed on to Metropolitan.                                                                                                                                                                                                                      |
| <b>SB 147</b><br><b>Ashby (D-Sacramento)</b>    | Chaptered<br>Signed by the Governor<br>Chapter 59, Statutes of 2023 | <b>Fully protected species: California Endangered Species Act: authorized take</b><br><br>This measure is part of the negotiated infrastructure trailer bill package and authorizes the take of fully protected species for certain infrastructure projects if specified conditions are met. Eligible projects include the maintenance, repair and improvement of the State Water Project, as well as critical regional and local water infrastructure.                                                                                                   | <b>Support and Amend</b><br><br>Based on 2023 Legislative Priorities and Principles, adopted December 2022 | While this alternative may have benefits over current FPS regulations, the requirements are extensive and may make permit terms infeasible or cost prohibitive and could create other litigation risks for permittees.                                                                                                                                                                                                                                                                                                          |
| <b>SB 149</b><br><b>Caballero (D-Merced)</b>    | Chaptered<br>Signed by the Governor<br>Chapter 60, Statutes of 2023 | <b>California Environmental Quality Act: administrative and judicial procedures: record of proceedings: judicial streamlining.</b><br><br>This measure is part of the negotiated infrastructure trailer bill package and makes various changes to CEQA. This bill provides clarification for what is considered as part of the administrative record, as well as allowing a public agency to deny a request to prepare the record of proceedings. This bill also provides for expedited judicial review for specified energy and transportation projects. | <b>Support and Amend</b><br><br>Based on 2023 Legislative Priorities and Principles, adopted December 2022 | Administrative Records Streamlining: Overall, the provisions would be beneficial to Metropolitan as they could lower CEQA litigation costs and shorten litigation timelines.<br><br>Expedited Judicial Review: The process for preparing the administrative record for any governor-certified infrastructure project must follow certain extensive and potentially costly specifications. While expedited judicial review is beneficial in concept, unless amended, the prerequisites may be infeasible or costly to implement. |

# Metropolitan Water District of Southern California

## State Legislative Matrix

### October 8, 2024 – Second Year of Legislative Session

| Bill Number<br>Author                                                                                                                                                                                                                      | Amended Date<br>Location                                                   | Title-Summary                                                                                                                                                                                                                                                                                                                                                                                  | MWD Position                                                                                                    | Effects on Metropolitan                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>SB 150</b><br><b>Durazo (D-Los Angeles)</b>                                                                                                                                                                                             | Chartered<br><br>Signed by the Governor<br>Chapter 61, Statutes of<br>2023 | <b>Construction: workforce development:<br/>public contracts.</b><br><br>This measure is part of the negotiated<br>infrastructure trailer bill package and focuses<br>on strengthening the state's workforce and<br>community benefits with infrastructure<br>investments through California's share of<br>federal funds.                                                                      | <b>Support</b><br><br>Based on<br>2023 Legislative<br>Priorities and<br>Principles,<br>adopted<br>December 2022 | This bill is intended to help develop procurement<br>models to enhance the state's training and access<br>pipeline for jobs while ensuring community<br>benefits on infrastructure and manufacturing<br>investments.<br><br>This bill is consistent with Metropolitan's policy<br>and practice and could benefit the district by<br>helping build the next generation of the state's<br>construction workforce.                                                                                                                                  |
| <b>SB 366</b><br><b>Caballero (D - Merced)</b><br><br>Sponsors:<br>California<br>Municipal Utilities<br>Association,<br>California Council<br>for Environmental<br>and Economic<br>Balance, California<br>State Association<br>of Counties | Amended<br>8/22/2024<br><br>Pending Governor's<br>Signature                | <b>The California Water Plan: long-term<br/>supply targets.</b><br><br>This measure would revise the California<br>Water Plan to require the DW/R to update the<br>California Water Plan by December 31,<br>2028, and every five years after, to include a<br>long-term water supply target for 2050 and<br>discussion on the development of specified<br>water supply sources to meet demand. | <b>Support</b><br><br>Based on<br>2023 Legislative<br>Priorities and<br>Principles,<br>adopted<br>December 2022 | The intent of this bill is to help modernize<br>California's water management practices and<br>provide long-term reliable supplies in response to<br>the current climate challenges.<br><br>Metropolitan has taken a support position<br>following the adoption of several amendments to<br>address concerns, including the removal of<br>language that would require the CWP to make<br>recommendations for the Delta Reform Act and<br>inclusion of language to ensure that the CWP does<br>not impose on local and regional planning efforts. |

# Metropolitan Water District of Southern California

## State Legislative Matrix

### October 8, 2024 – Second Year of Legislative Session

| Bill Number<br>Author                                                                                        | Amended Date<br>Location                                                    | Title-Summary                                                                                                                                                                                                                                                                                                                                       | MWD Position                                                                                                 | Effects on Metropolitan                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
|--------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>SB 659</b><br><b>Ashby (D – Sacramento)</b><br><br>Sponsors:<br>Sacramento<br>Regional Water<br>Authority | Chartered<br><br>Signed by the Governor<br>Chapter 624, Statutes of<br>2023 | <b>California Water Supply Solutions Act of 2023.</b><br><br>This bill would require DWR to develop a groundwater recharge plan by January 1, 2026, to create additional groundwater recharge capacity and include the plan as part of the 2028 update to the California Water Plan.                                                                | <b>Support, if Amended</b><br><br>Based on 2023 Legislative Priorities and Principles adopted December 2022. | This bill intends to elevate the importance of groundwater in the state's planning efforts. Additional recharge capacities developed through implementation of this bill could potentially help in the successful implementation of projects such as Metropolitan's Pure Water project, LADWP's Operation Next project, and the Pure Water San Diego, potentially helping to maximize stormwater capture and increase sustainability of groundwater basins within Metropolitan's service area. |
| <b>SB 687</b><br><b>Eggman (D - Stockton)</b>                                                                | Amended<br>5/2/2023<br><br>Dead                                             | <b>Water Quality Control Plan: Delta Conveyance Project.</b><br><br>This measure will require the State Water Resources Control Board to adopt a final update of the Bay-Delta Water Quality Control Plan before the Board considers a change in the point of diversion or any other water rights permit or order for the Delta Conveyance Project. | <b>Oppose</b><br><br>Based on 2023 Legislative Priorities and Principles, adopted December 2022              | Metropolitan supports updating the Water Quality Control Plan to protect beneficial uses in the Delta. This bill would result in halting or delaying planning efforts on the Delta Conveyance Project and potentially prevent the project from operating if approved.                                                                                                                                                                                                                          |

# Metropolitan Water District of Southern California

## State Legislative Matrix

### October 8, 2024 – Second Year of Legislative Session

| Bill Number<br>Author                                                                                                                                                                                          | Amended Date<br>Location                                                 | Title-Summary                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               | MWD Position                                                                                     | Effects on Metropolitan                                                                                                                                                                                                                                                                                                                                                                                                             |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>SB 706</b><br><b>Caballero (D-Merced)</b><br><br>Sponsors:<br>CA State Association of Counties; County of San Diego; Design Build Institute of America Western Pacific Chapter; League of California Cities | Chaptered<br><br>Signed by the Governor<br>Chapter 500, Statutes of 2023 | <b>Public contracts: progressive design-build: local agencies.</b><br><br>This bill would provide additional authority, until January 1, 2023, for cities, counties, and special districts to use progressive design-build (PDB) authority for up to 10 public works projects that are in excess of \$5 million. In addition, any local agency that uses this authorized progressive-design build process must submit a report to the Legislature.                                                                          | <b>Support</b><br><br>Based on 2023 Legislative Priorities and Principles, adopted December 2022 | Currently, PDB-eligible projects are limited to wastewater treatment facilities, park and recreational facilities, solid waste management facilities and water recycling facilities. This bill now authorizes cities, counties and special districts, including Metropolitan, to use PDB for public works projects. This supports Metropolitan's priority of ensuring reliable water supply deliveries throughout its service area. |
| <b>SB 867</b><br><b>Allen (D-Santa Monica)</b>                                                                                                                                                                 | Chaptered<br><br>Signed by the Governor,<br>Chapter 83, Statutes of 2024 | <b>Drought, Flood and Water Resilience, Wildfire and Forest Resilience, Coastal Resilience, Extreme Heat Mitigation, Biodiversity and Nature-Based Climate Solutions, Climate Smart Agriculture, Park Creation and Outdoor Access, and Clean Energy Bond Act of 2024.</b><br><br>This measure would authorize a \$15.5 billion general obligation bond for a range of resource-based programs that will improve California's climate resiliency. If approved, this measure would be on the March 5, 2024, statewide ballot. | <b>Support, if Amended</b><br><br>Based on June 2023 Board Action                                | This measure is consistent with Metropolitan's current policy priorities and supports the objectives of Metropolitan's Climate Adaptation Master Plan.<br><br>Metropolitan is seeking amendments to increase funding for recycled water, dam safety, regional conveyance, drought, and conservation projects.                                                                                                                       |

# Metropolitan Water District of Southern California

## State Legislative Matrix

### October 8, 2024 – Second Year of Legislative Session

| Bill Number<br>Author               | Amended Date<br>Location         | Title-Summary                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   | MWD Position                                                                                           | Effects on Metropolitan                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
|-------------------------------------|----------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| SB 903 N. Skinner<br>(D – Berkeley) | Amended<br>4/11/2024<br><br>Dead | <p><b>Environmental health: product safety: perfluoroalkyl and polyfluoroalkyl substances.</b></p> <p>Starting January 1, 2025, certain substances called perfluoroalkyl and polyfluoroalkyl substances (PFAS) will be prohibited in new textiles, cosmetics, food packaging, and juvenile products in the state. This means that manufacturers and sellers cannot add PFAS to these products. A new bill, starting January 1, 2032, will also require the Department of Toxic Substances Control to determine if using PFAS in a product is necessary and unavoidable before it can be offered for sale. The department will keep a list of these determinations on its website and use any penalties collected for administering and enforcing these laws. By January 1, 2027, the department will adopt regulations to carry out this bill, including setting an application fee and creating an appeal process for penalties and decisions made under this law. A PFAS Oversight Fund will be created from the application fees to cover the department's expenses for administering this act, with funds allocated by the legislature.</p> | <p><b>Support</b></p> <p>Based on 2024 Legislative Priorities and Principles, adopted January 2024</p> | <p>From a source water protection standpoint, the bill creates provisions to reduce PFAS contamination and enhance protection of water quality and public health. By limiting PFAS in consumer products, the bill indirectly aims to reduce PFAS contamination in water sources, potentially decreasing treatment costs and complexity for water providers. The bill encourages the development and adoption of PFAS alternatives, potentially impacting the types of materials and products used within the water industry and by consumers, promoting safer water handling and packaging materials.</p> |



# Metropolitan Water District of Southern California

## State Legislative Matrix

### October 8, 2024 – Second Year of Legislative Session

|                                       |                                                                           |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |                                                                                                        |                                                                                                                                                                                                                                                                                                                                                                                           |
|---------------------------------------|---------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| SB 1072 S. Padilla<br>(D – San Diego) | <p>Chaptered</p> <p>Signed by Governor, Chapter 323, Statutes of 2024</p> | <p><b>Local government: Proposition 218: remedies.</b></p> <p>The California Constitution has rules for imposing taxes at a local level. It excludes certain fees and assessments if they meet certain criteria, such as not exceeding the benefit given to a property or the cost of the service provided. There is also a law known as the Proposition 218 Omnibus Implementation Act that outlines how local agencies must comply with these requirements. This bill, if passed, would require local agencies to correct any fees or charges for property-related services that violate these constitutional provisions and credit the amount of the violation against the revenues needed for the service. This bill supports the purposes and intent of Proposition 218 and the Omnibus Implementation Act.</p> | <p><b>Support</b></p> <p>Based on 2024 Legislative Priorities and Principles, adopted January 2024</p> | <p>Metropolitan does not currently collect any revenue from any property related fees or assessments subject to Articles XIII C or D. However, Metropolitan does have statutory authority to collect such fees. If Metropolitan were to adopt such a fee or assessment in the future, the revenues from those fees or assessment would be subject to the limitation added by SB 1072.</p> |
|---------------------------------------|---------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|

# Metropolitan Water District of Southern California

## State Legislative Matrix

### October 8, 2024 – Second Year of Legislative Session

| Bill Number<br>Author                      | Amended Date<br>Location                                       | Title-Summary                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         | MWD Position                                                                                           | Effects on Metropolitan                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
|--------------------------------------------|----------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| SB 1147<br>A. Portantino (D –<br>Glendale) | Amended<br>8/22/2024<br><br>Pending<br>Governor's<br>Signature | <p><b>Drinking water: bottled water: microplastics levels.</b></p> <p>SB 1147, introduced on February 14, 2024, would add Section 116376.2 to the Health and Safety Code and would require the Office of Environmental Health Hazard Assessment (OEHHHA) to study the health impacts of microplastics in drinking water, including bottled water, to evaluate and identify safe and unsafe levels of microplastics, and develop and deliver to the State Water Resources Control Board (State Board) public health standards and goals for safe microplastics levels in drinking water, including bottled water, by January 1, 2026. The bill would also require OEHHHA to develop and deliver to the State Board definitions for the terms “safe level of microplastics” and “unsafe level of microplastics” by January 1, 2026.</p> | <p><b>Support</b></p> <p>Based on 2024 Legislative Priorities and Principles, adopted January 2024</p> | <p>As originally proposed, this bill would circumvent the existing statutory and regulatory process by mandating a new process without ensuring a well-established scientific foundation, which is critical for developing, standardizing, and validating microplastics analytical methods and procedures. Amendments were adopted to address concerns about the appropriate bifurcation of responsibilities between the State Board and OEHHHA for studying and setting standards for microplastics.</p> |

# Metropolitan Water District of Southern California

## State Legislative Matrix

### October 8, 2024 – Second Year of Legislative Session

| Bill Number<br>Author                 | Amended Date<br>Location                                              | Title-Summary                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    | MWD Position                                                                                           | Effects on Metropolitan                                                                                                                                                                       |
|---------------------------------------|-----------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| SB 1169<br>H. Stern (D – Los Angeles) | Chaptered<br><br>Signed by the Governor, Chapter 77, Statutes of 2024 | <p><b>Los Angeles County Flood Control District: finances.</b></p> <p>This law, known as the Los Angeles County Flood Control Act, sets up a district responsible for managing and preserving flood and wastewaters in the county. It permits the district to borrow money from certain sources to fund flood control work and repay the loan within 20 years with a maximum interest rate of 4.25% annually. The district must also collect enough taxes from property owners each year to cover the loan payments. Currently, the district is limited to borrowing a maximum of \$4.5 million and issuing bonds up to the same amount. This proposed bill would extend the loan repayment period to 35 years with a maximum interest rate of 5.5% annually. It would also remove the borrowing and bond limits for the district. The bill justifies these changes by stating the need for a special law for the Los Angeles County Flood Control District.</p> | <p><b>Support</b></p> <p>Based on 2024 Legislative Priorities and Principles, adopted January 2024</p> | Support for this bill will help with Los Angeles County's flood control program and is consistent with the Board's policy to support development of local resources and conservation efforts. |

# Metropolitan Water District of Southern California

## State Legislative Matrix

### October 8, 2024 – Second Year of Legislative Session

| Bill Number<br>Author                   | Amended Date<br>Location         | Title-Summary                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         | MWD Position                                                                                                                                                                                                                                       | Effects on Metropolitan                                                                                                                                                                                                                                                                                                                      |
|-----------------------------------------|----------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| SB 1390 A.<br>Caballero (D –<br>Merced) | Amended<br>8/22/2024<br><br>Dead | <p><b>Groundwater recharge: floodflows: diversion.</b></p> <p>Under current law, all water in the state belongs to the people, but individuals can gain the right to use it through a legal process. This process requires the water to be used for a purpose that is helpful or beneficial. However, if certain conditions are met, using floodwater for groundwater recharge does not require a specific legal right. These conditions include receiving notice from a local or regional agency that there is a risk of flooding, and filing a report with the State Water Resources Control Board once the diversion is finished. This applies to diversions that began before January 1, 2029. This bill would extend these requirements to diversions that began before June 1, 2032. It would also add additional conditions that must be met for the diversion to be allowed, such as the local agency declaring that the diversion is in line with specific plans or emergency operations plans. The diversion must also stop within 90 days unless it is renewed, and the final report must include information about the methods used to predict and prevent flooding. Finally, the diversion must not harm any prior water rights holders in the area.</p> | <p><b>Support</b></p> <p>Based on Metropolitan Policy Principles for Modernization of Water Rights Administration</p> <p>2023 Water Rights Principles, adopted April 2023 and 2024 Legislative Priorities and Principles, adopted January 2024</p> | <p>SB 1390 has been amended to clarify which agencies may make the declaration that flood flow conditions exist and when they are required to declare they no longer exist. The amendments include language to protect Metropolitan's SWP supplies, which also supports our operations to maintain water quality standards in the Delta.</p> |



## STAFF REPORT

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**To: Board of Directors**

**Meeting Date: October 24, 2024**

**From: Sherri Seitz, Public Affairs Manager**

**Subject: Public Education and Outreach Report**

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### **Laguna Woods Village Television (LWVT)**

Director Adjarian is scheduled for a "This Day" interview on October 28, 2024. Director Adjarian's topic is October is National Preparedness Month.

### **ETWD Website Redesign**

Staff has begun the website redesign process with the new vendor Big Wig Monster Media. When complete, staff and Big Wig Monster will present a draft website at a future board meeting.

### **Adopt a Channel**

The channel and site vegetation have been cleared and staff is ready to arrange a photo opportunity at the site.

### **Community Events**

#### **Third Mutual Gate 11 Fall Meeting – September 24, 2024**

ETWD staff hosted a booth at the Third Mutual Gate 11 Fall meeting in Clubhouse 2 on September 24<sup>th</sup>.



#### **H2O for HOA's – October 17, 2024**

ETWD will participate in the H2O for HOA event on October 17, 2024 at the City of Laguna Hills Community Center.

#### **City of Mission Viejo – Disaster Preparedness Expo – October 19, 2024**

ETWD staff will host a booth and provide the water trailer for the City of Mission Viejo Disaster Preparedness Expo on October 19, 2024 from 9:00 am to 12:00 pm.

#### **City of Lake Forest Leadership Academy – October 23, 2024**

Dennis Cafferty will present at the City of Lake Forest Leadership Academy on October 24, 2024 at 6:00 p.m. at the City of Lake Forest City Hall.

#### **Lake Forest Chamber/City of Lake Forest Legislative Luncheon – October 28, 2024**

ETWD is providing drought tolerant centerpieces for the Law & Order legislation luncheon on October 28, 2024.

#### **City of Lake Forest/Lake Forest Chamber of Commerce – Elf Yourself 5K – November 23, 2024**

Staff will take the water trailer to the City of Lake Forest to provide water to the 5k participants on November 23, 2024.



## STAFF REPORT

**To: Board of Directors**

**Meeting Date: October 24, 2024**

**From: Vu Chu, Water Use Efficiency Analyst**

**Subject: Water Use Efficiency Report**

### **Rebate Programs:**

The SoCal WaterSmart regional rebate program is available to ETWD customers through the collaboration of the Metropolitan Water District of Southern California, the Municipal Water District of Orange County, and ETWD.

Eligible device purchases may qualify for rebates, contingent on meeting eligibility criteria and subject to fund availability. Detailed residential and commercial rebate information is accessible at:

[www.etwd.com/conservation/rebates](http://www.etwd.com/conservation/rebates)

[www.etwd.com/commercial-rebates](http://www.etwd.com/commercial-rebates)

### **Actual Customer Rebates Analysis:**

The following ETWD residential customer and commercial customer device rebates were approved by the Metropolitan Water District and the Municipal Water District of Orange County in September 2024.

The table below also shows the ETWD residential and commercial rebates approved between July 1, 2024, and June 30, 2025.

| <b>Rebate Program</b>                | <b>September 2024</b> | <b>FY 2024/25</b> |
|--------------------------------------|-----------------------|-------------------|
| High Efficiency Clothes Washers      | 2                     | 6                 |
| Weather Based Irrigation Controllers | 1                     | 1                 |

**Water Use Efficiency Plan Update:**

The District Water Budget-Based Tiered Conservation Rate Structure (WBBTCRS) pricing structure is the primary plan that gives customers the incentive needed to be efficient. The Plan efforts initially will concentrate on those customers continually in the Inefficient and Excessive Tiers (Tiers 3 and 4). During September 2024, residential customers accounted for 54.3% of Tier 3 usage and dedicated irrigation accounted for 45.7%. For Tier 4, residential customers accounted for 37.0% and dedicated irrigation accounted for 63.0% during the same period.

**Total Consumption Comparison to Evapotranspiration (ET) Factor:**

Included in this month's Water Use Efficiency Report is a chart comparing the current fiscal year consumption and ET factor to the fiscal 2023/24 consumption and ET factor. Total potable water consumption increased 21.67% in September 2024 versus September 2023. The ET factor increased from 3.99 to 4.96 during the same period.

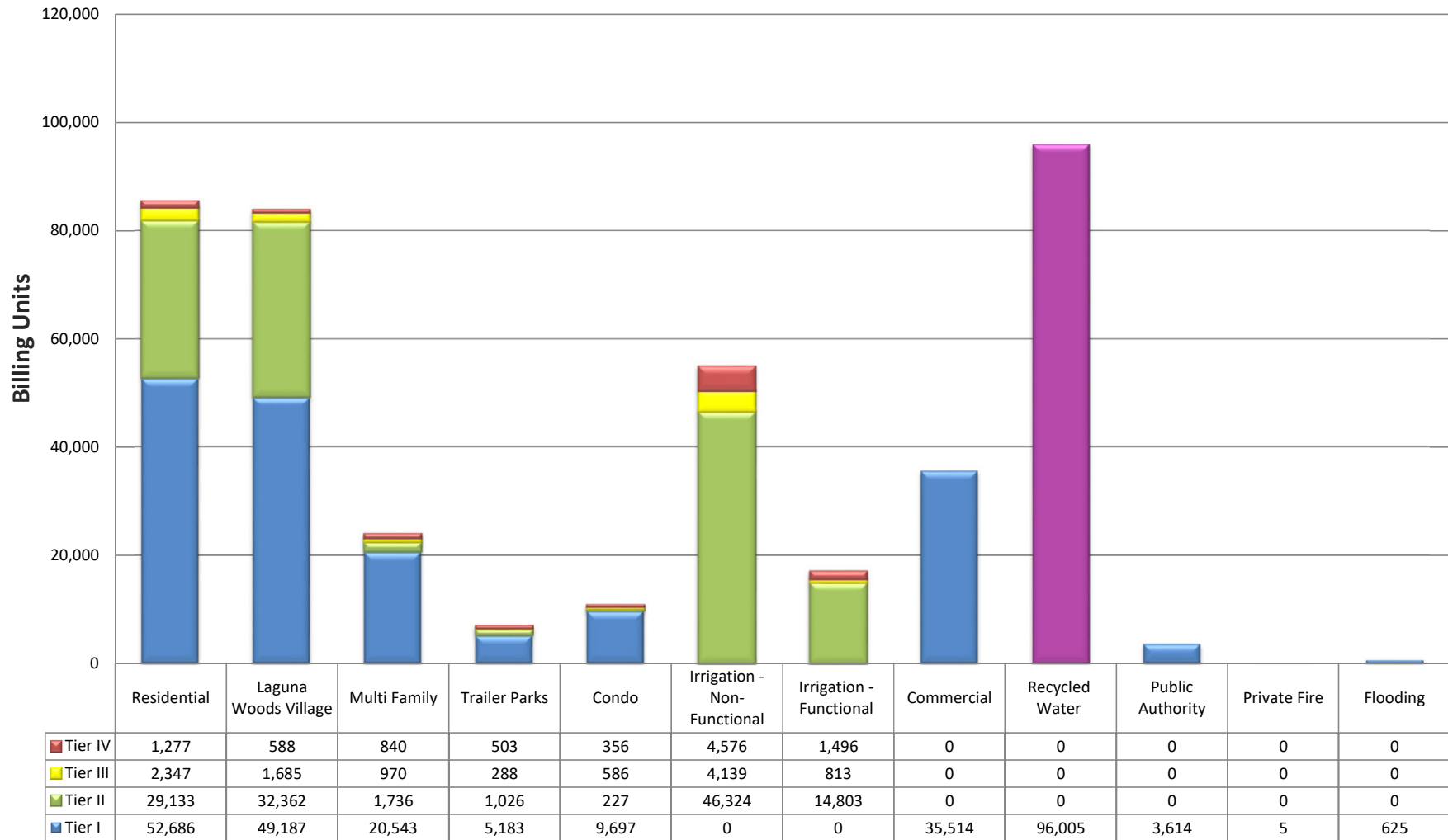
**ETWD Tier Consumption Information and Usage Information Compared to Previous Years:**

The following graphs highlight ETWD year-to-date consumption and consumption by tier for the current fiscal year compared to the 2023-2024 fiscal year. ETWD water consumption compared to 2013 and 2020 are also included.

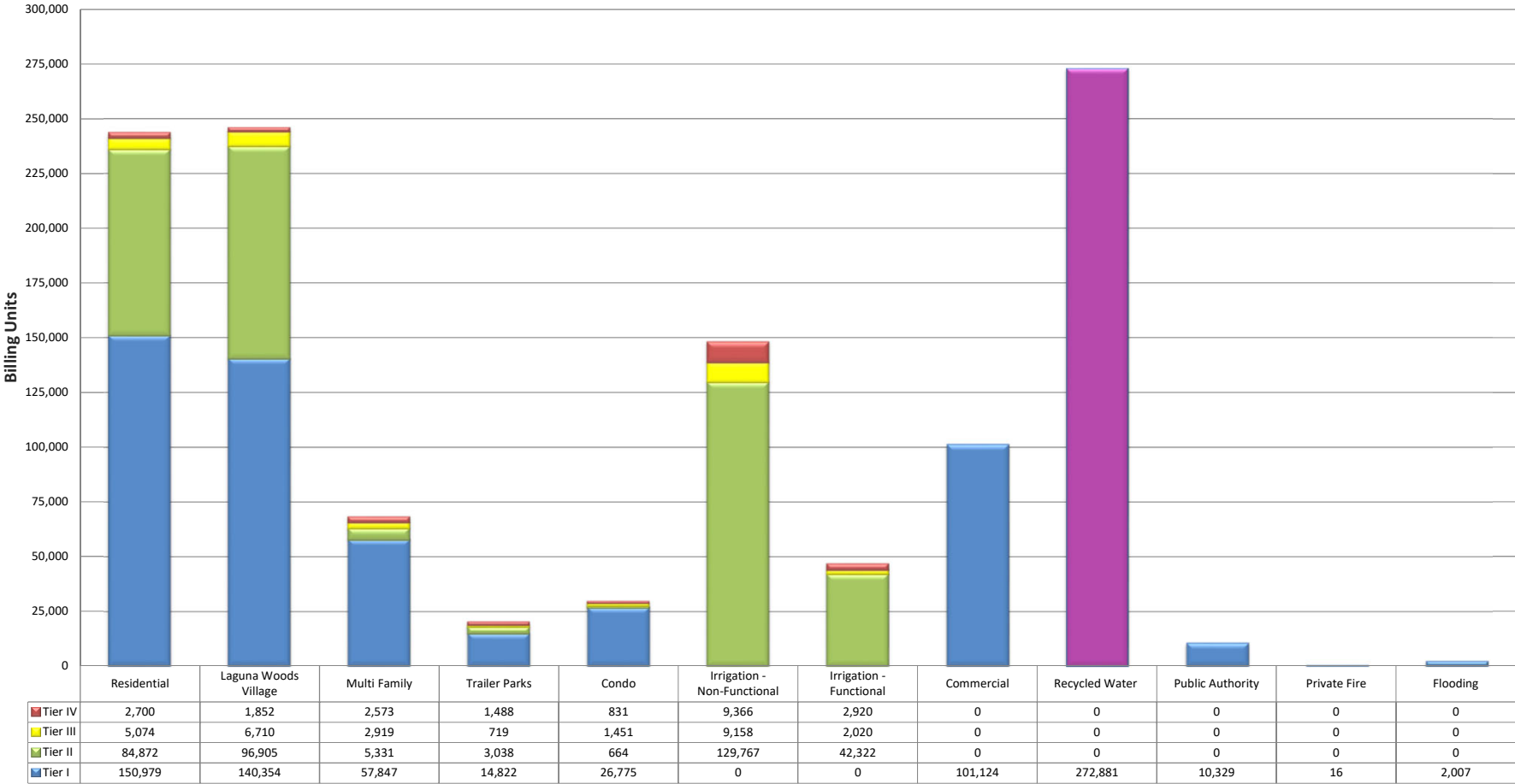




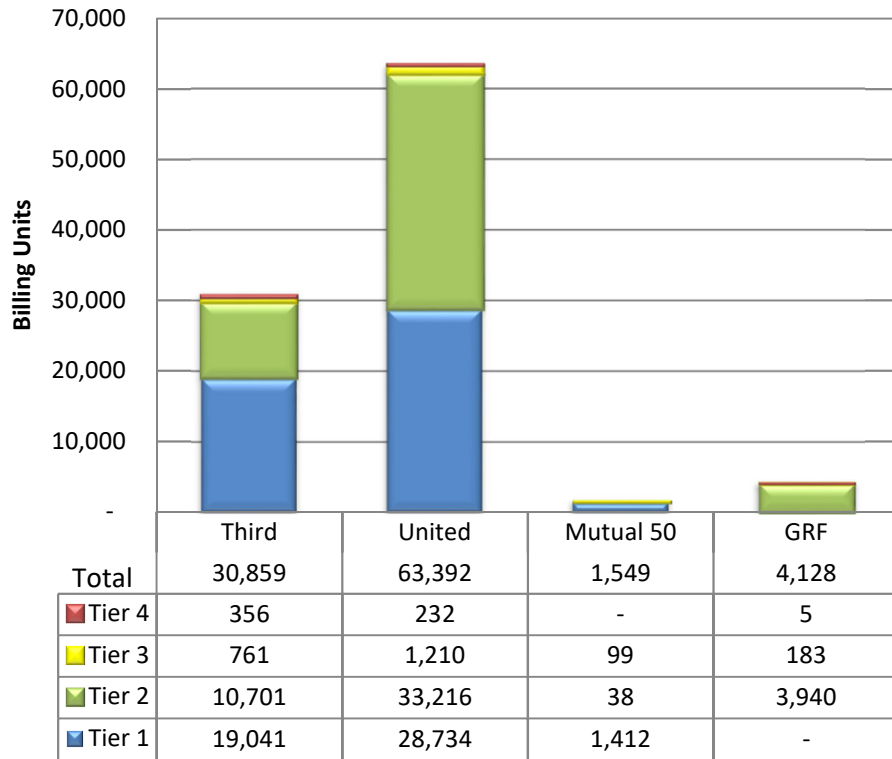
## September 2024 Water Sales



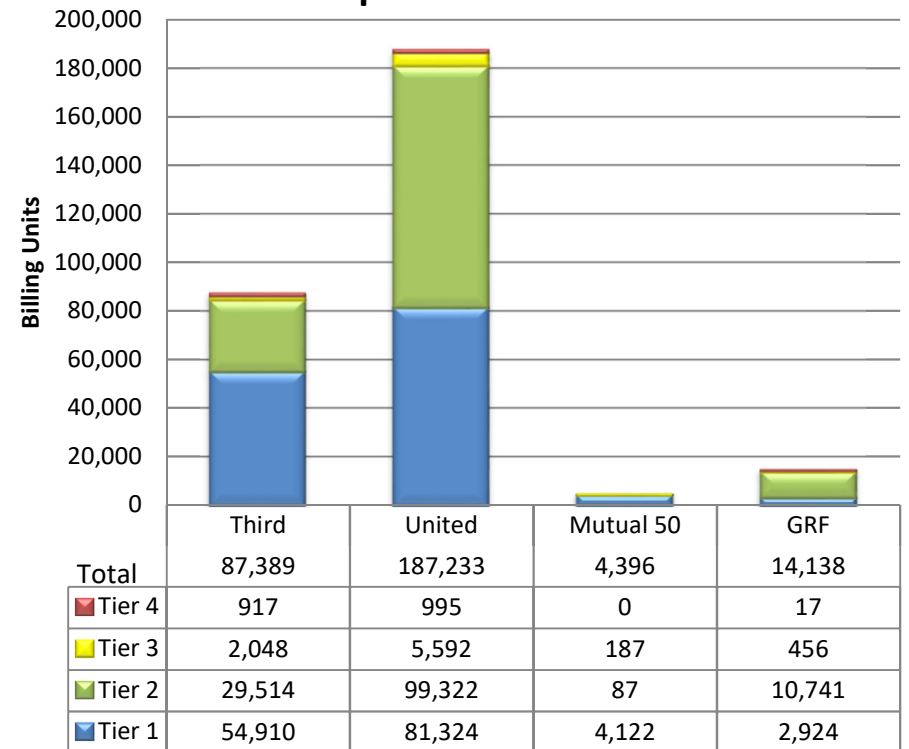
Year-to-Date Water Sales as of September 2024



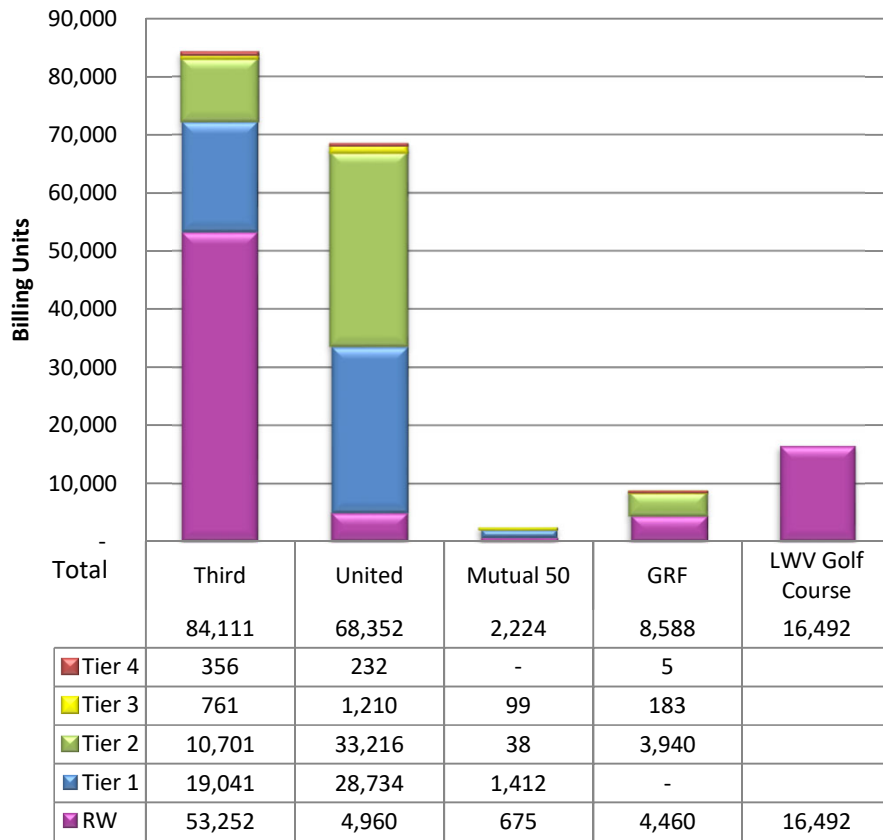
## Laguna Woods Village September 2024 Water Sales



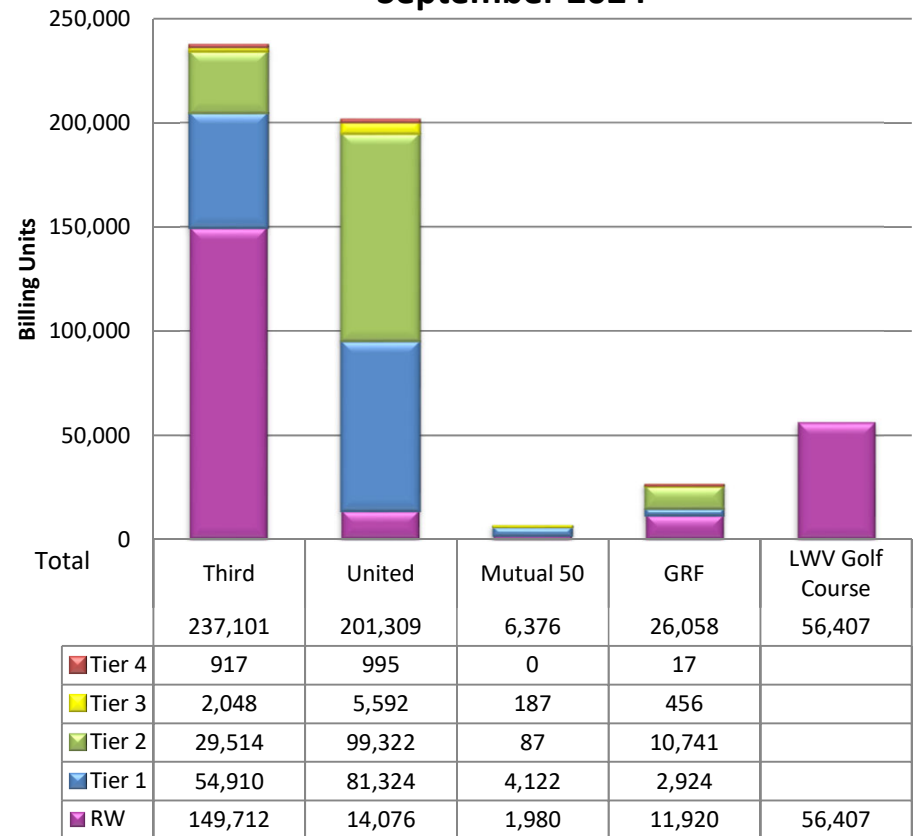
## Laguna Woods Village Year-to-Date Water Sales September 2024



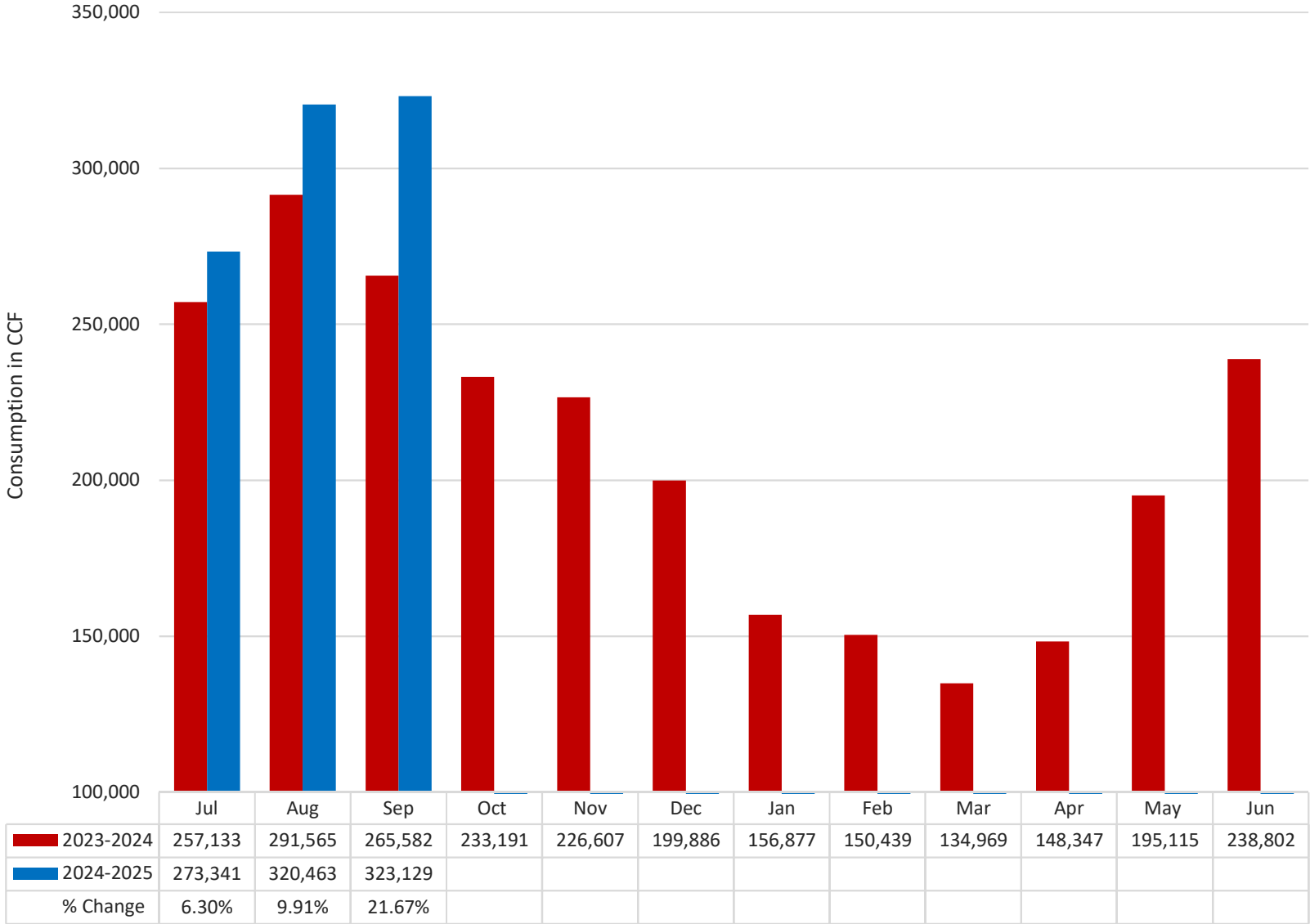
## Laguna Woods Village September 2024 Water & RW Sales



## Laguna Woods Village Year-to-Date Water & RW Sales September 2024



## ETWD Total Consumption



## ETWD Fiscal YTD Consumption

[illegible]





## Tier I Fiscal YTD Consumption

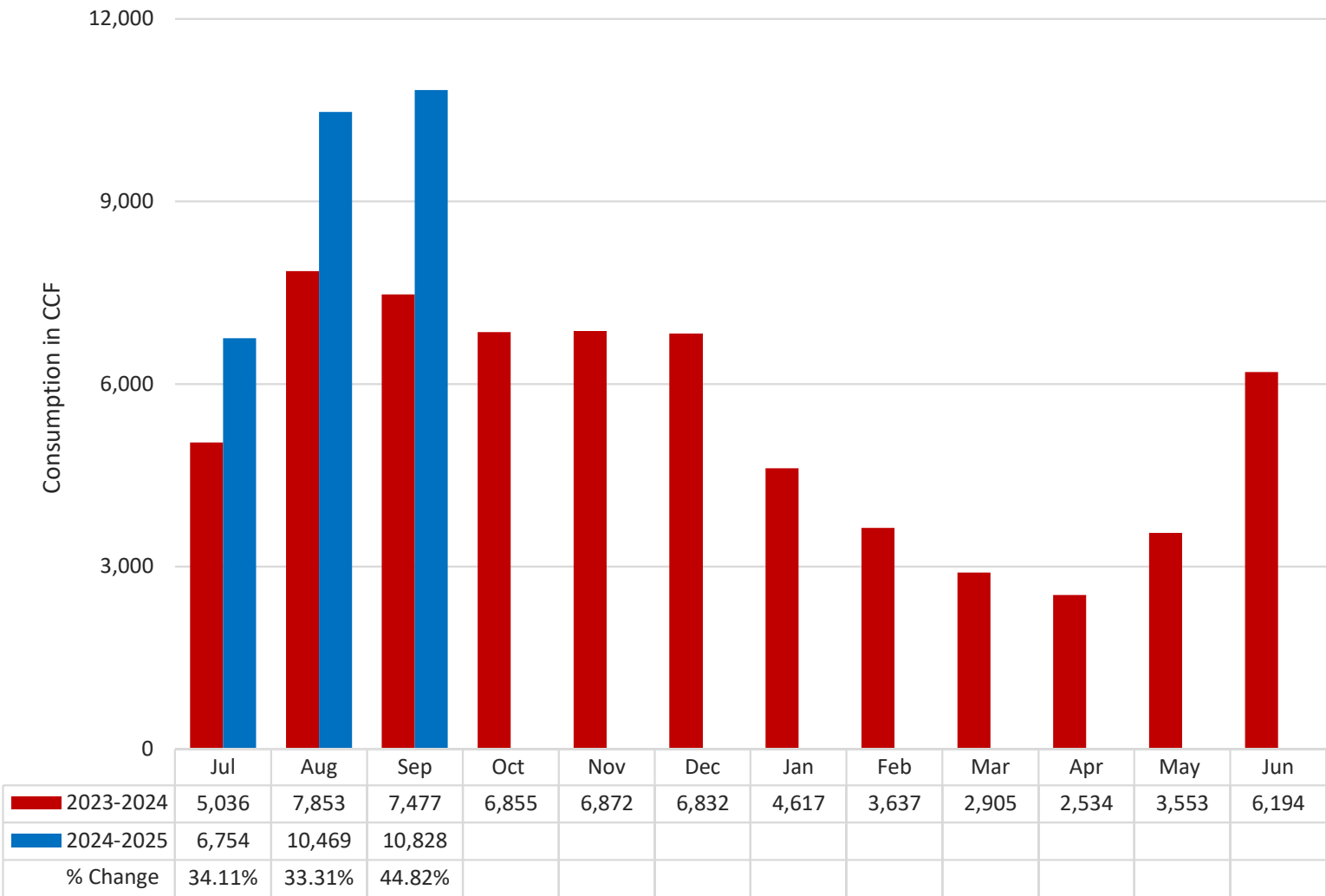
[illegible]



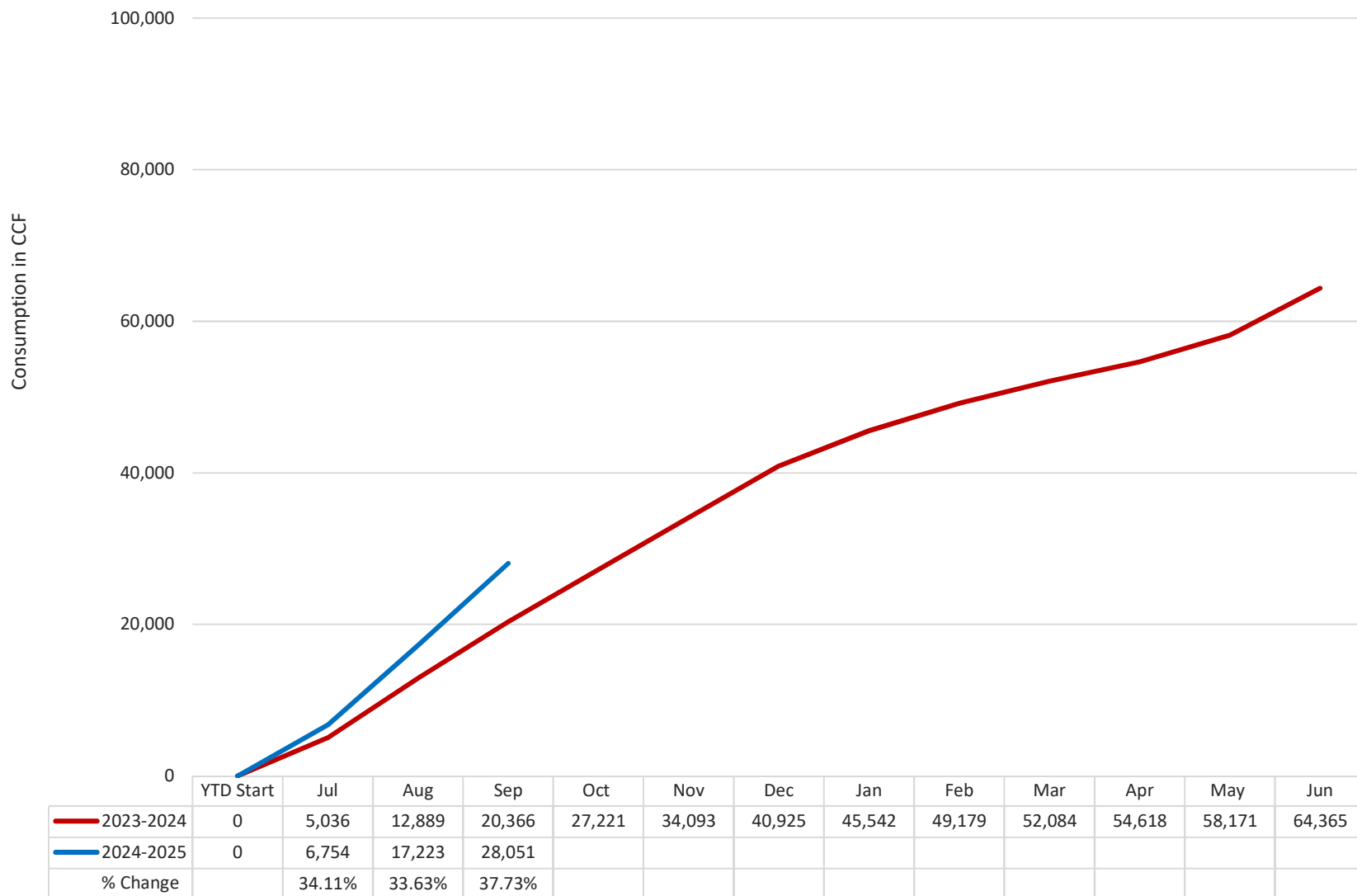
### Tier II Fiscal YTD Consumption

[illegible]

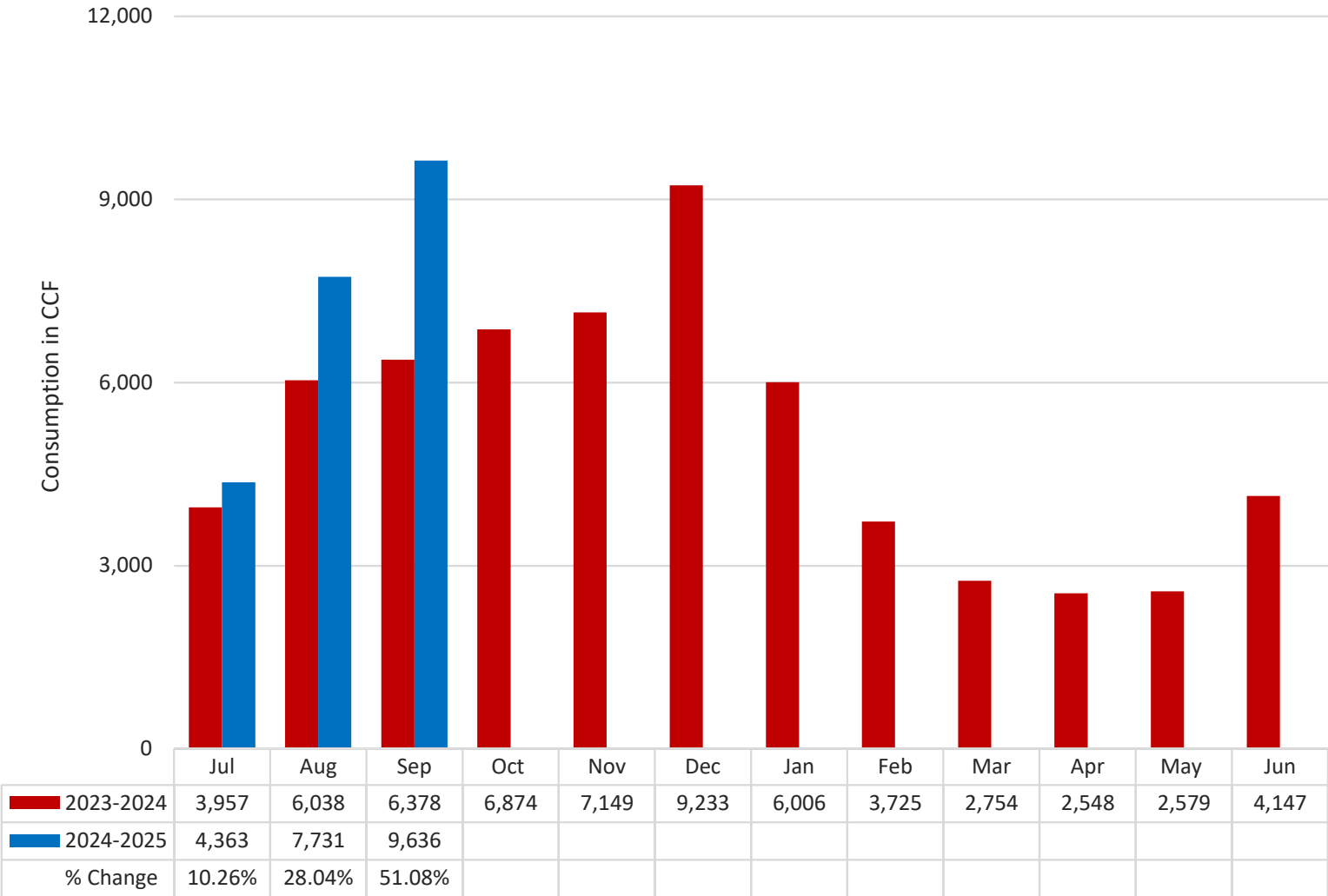
## Tier III Consumption



### Tier III Fiscal YTD Consumption



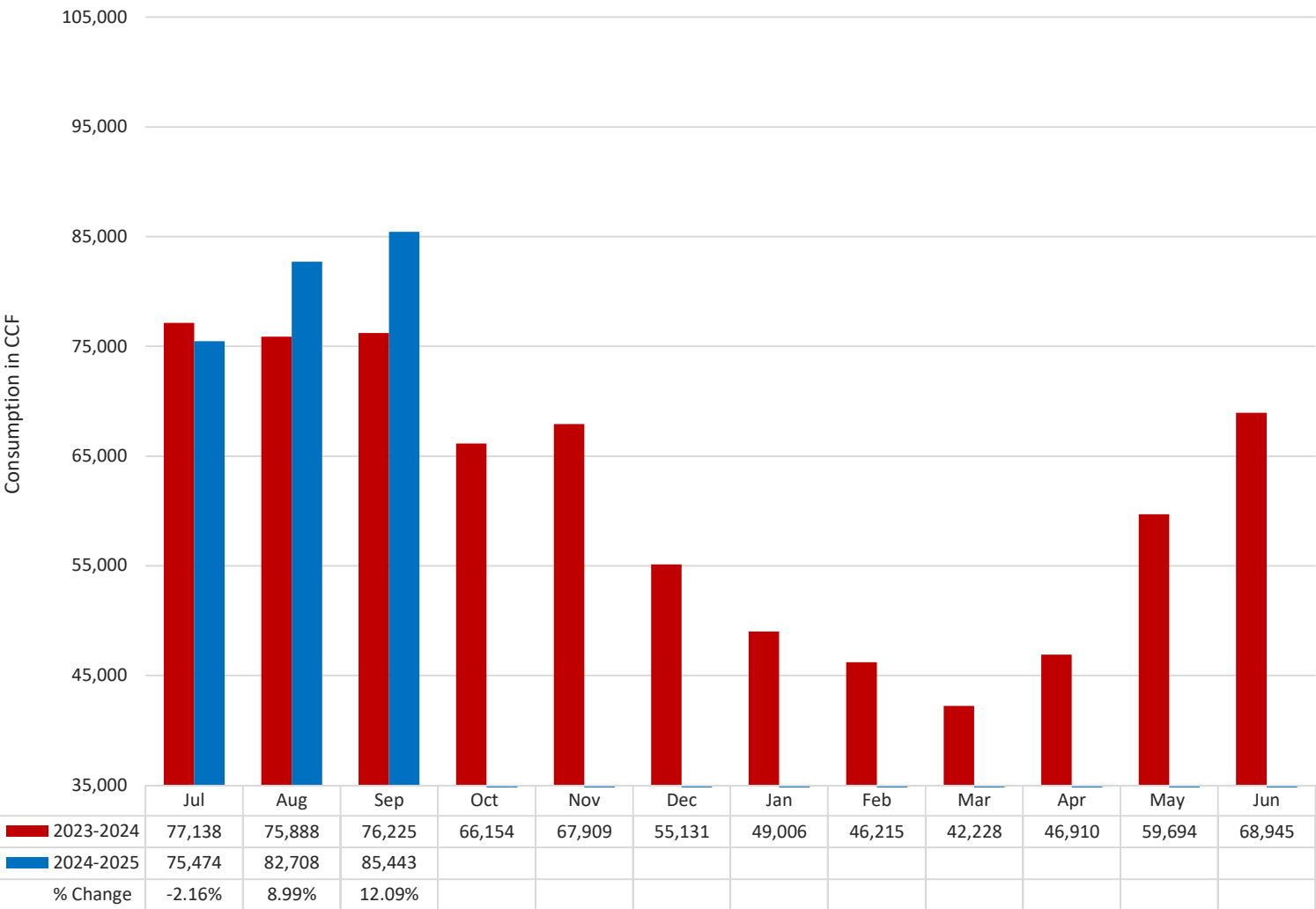
## Tier IV Consumption



## Tier IV Fiscal YTD Consumption

[illegible]

## Single Family Residents Consumption

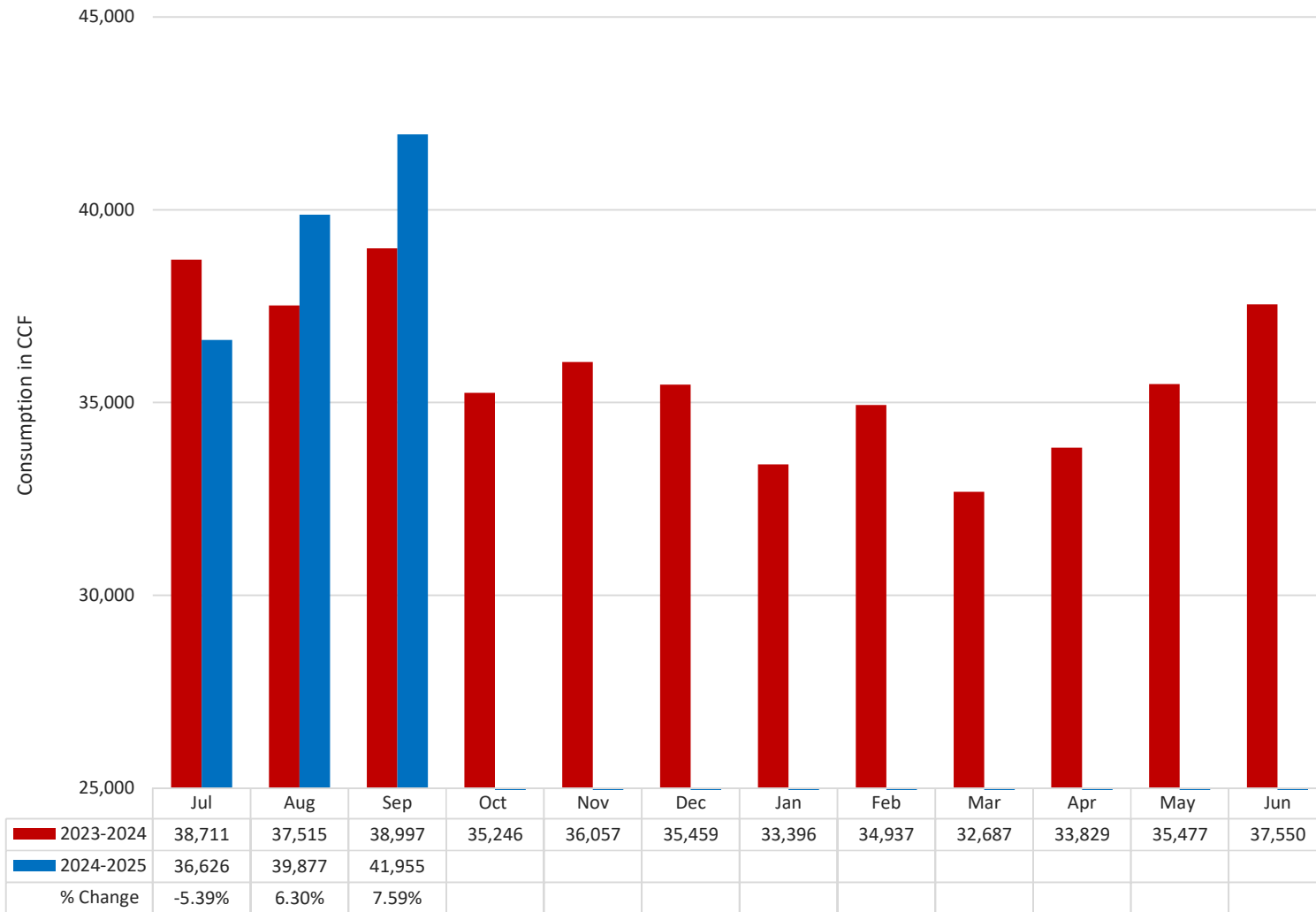




## Single Family Residents YTD Consumption

[illegible]

## Multi Family Residents Consumption

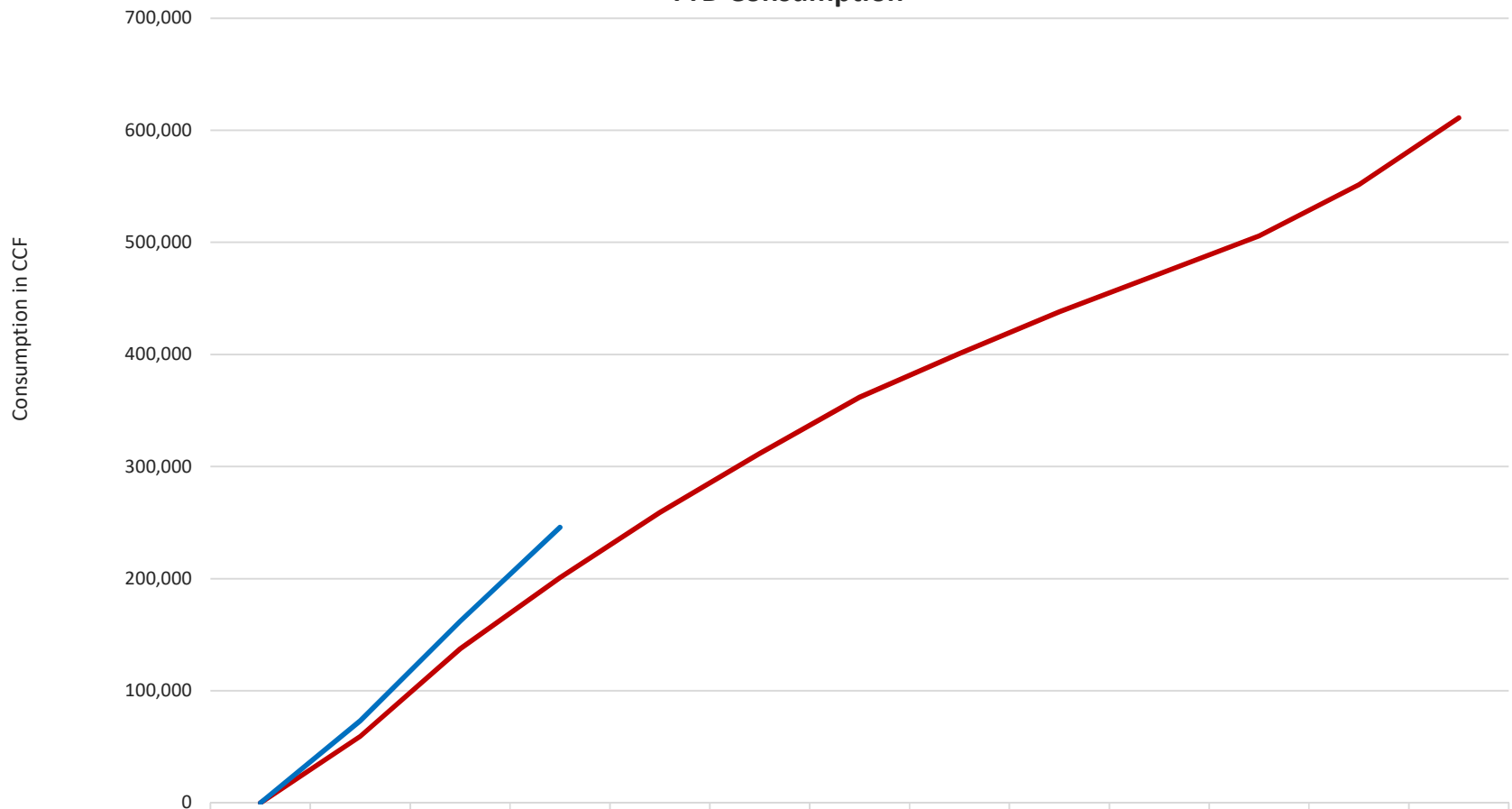


## Multi Family Residents YTD Consumption

[illegible]



**Laguna Woods Village (Excluding Dedicated Irrigation)**  
**YTD Consumption**

[illegible]



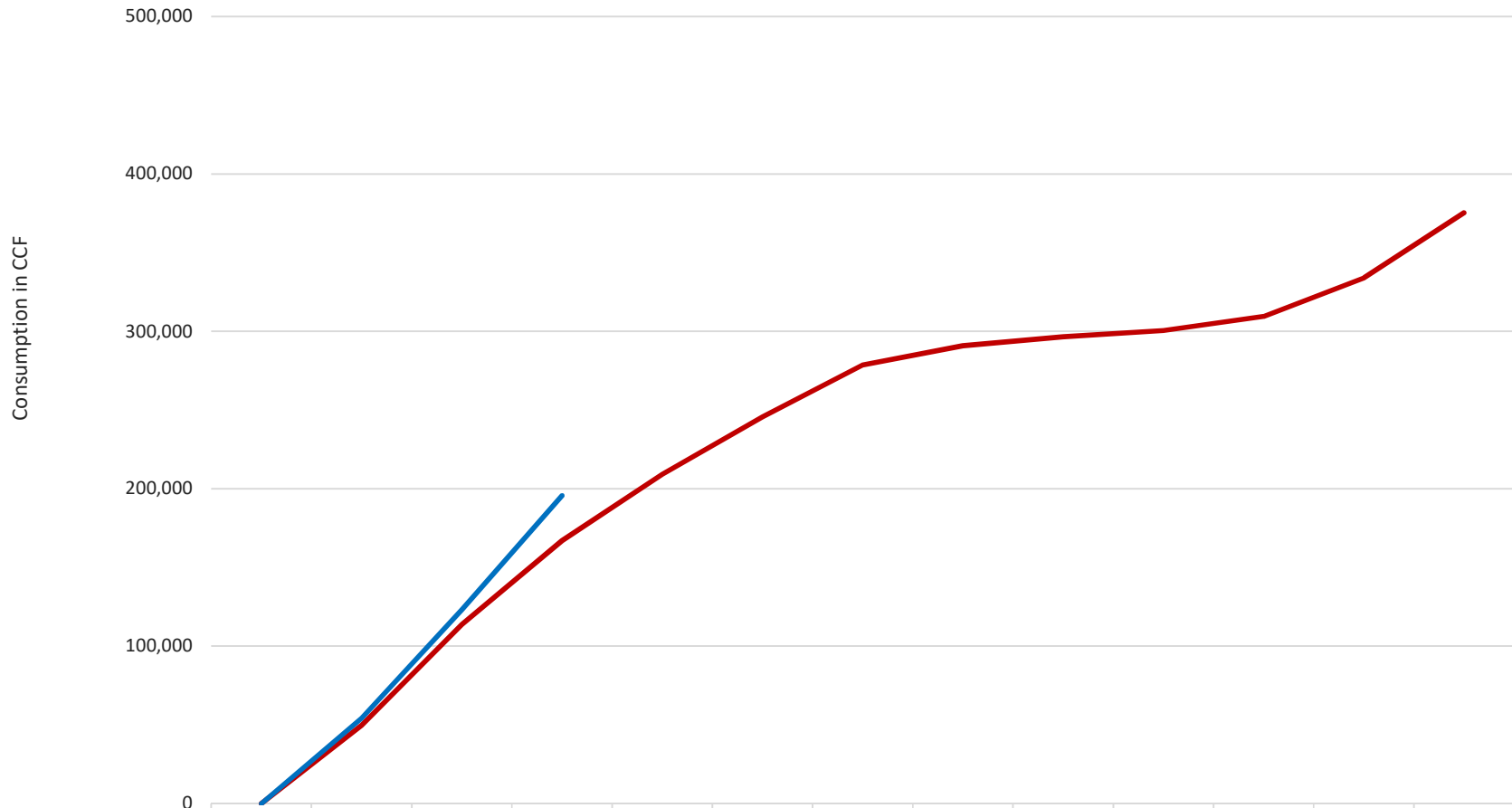
## Commercial YTD Consumption

[illegible]





**Dedicated Irrigation Consumption (including LWV)**  
**YTD Consumption**

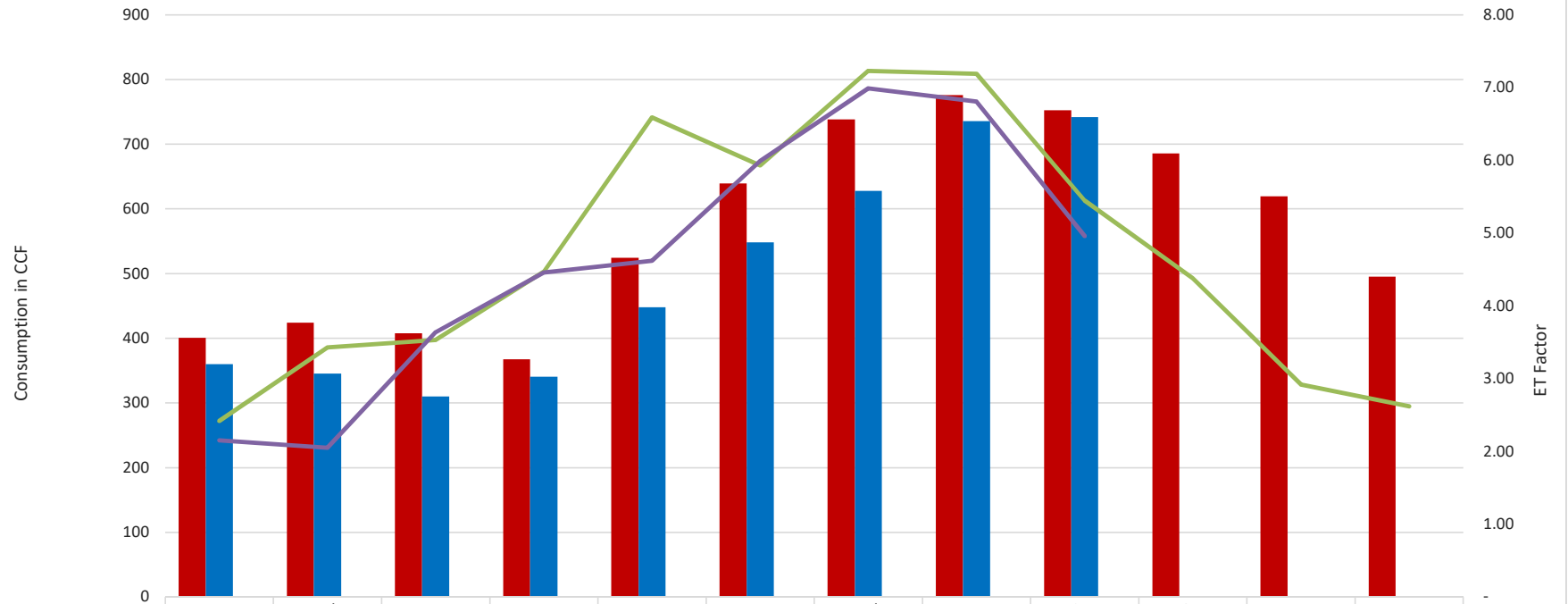
[illegible]



## Recycled Water YTD Consumption

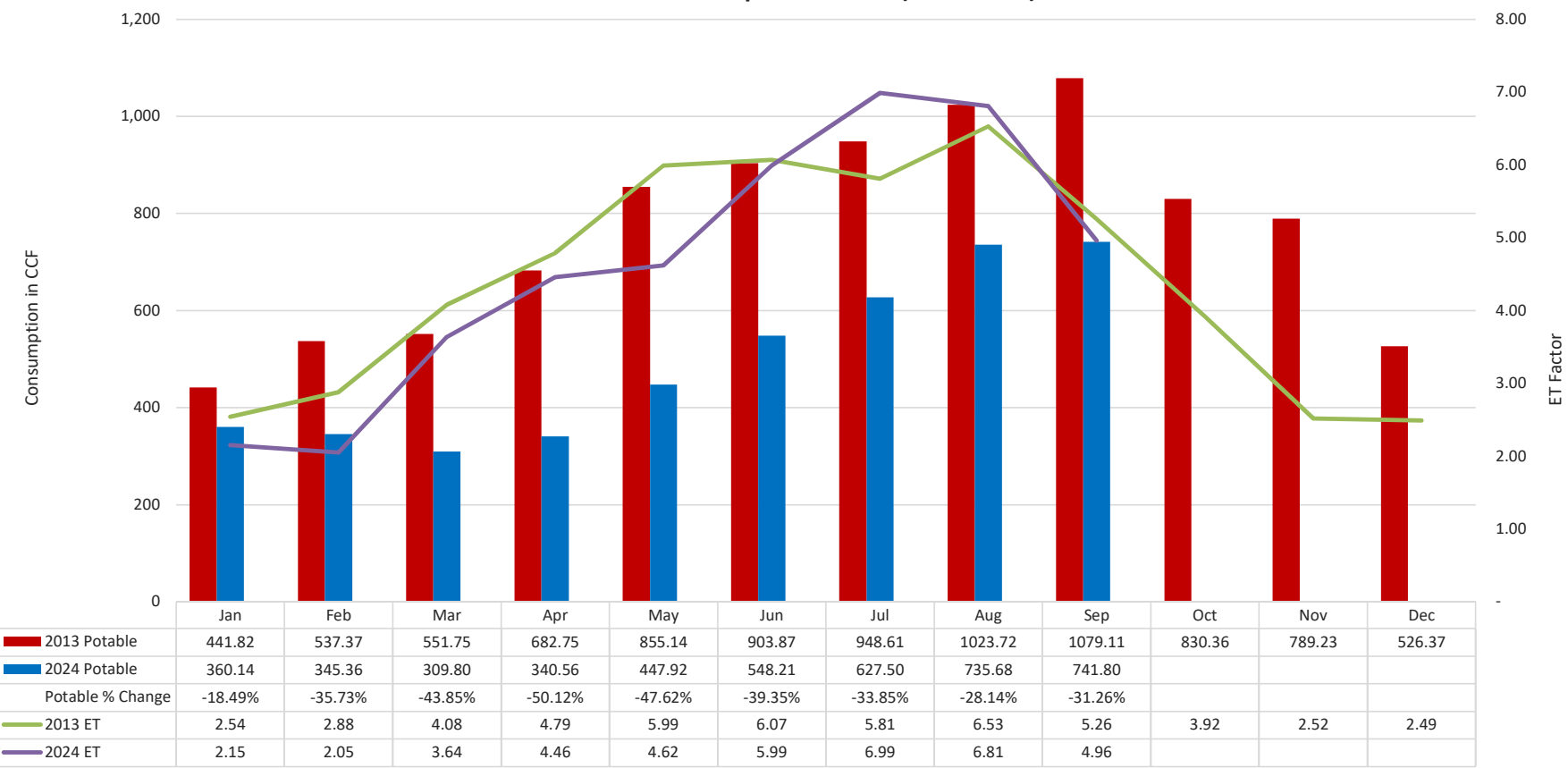
[illegible]

ETWD Customer Consumption vs 2020 (Potable AF)

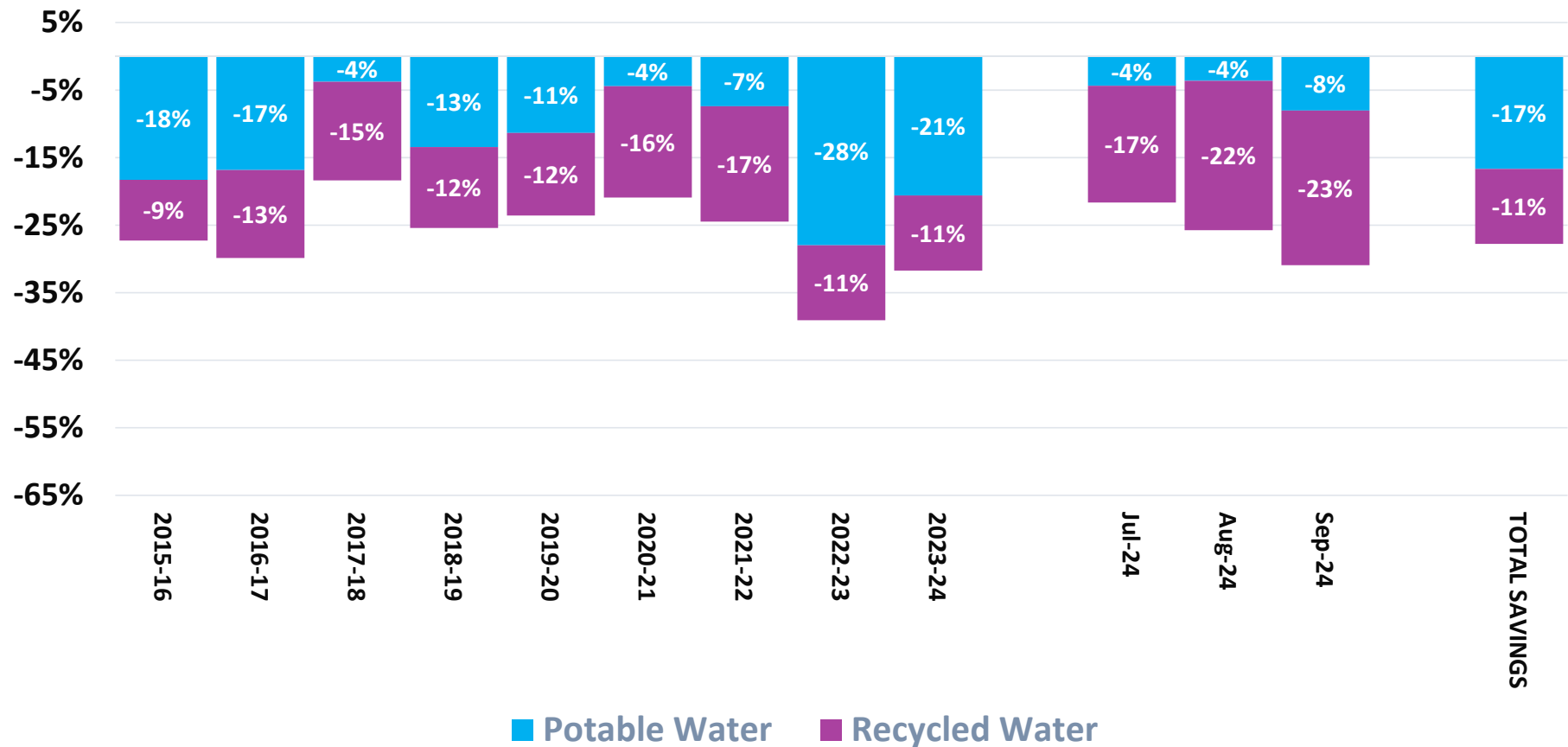


|                  |         |         |         |        |         |         |         |        |        |        |        |        |
|------------------|---------|---------|---------|--------|---------|---------|---------|--------|--------|--------|--------|--------|
| 2020 Potable     | 400.80  | 423.80  | 407.54  | 367.77 | 524.43  | 639.41  | 738.29  | 775.67 | 752.37 | 685.68 | 619.43 | 495.20 |
| 2024 Potable     | 360.14  | 345.36  | 309.80  | 340.56 | 447.92  | 548.21  | 627.50  | 735.68 | 741.80 |        |        |        |
| Potable % Change | -10.14% | -18.51% | -23.98% | -7.40% | -14.59% | -14.26% | -15.01% | -5.16% | -1.40% |        |        |        |
| 2020 ET          | 2.42    | 3.43    | 3.53    | 4.47   | 6.59    | 5.93    | 7.23    | 7.19   | 5.45   | 4.38   | 2.92   | 2.62   |
| 2024 ET          | 2.15    | 2.05    | 3.64    | 4.46   | 4.62    | 5.99    | 6.99    | 6.81   | 4.96   |        |        |        |

ETWD Customer Consumption vs 2013 (Potable AF)



# ETWD WATER USAGE COMPARED TO 2013



I hereby certify that the following Agenda was posted at least 72 hours prior to the time of the Board Meeting so noticed below at the usual agenda posting location of the South Orange County Wastewater Authority (SOCWA) and at [www.socwa.com](http://www.socwa.com).



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Danita Hirsh, Assistant Secretary  
SOCWA and the Board of Directors thereof

*Regular Meeting of The  
South Orange County Wastewater Authority  
Board of Directors*

October 3, 2024  
8:30 a.m.

PHYSICAL MEETING LOCATION:  
South Orange County Wastewater Authority  
34156 Del Obispo Street  
Dana Point, CA 92629

THE BOARD OF DIRECTORS MEETING ROOM IS WHEELCHAIR ACCESSIBLE. IF YOU REQUIRE ANY SPECIAL DISABILITY RELATED ACCOMMODATIONS, PLEASE CONTACT THE SOUTH ORANGE COUNTY WASTEWATER AUTHORITY SECRETARY'S OFFICE AT (949) 234-5452 AT LEAST SEVENTY-TWO (72) HOURS PRIOR TO THE SCHEDULED MEETING TO REQUEST SUCH ACCOMMODATIONS. THIS AGENDA CAN BE OBTAINED IN ALTERNATE FORMAT UPON REQUEST TO THE SOUTH ORANGE COUNTY WASTEWATER AUTHORITY'S SECRETARY AT LEAST SEVENTY-TWO (72) HOURS PRIOR TO THE SCHEDULED MEETING. MEMBERS OF THE PUBLIC HAVE THE OPTION TO PARTICIPATE IN AND MAY JOIN THE MEETING REMOTELY VIA VIDEO CONFERENCE FOR VISUAL INFORMATION ONLY (USE ZOOM LINK BELOW) AND BY TELECONFERENCE FOR AUDIO PARTICIPATION (USE PHONE NUMBERS BELOW). THIS IS A PHONE-CALL MEETING AND NOT A WEB-CAST MEETING, SO PLEASE REFER TO AGENDA MATERIALS AS POSTED ON THE WEBSITE AT [WWW.SOCWA.COM](http://WWW.SOCWA.COM). ON YOUR REQUEST, EVERY EFFORT WILL BE MADE TO ACCOMMODATE PARTICIPATION. FOR PARTIES PARTICIPATING REMOTELY, PUBLIC COMMENTS WILL BE TAKEN DURING THE MEETING FOR ORAL COMMUNICATION IN ADDITION TO PUBLIC COMMENTS RECEIVED BY PARTIES PARTICIPATING IN PERSON. COMMENTS MAY BE SUBMITTED PRIOR TO THE MEETING VIA EMAIL TO ASSISTANT SECRETARY DANITA HIRSH AT [DHIRSH@SOCWA.COM](mailto:DHIRSH@SOCWA.COM) WITH THE SUBJECT LINE "REQUEST TO PROVIDE PUBLIC COMMENT." IN THE EMAIL, PLEASE INCLUDE YOUR NAME, THE ITEM YOU WISH TO SPEAK ABOUT, AND THE TELEPHONE NUMBER YOU WILL BE CALLING FROM SO THAT THE COORDINATOR CAN UN-MUTE YOUR LINE WHEN YOU ARE CALLED UPON TO SPEAK. THOSE MAKING PUBLIC COMMENT REQUESTS REMOTELY VIA TELEPHONE IN REAL-TIME WILL BE ASKED TO PROVIDE YOUR NAME, THE ITEM YOU WISH TO SPEAK ABOUT, AND THE TELEPHONE NUMBER THAT YOU ARE CALLING FROM SO THE COORDINATOR CAN UNMUTE YOUR LINE WHEN YOU ARE CALLED UPON TO SPEAK. ONCE THE MEETING HAS COMMENCED, THE CHAIR WILL INVITE YOU TO SPEAK AND ASK THE COORDINATOR TO UNMUTE YOUR LINE AT THE APPROPRIATE TIME.

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IN PHONE NUMBERS BELOW AND FOR VIDEO USE THE ZOOM LINK BELOW.**

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Find your local number: <https://socwa.zoom.us/j/kdf1f6Ei14>

South Orange County Wastewater Authority  
Board of Directors Meeting  
October 3, 2024

Agenda

1. CALL TO ORDER

2. PLEDGE OF ALLEGIANCE

3. ORAL COMMUNICATIONS

*Members of the public may address the Board regarding an item on the agenda or may reserve this opportunity during the meeting at the time the item is discussed by the Board. There will be a three-minute limit for public comments.*

4. APPROVAL OF BOARD MEMBER REQUEST FOR REMOTE PARTICIPATION

ACTION Board Discussion/Direction and Action.

PAGE NO.

5. CONSENT CALENDAR

A. Minutes of Board of Directors.....1

1. Board of Directors Special Meeting of August 8, 2024
2. Board of Directors Meeting of September 5, 2024

ACTION The Board will be requested to approve the subject Minutes.

B. August 2024 Operations Report .....14

1. Monthly Operational Report
2. SOCWA Ocean Outfall Discharges by Agency
3. Beach Ocean Monitoring Report
4. Recycled Water Report
5. Pretreatment Report

ACTION The Board will be requested to receive and file subject reports as submitted.

C. Capital Improvement Program Status Report (September).....56

ACTION Information item.

D. Capital Improvement Construction Projects Progress and Change Order Report (August)  
[Project Committees 15 and 17].....60

ACTION Information item.

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South Orange County Wastewater Authority  
Board of Directors Meeting  
October 3, 2024

Agenda

PAGE NO.

6. ENGINEERING MATTERS

A. On-Call Project Management Services [Project Committee 2, 5, 15, 17, 21 and 24]..... 62

ACTION      The Engineering Committee recommends that the Board of Directors i) approve a two-year contract with Project Partners not to exceed \$200,000 in a fiscal year (total \$400,000) for the On-Call Project Management Services., and ii) approve a two-year contract with Z&K Consultants not to exceed \$200,000 per year (total \$400,000) for the On-Call Project Management Services.

B. Contract Award for SCADA Server Upgrades [Project Committees 2 and 15]..... 199

ACTION      The Engineering Committee recommends that the Board of Directors i) increase the FY2023-24 budgets for Projects 32243C and 35249L by \$20,000 to \$220,000 each (\$440,000 Total) ii) award a contract to W. M. Lyles, Co. for purchasing and installing replacement SCADA servers at JBL and CTP at the cost of \$405,900.00, and iii) authorize a contract contingency of \$20,296.00 (5% of the contract).

7. GENERAL MANAGER'S REPORT

A. Discussion on the MNWD Proposal .....

- Moulton Niguel Water District (MNWD) Proposal to Transition the Regional Treatment Plant (RTP) to (MNWD) & Facilitate MNWD's withdrawal from SOCWA [PC 2, 5, 8, 12, 17, 21, and 24]

ACTION      Board Discussion/Direction and Action.

B. Regional Treatment Plant (RTP) Intent to Transfer Letter .....208

ACTION      Board Discussion/Direction and Action

C. Artificial Intelligence (AI) Policy .....210

ACTION      Staff recommends that the Board of Directors approve Artificial Intelligence (AI) Policy.

D. General Counsel's Update.....

- JPA Revision Process (Standing item)

ACTION      Board Discussion/Direction and Action.

E. Acting General Manager's Report .....215

ACTION      Board Discussion/Direction and Action.

South Orange County Wastewater Authority  
Board of Directors Meeting  
October 3, 2024

Agenda

PAGE NO.

F. Upcoming Meetings Schedule: .....

- October 1, 2024 – PC 2 Committee Meeting – Closed Session
- October 3, 2024 – Board of Directors Regular Meeting
- October 10, 2024 – Engineering Committee Meeting
- October 15, 2024 – Finance Committee Meeting
- November 7, 2024 – Board of Directors Regular Meeting

ACTION      Information Item.

8. CLOSED SESSION

- A. Closed Session Conference Pursuant to Government Code § 54957
  - Public Employee Release
- B. Closed Session Conference with Labor Negotiators Pursuant to Government Code § 54957.6
  - SOCWA Designated Representatives: Brad Neufeld and Frank Ury
  - Unrepresented Employee: Director of Environmental Compliance
- C. Closed Session Conference Pursuant to Government Code § 54957
  - Public Employee Appointment  
Title: Acting General Manager
- D. Closed Session Conference Pursuant to Government Code § 54957(b)(1)
  - Public Employee Appointment  
Title: General Counsel
- E. Report Out of Closed Session

9. OTHER MATTERS

Determine the need to take action on the following item(s) introduced by the Acting General Manager/Director of Operations, which arose after the posted agenda. [Adoption of this action requires a two-thirds vote of the Board, or if less than two-thirds are present a unanimous vote.]

10. ADJOURNMENT

THE NEXT SOCWA BOARD MEETING  
November 7, 2024

**NOTICE OF REGULAR MEETING  
OF THE  
SOUTH ORANGE COUNTY WASTEWATER AUTHORITY  
ENGINEERING COMMITTEE**

**October 10, 2024  
8:30 a.m.**

NOTICE IS HEREBY GIVEN that a Regular Meeting of the South Orange County Wastewater Authority (SOCWA) Engineering Committee was called to be held on **October 10, 2024, at 8:30 a.m.** SOCWA staff will be present and conducting the meeting at the SOCWA Administrative Office located at 34156 Del Obispo Street, Dana Point, California.

THE SOCWA MEETING ROOM IS WHEELCHAIR ACCESSIBLE. IF YOU REQUIRE ANY SPECIAL DISABILITY RELATED ACCOMMODATIONS, PLEASE CONTACT THE SOUTH ORANGE COUNTY WASTEWATER AUTHORITY SECRETARY'S OFFICE AT (949) 234-5452 AT LEAST SEVENTY-TWO (72) HOURS PRIOR TO THE SCHEDULED MEETING TO REQUEST SUCH ACCOMMODATIONS. THIS AGENDA CAN BE OBTAINED IN ALTERNATE FORMAT UPON REQUEST TO THE SOUTH ORANGE COUNTY WASTEWATER AUTHORITY'S SECRETARY AT LEAST SEVENTY-TWO (72) HOURS PRIOR TO THE SCHEDULED MEETING. MEMBERS OF THE PUBLIC HAVE THE OPTION TO PARTICIPATE IN AND MAY JOIN THE MEETING REMOTELY VIA VIDEO CONFERENCE FOR VISUAL INFORMATION ONLY (USE ZOOM LINK BELOW) AND BY TELECONFERENCE FOR AUDIO PARTICIPATION (USE PHONE NUMBERS BELOW). THIS IS A PHONE-CALL MEETING AND NOT A WEB-CAST MEETING, SO PLEASE REFER TO AGENDA MATERIALS AS POSTED ON THE WEBSITE AT [WWW.SOCWA.COM](http://WWW.SOCWA.COM). ON YOUR REQUEST, EVERY EFFORT WILL BE MADE TO ACCOMMODATE PARTICIPATION. FOR PARTIES PARTICIPATING REMOTELY, PUBLIC COMMENTS WILL BE TAKEN DURING THE MEETING FOR ORAL COMMUNICATION IN ADDITION TO PUBLIC COMMENTS RECEIVED BY PARTIES PARTICIPATING IN PERSON. COMMENTS MAY BE SUBMITTED PRIOR TO THE MEETING VIA EMAIL TO ASSISTANT SECRETARY DANITA HIRSH AT [DHIRSH@SOCWA.COM](mailto:DHIRSH@SOCWA.COM) WITH THE SUBJECT LINE "REQUEST TO PROVIDE PUBLIC COMMENT." IN THE EMAIL, PLEASE INCLUDE YOUR NAME, THE ITEM YOU WISH TO SPEAK ABOUT, AND THE TELEPHONE NUMBER YOU WILL BE CALLING FROM SO THAT THE COORDINATOR CAN UN-MUTE YOUR LINE WHEN YOU ARE CALLED UPON TO SPEAK. THOSE MAKING PUBLIC COMMENT REQUESTS REMOTELY VIA TELEPHONE IN REAL-TIME WILL BE ASKED TO PROVIDE YOUR NAME, THE ITEM YOU WISH TO SPEAK ABOUT, AND THE TELEPHONE NUMBER THAT YOU ARE CALLING FROM SO THE COORDINATOR CAN UN-MUTE YOUR LINE WHEN YOU ARE CALLED UPON TO SPEAK. ONCE THE MEETING HAS COMMENCED, THE CHAIR WILL INVITE YOU TO SPEAK AND ASK THE COORDINATOR TO UN-MUTE YOUR LINE AT THE APPROPRIATE TIME.

AGENDA ATTACHMENTS AND OTHER WRITINGS THAT ARE DISCLOSABLE PUBLIC RECORDS DISTRIBUTED TO ALL, OR A MAJORITY OF, THE MEMBERS OF THE SOUTH ORANGE COUNTY WASTEWATER AUTHORITY ENGINEERING COMMITTEE IN CONNECTION WITH A MATTER SUBJECT FOR DISCUSSION OR CONSIDERATION AT AN OPEN MEETING OF THE ENGINEERING COMMITTEE ARE AVAILABLE FOR PUBLIC INSPECTION IN THE AUTHORITY ADMINISTRATIVE OFFICE LOCATED AT 34156 DEL OBISPO STREET, DANA POINT, CA ("AUTHORITY OFFICE") OR BY PHONE REQUEST MADE TO THE AUTHORITY OFFICE AT 949-234-5452. IF SUCH WRITINGS ARE DISTRIBUTED TO MEMBERS OF THE ENGINEERING COMMITTEE LESS THAN SEVENTY-TWO (72) HOURS PRIOR TO THE MEETING, THEY WILL BE AVAILABLE IN THE RECEPTION AREA OF THE AUTHORITY OFFICE AT THE SAME TIME AS THEY ARE DISTRIBUTED TO THE ENGINEERING COMMITTEE AND SENT TO ANY REMOTE PARTICIPANTS REQUESTING EMAIL DELIVERY OR POSTED ON SOCWA'S WEBSITE. IF SUCH WRITINGS ARE DISTRIBUTED IMMEDIATELY PRIOR TO, OR DURING, THE MEETING, THEY WILL BE AVAILABLE IN THE MEETING ROOM OR IMMEDIATELY UPON VERBAL REQUEST TO BE DELIVERED VIA EMAIL TO REQUESTING PARTIES PARTICIPATING REMOTELY.

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+1 346 248 7799 US (Houston)    +1 312 626 6799 US (Chicago)  
Find your local number: <https://socwa.zoom.us/j/kdS4PfRzY3>

## AGENDA

1. Call Meeting to Order

2. Public Comments

*THOSE WISHING TO ADDRESS THE ENGINEERING COMMITTEE ON ANY ITEM LISTED ON THE AGENDA WILL BE REQUESTED TO IDENTIFY AT THE OPENING OF THE MEETING AND PRIOR TO THE CLOSE OF THE MEETING. THE AUTHORITY REQUESTS THAT YOU STATE YOUR NAME WHEN MAKING THE REQUEST IN ORDER THAT YOUR NAME MAY BE CALLED TO SPEAK ON THE ITEM OF INTEREST. THE CHAIR OF THE MEETING WILL RECOGNIZE SPEAKERS FOR COMMENT AND GENERAL MEETING DECORUM SHOULD BE OBSERVED IN ORDER THAT SPEAKERS ARE NOT TALKING OVER EACH OTHER DURING THE CALL.*

PAGE NO.

3. Approval of Minutes..... 1

- Engineering Committee Minutes of August 15, 2024
- Engineering Committee Minutes of September 12, 2024

**Recommended Action:** Staff requests that the Engineering Committee approve the subject Minutes as submitted.

4. Operations Report..... 10

**Recommended Action:** Information Item.

5. Capital Improvement Construction Projects Progress and Change Order Report (October)  
[Project Committees 2, 15 and 17] ..... 11

**Recommended Action:** Information Item.

6. Coastal Treatment Plant (CTP) Aeration Blower System Upgrades (Under Separate Cover)  
[Project Committee 15].....

**Recommended Action:** Engineering Committee Discussion/Direction and Action.

7. Coastal Treatment Plant (CTP) Foul Air System Reconstruction [Project Committee 15] ..... 13

**Recommended Action:** Staff recommends that the Engineering Committee recommend that the PC 15 Board of Directors i) approve a contract with Dudek for a total of \$330,000 for the CTP Foul Air System Reconstruction Final Design and ii) approve a contract contingency of \$33,000 to address any unforeseen issue that may arise during final design.

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8. PC 2 Grant Funding Support (Under Separate Cover) [Project Committee 2] .....

**Recommended Action:** Engineering Committee Discussion/Direction and Action.

9. Adjournment

I hereby certify that the foregoing Notice was personally emailed or mailed to each member of the SOCWA Engineering Committee at least 72 hours prior to the scheduled time of the Special Meeting referred to above.

I hereby certify that the foregoing Notice was posted at least 72 hours prior to the time of the above-referenced Engineering Committee meeting at the usual agenda posting location of the South Orange County Wastewater Authority and at [www.socwa.com](http://www.socwa.com).

Dated this 3rd day of October 2024.



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Danita Hirsh, Assistant Secretary  
SOUTH ORANGE COUNTY WASTEWATER AUTHORITY

**NOTICE OF CANCELLATION**  
**OF THE**  
**SOUTH ORANGE COUNTY WASTEWATER AUTHORITY**  
**SPECIAL MEETING OF THE**  
**FINANCE COMMITTEE MEETING**  
**October 15, 2024**  
**10:30 a.m.**

NOTICE IS HEREBY GIVEN that the Special Meeting of the South Orange County Wastewater Authority Finance Committee scheduled to be held on October 15, 2024, at 10:30 a.m. at the SOCWA Administrative Office located at 34156 Del Obispo Street, Dana Point, California, has been canceled. The next Finance Committee meeting will be held on November 19, 2024.

I hereby certify that the foregoing Notice was personally e-mailed, faxed, or mailed to each member of the Finance Committee.

I hereby certify that the foregoing Notice was posted at the usual agenda posting location of the South Orange County Wastewater Authority (SOCWA) and at [www.socwa.com](http://www.socwa.com).

Dated this 11th day of October 2024.

  
\_\_\_\_\_  
Danita Hirsh, Assistant Secretary  
SOUTH ORANGE COUNTY WASTEWATER AUTHORITY

WORKSHOP MEETING OF THE  
BOARD OF DIRECTORS WITH MET DIRECTORS  
MUNICIPAL WATER DISTRICT OF ORANGE COUNTY  
18700 Ward Street, Conference Room 101, Fountain Valley, California  
October 2, 2024, 8:30 a.m.

Teleconference Sites:  
25652 Paseo De La Paz, San Juan Capistrano, CA 92675  
17420 Walnut Street, Fountain Valley, CA 92708

**This meeting will be held in person at 18700 Ward Street, Fountain Valley, California, 92708 (Conference Room 101). As a convenience for the public, the meeting may also be accessed by Zoom Webinar and will be available by either computer or telephone audio as indicated below. Because this is an in-person meeting and the Zoom component is not required, but rather is being offered as a convenience, if there are any technical issues during the meeting, this meeting will continue and will not be suspended.**

**Computer Audio: You can join the Zoom meeting by clicking on the following link:**  
<https://zoom.us/j/8828665300>

**Telephone Audio: (669) 900 9128 fees may apply  
(877) 853 5247 Toll-free  
Webinar ID: 882 866 5300#**

## AGENDA

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### PLEDGE OF ALLEGIANCE

### ROLL CALL

### PUBLIC PARTICIPATION/COMMENTS

At this time members of the public will be given an opportunity to address the Board concerning items within the subject matter jurisdiction of the Board. Members of the public may also address the Board about a particular Agenda item at the time it is considered by the Board and before action is taken.

The Board requests, but does not require, that members of the public who want to address the Board complete a voluntary "Request to be Heard" form available from the Board Secretary prior to the meeting.

### ITEMS RECEIVED TOO LATE TO BE AGENDIZED

Determine need and take action to agendize item(s), which arose subsequent to the posting of the Agenda. (ROLL CALL VOTE: Adoption of this recommendation requires a two-thirds vote of the Board members present or, if less than two-thirds of the Board members are present a unanimous vote.)

### ITEMS DISTRIBUTED TO THE BOARD LESS THAN 72 HOURS PRIOR TO MEETING

Pursuant to Government Code Section 54957.5, non-exempt public records that relate to open session agenda items and are distributed to a majority of the Board less than seventy-two (72) hours prior to the meeting will be available for public inspection in the lobby of the District's business office located at 18700 Ward Street, Fountain Valley, California 92708, during regular business hours. When practical, these public records will also be made available on the District's Internet Web site, accessible at <http://www.mwdoc.com>.

**NEXT RESOLUTION NO. 2150**

### PRESENTATION/DISCUSSION ITEMS

#### **1. UPDATE BY NATURAL RESOURCE RESULTS (NRR)**

*Recommendation: Discuss and file the information presented.*

**2. LEGISLATIVE ACTIVITIES**

- a. State Legislative Report (SDA)
- b. Legal and Regulatory Report (Ackerman)
- c. County Legislative Report (Whittingham)
- d. MWDOC Legislative Matrix
- e. Metropolitan Legislative Matrix

*Recommendation: Review and discuss the information presented.*

**3. QUESTIONS OR INPUT ON MET ISSUES FROM THE MEMBER AGENCIES/MET DIRECTOR REPORTS REGARDING MET COMMITTEE PARTICIPATION**

*Recommendation: Receive input and discuss the information presented.*

**INFORMATION ITEMS****4. MET ITEMS CRITICAL TO ORANGE COUNTY** (The following items are for informational purposes only – a write up on each item is included in the packet. Discussion is not necessary unless requested by a Director).

- a. MET's Finance and Rate Issue
- b. MET's Water Supply Condition Update
- c. MET's Water Quality Update
- d. Colorado River Issues
- e. Delta Conveyance Activities and State Water Project Issues

*Recommendation: Review and discuss the information presented.*

**5. METROPOLITAN (MET) BOARD AND COMMITTEE AGENDA DISCUSSION ITEMS**

- a. Summary regarding September MET Board Meeting
- b. Review items of significance for MET Board and Committee Agendas

*Recommendation: Review and discuss the information presented.*

**ADJOURNMENT**

Note: Accommodations for the Disabled. Any person may make a request for a disability-related modification or accommodation needed for that person to be able to participate in the public meeting by telephoning Maribeth Goldsby, District Secretary, at (714) 963-3058, or writing to Municipal Water District of Orange County at P.O. Box 20895, Fountain Valley, CA 92728. Requests must specify the nature of the disability and the type of accommodation requested. A telephone number or other contact information should be included so that District staff may discuss appropriate arrangements. Persons requesting a disability-related accommodations should make the request with adequate time before the meeting for the District to provide the requested accommodations.



MEETING OF THE BOARD OF DIRECTORS OF THE  
MUNICIPAL WATER DISTRICT OF ORANGE COUNTY  
Jointly with the  
**ADMINISTRATION & FINANCE COMMITTEE**  
18700 Ward Street, Conf. Room 101, Fountain Valley, CA 92708  
October 9, 2024, 8:30 a.m.

Teleconference Sites:  
25652 Paseo De La Paz, San Juan Capistrano, CA 92675  
17420 Walnut Street, Fountain Valley, CA 92708

**This meeting will be held in person at 18700 Ward Street, Fountain Valley, California, 92708 (Conference Room 101). As a convenience for the public, the meeting may also be accessed by Zoom Webinar and will be available by either computer or telephone audio as indicated below. Because this is an in-person meeting and the Zoom component is not required, but rather is being offered as a convenience, if there are any technical issues during the meeting, this meeting will continue and will not be suspended.**

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**A&F Committee:**  
Director Crane, Chair  
Director Thomas  
Director Nederhood

**Staff:** H. De La Torre, C. Harris,  
H. Chumpitazi, M. Baum-Haley,  
K. Davanaugh, M. Goldsby

**Ex Officio Member:** President McVicker

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MWDOC Committee meetings are noticed and held as joint meetings of the Committee and the entire Board of Directors and all members of the Board of Directors may attend and participate in the discussion. Each Committee has designated Committee members, and other members of the Board are designated alternate committee members. If less than a quorum of the full Board is in attendance, the Board meeting will be adjourned for lack of a quorum and the meeting will proceed as a meeting of the Committee with those Committee members and alternate members in attendance acting as the Committee.

## **ROLL CALL**

**PUBLIC COMMENTS** - Public comments on agenda items and items under the jurisdiction of the Committee should be made at this time.

**ITEMS RECEIVED TOO LATE TO BE AGENDIZED** - Determine there is a need to take immediate action on item(s) and that the need for action came to the attention of the District subsequent to the posting of the Agenda. (Requires a unanimous vote of the Committee).

**ITEMS DISTRIBUTED TO THE BOARD LESS THAN 72 HOURS PRIOR TO MEETING** -- Pursuant to Government Code section 54957.5, non-exempt public records that relate to open session agenda items and are distributed to a majority of the Board less than seventy-two (72) hours prior to the meeting will be available for public inspection in the lobby of the District's business office located at 18700 Ward Street, Fountain Valley, California 92708, during regular business hours. When practical, these public records will also be made available on the District's Internet Web site, accessible at <http://www.mwdoc.com>.

**PRESENTATION**

1. PRESENTATION BY PARS REGARDING OTHER POST-EMPLOYMENT BENEFITS TRUST & PENSION RATE STABILIZATION PROGRAM (PRSP) TRUST CLIENT REVIEW
2. WATER ENERGY EDUCATION ALLIANCE (WEEA) YEAR IN REVIEW

**PROPOSED BOARD CONSENT CALENDAR ITEMS**

3. TREASURER'S REPORT
  - a. Revenue/Cash Receipt Report – September 2024
  - b. Disbursement Approval Report for the month of October 2024
  - c. Disbursement Ratification Report for the month of September 2024
  - d. GM Approved Disbursement Report for the month of September 2024
  - e. Consolidated Summary of Cash and Investment – August 2024
  - f. OPEB and Pension Trust Fund statement
4. FINANCIAL REPORT
  - a. Combined Financial Statements and Budget Comparative for the Period Ending August 31, 2024

**ACTION ITEMS**

5. 2025 HEALTH SAVINGS ACCOUNT CONTRIBUTIONS
6. AUTHORIZE FY 2024-25 CHOICE PROGRAM BUDGET REVISIONS

**INFORMATION ITEMS – (THE FOLLOWING ITEMS ARE FOR INFORMATIONAL PURPOSES ONLY – BACKGROUND INFORMATION IS INCLUDED IN THE PACKET. DISCUSSION IS NOT NECESSARY UNLESS REQUESTED BY A DIRECTOR.)**

7. 2025 BENEFIT RATES (Health and Vision Insurance Rates)
8. JOINT SUPERVISOR TRAINING WORKSHOPS HOSTED BY MWDOC AND YLWD
9. INDIVIDUAL CHARGES DISCLOSURE REPORT
10. CALPERS ANNUAL VALUATION REPORT AS OF JUNE 30, 2023
11. OPEB ACTUARIAL REPORT AS OF JUNE 30, 2024
12. DEPARTMENT ACTIVITIES REPORTS
  - a. Administration
  - b. Finance and Information Technology
13. MONTHLY WATER USAGE DATA AND WATER SUPPLY INFORMATION

**OTHER ITEMS**

14. REVIEW ISSUES REGARDING DISTRICT ORGANIZATION, PERSONNEL MATTERS, EMPLOYEE BENEFITS FINANCE AND INSURANCE

**ADJOURNMENT**

**NOTE:** At the discretion of the Committee, all items appearing on this agenda, whether or not expressly listed for action, may be deliberated, and may be subject to action by the Committee. On those items designated for Board action, the Committee reviews the items and makes a recommendation for final action to the full Board of Directors; final action will be taken by the Board of Directors. Agendas for Committee and Board meetings may be obtained from the District Secretary. Members of the public are advised that the Board consideration process includes consideration of each agenda item by one or more Committees indicated on the Board Action Sheet. Attendance at Committee meetings and the Board meeting considering an item consequently is advised.

Accommodations for the Disabled. Any person may make a request for a disability-related modification or accommodation needed for that person to be able to participate in the public meeting by telephoning Maribeth Goldsby, District Secretary, at (714) 963-3058, or writing to Municipal Water District of Orange County at P.O. Box 20895, Fountain Valley, CA 92728. Requests must specify the nature of the disability and the type of accommodation requested. A telephone number or other contact information should be included so that District staff may discuss appropriate arrangements. Persons requesting a disability-related accommodation should make the request with adequate time before the meeting for the District to provide the requested accommodation.

MEETING OF THE BOARD OF DIRECTORS OF THE  
MUNICIPAL WATER DISTRICT OF ORANGE COUNTY  
Jointly with the  
**PLANNING & OPERATIONS COMMITTEE**  
18700 Ward Street, Conf. Room 101, Fountain Valley, CA 92708  
October 14, 2024, 8:30 a.m.

Teleconference Sites:  
25652 Paseo De La Paz, San Juan Capistrano, CA 92675  
17420 Walnut Street, Fountain Valley, CA 92708

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**P&O Committee:**  
Director Seckel, Chair  
Director Yoo Schneider  
Director Dick

**Staff:** H. De La Torre, C. Harris,  
H. Chumpitazi, M. Baum-Haley,  
T. Dubuque, M. Goldsby

**Ex Officio Member:** President McVicker

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## **ROLL CALL**

**PUBLIC COMMENTS** - Public comments on agenda items and items under the jurisdiction of the Committee should be made at this time.

**ITEMS RECEIVED TOO LATE TO BE AGENDIZED** - Determine there is a need to take immediate action on item(s) and that the need for action came to the attention of the District subsequent to the posting of the Agenda. (Requires a unanimous vote of the Committee).

**ITEMS DISTRIBUTED TO THE BOARD LESS THAN 72 HOURS PRIOR TO MEETING** -- Pursuant to Government Code section 54957.5, non-exempt public records that relate to open session agenda items and are distributed to a majority of the Board less than seventy-two (72) hours prior to the meeting will be available for public inspection in the lobby of the District's business office located at 18700 Ward Street, Fountain Valley, California 92708, during regular business hours. When practical, these public records will also be made available on the District's Internet Web site, accessible at <http://www.mwdoc.com>.

**ACTION ITEMS**

1. MWDOC LEGISLATIVE POLICY PRINCIPLES
2. AUTHORIZE WEROC TO ESTABLISH A COUNTYWIDE MASTER CONTRACT FOR WATER BOTTLE DISTRIBUTION DURING A CATASTROPHIC EVENT

**DISCUSSION ITEMS**

3. CALIFORNIA COUNCIL ON ENVIRONMENTAL AND ECONOMIC BALANCE (CCEEB) PRIORITIES

**INFORMATION ITEMS** (The following items are for informational purposes only – background information is included in the packet. Discussion is not necessary unless requested by a Director.)

4. QUARTERLY MWDOC K-12 CHOICE SCHOOL PROGRAMS UPDATE
5. SPEAKERS BUREAU QUARTERLY REPORT
6. OC WATER SUMMIT RECAP
7. PUBLIC AFFAIRS HIGHLIGHTS
8. DEPARTMENT ACTIVITIES REPORTS
  - a. Ongoing MWDOC Reliability and Engineering/Planning Projects
  - b. WEROC
  - c. Water Use Efficiency Projects
  - d. Public and Government Affairs
9. REVIEW OF ISSUES RELATED TO PLANNING OR ENGINEERING PROJECTS, WEROC, WATER USE EFFICIENCY, FACILITY AND EQUIPMENT MAINTENANCE, WATER STORAGE, WATER QUALITY, CONJUNCTIVE USE PROGRAMS, EDUCATION, PUBLIC AFFAIRS PROGRAMS AND EVENTS, PUBLIC INFORMATION PROJECTS, PUBLIC INFORMATION CONSULTANTS, DISTRICT FACILITIES, and MEMBER AGENCY RELATIONS

**ADJOURNMENT**

**NOTE:** At the discretion of the Committee, all items appearing on this agenda, whether or not expressly listed for action, may be deliberated, and may be subject to action by the Committee. On those items designated for Board action, the Committee reviews the items and makes a recommendation for final action to the full Board of Directors; final action will be taken by the Board of Directors. Agendas for Committee and Board meetings may be obtained from the District Secretary. Members of the public are advised that the Board consideration process includes consideration of each agenda item by one or more Committees indicated on the Board Action Sheet. Attendance at Committee meetings and the Board meeting considering an item consequently is advised.

Accommodations for the Disabled. Any person may make a request for a disability-related modification or accommodation needed for that person to be able to participate in the public meeting by telephoning Maribeth Goldsby, District Secretary, at (714) 963-3058, or writing to Municipal Water District of Orange County at P.O. Box 20895, Fountain Valley, CA 92728. Requests must specify the nature of the disability

and the type of accommodation requested. A telephone number or other contact information should be included so that District staff may discuss appropriate arrangements. Persons requesting a disability-related accommodation should make the request with adequate time before the meeting for the District to provide the requested accommodation.

REGULAR MEETING  
OF THE BOARD OF DIRECTORS  
MUNICIPAL WATER DISTRICT OF ORANGE COUNTY  
18700 Ward Street, Board Room, Fountain Valley, California  
October 16, 2024, 8:30 a.m.

Teleconference Sites:  
25652 Paseo De La Paz, San Juan Capistrano, CA 92675  
17420 Walnut Street, Fountain Valley, CA 92708

**This meeting will be held in person. As a convenience for the public, the meeting may also be accessed by Zoom Webinar and will be available by either computer or telephone audio as indicated below. Because this is an in-person meeting and the Zoom component is not required, but rather is being offered as a convenience, if there are any technical issues during the meeting, this meeting will continue and will not be suspended.**

**Computer Audio: You can join the Zoom meeting by clicking on the following link:**

<https://zoom.us/j/8828665300>

|                         |                                      |
|-------------------------|--------------------------------------|
| <b>Telephone Audio:</b> | <b>(669) 900 9128 fees may apply</b> |
|                         | <b>(877) 853 5247 Toll-free</b>      |
| <b>Webinar ID:</b>      | <b>882 866 5300#</b>                 |

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## AGENDA

### MOMENT OF SILENCE

### PLEDGE OF ALLEGIANCE

### ROLL CALL

### PUBLIC COMMENTS/PARTICIPATION

At this time, members of the public will be given an opportunity to address the Board concerning items within the subject matter jurisdiction of the Board. Members of the public may also address the Board about a particular Agenda item at the time it is considered by the Board and before action is taken. If the item is on the Consent Calendar, please inform the Board Secretary before action is taken on the Consent Calendar and the item will be removed for separate consideration.

The Board requests, but does not require, that members of the public who want to address the Board complete a voluntary "Request to be Heard" form available from the Board Secretary prior to the meeting.

### ITEMS RECEIVED TOO LATE TO BE AGENDIZED

Determine need and take action to agendize items(s) which arose subsequent to the posting of the Agenda. (ROLL CALL VOTE: Adoption of this recommendation requires a two-thirds vote of the Board members present, or, if less than two-thirds of the Board members are present, a unanimous vote of those members present.)

### ITEMS DISTRIBUTED TO THE BOARD LESS THAN 72 HOURS PRIOR TO MEETING

Pursuant to Government Code section 54957.5, non-exempt public records that relate to open session agenda items and are distributed to a majority of the Board less than seventy-two (72) hours prior to the meeting will be available for public inspection in the lobby of the District's business office located at 18700 Ward Street, Fountain Valley, California 92708, during regular business hours. When practical, these public records will also be made available on the District's Internet Web site, accessible at <http://www.mwdoc.com>.

**NEXT RESOLUTION NO. 2150**

**CONSENT CALENDAR (Items 1 to 6)**

(All matters under the Consent Calendar will be approved by one motion unless a Board member requests separate action on a specific item)

**1. MINUTES**

- a. September 4, 2024 Workshop Board Meeting
- b. September 18, 2024 Regular Board Meeting
- c. September 18 2024 MWDOC WFC Board Meeting

*Recommendation: Approve as presented.*

**2. COMMITTEE MEETING REPORTS**

- a. Planning & Operations Committee: September 3, 2024
- b. Administration & Finance Committee: September 11, 2024
- c. Executive Committee Meeting: September 19, 2024

*Recommendation: Receive and file as presented.*

**3. TREASURER'S REPORTS**

- a. MWDOC Revenue/Cash Receipt Register as of September 30, 2024
- b. Disbursement Registers (September/October)

*Recommendation: Ratify and approve as presented.*

- c. Summary of Cash and Investment and Portfolio Master Summary Report (Cash and Investment report) as of August 31, 2024
- d. PARS Monthly Statement (OPEB Trust)

*Recommendation: Receive and file as presented.*

**4. FINANCIAL REPORT**

- a. Combined Financial Statements and Budget Comparative for the Period Ending August 31, 2024

*Recommendation: Receive and file as presented.*

**5. 2025 HEALTH SAVINGS ACCOUNT CONTRIBUTIONS**

*Recommendation: Approve an increase to the District's annual Health Savings Account (HSA) contribution amounts, made by the District, to the Kaiser and Anthem Consumer Driven Health Plans (CDHP) for the 2025 plan year, as follows: (1) Kaiser: employee/\$1650, 2-party/\$3300, and family/\$3300; and (2) Anthem: employee/\$1450, 2-party/\$2900, and family/\$2700.*



**6. AUTHORIZE FY 2024-25 CHOICE PROGRAM BUDGET REVISIONS**

*Recommendation: Approve the Choice Program budget revisions.*

**End Consent Calendar**

**ACTION ITEMS**

**7-1 MWDOC LEGISLATIVE POLICY PRINCIPLES**

*Recommendation: Adopt the proposed MWDOC legislative policy principles for 2025.*

**7-2 AUTHORIZE WEROC TO ESTABLISH A COUNTYWIDE MASTER CONTRACT FOR WATER BOTTLE DISTRIBUTION DURING A CATASTROPHIC EVENT**

*Recommendation: Authorize WEROC's Director of Emergency Management to work with the MWDOC General Manager to establish a countywide master contract with Niagara for water bottle distribution.*

**INFORMATION CALENDAR** (All matters under the Information Calendar will be Received/Filed as presented following any discussion that may occur)

**8. GENERAL MANAGER'S REPORT, OCTOBER (ORAL AND WRITTEN)**

*Recommendation: Receive and file report(s) as presented.*

**9. MWDOC GENERAL INFORMATION ITEMS**

- a. Board of Directors - Reports re: Conferences and Meetings
- b. Requests for Future Agenda Topics

*Recommendation: Receive and file as presented.*

**ADJOURNMENT**

Note: Accommodations for the Disabled. Any person may make a request for a disability-related modification or accommodation needed for that person to be able to participate in the public meeting by contacting Maribeth Goldsby, District Secretary, at (714) 963-3058, or writing to Municipal Water District of Orange County at P.O. Box 20895, Fountain Valley, CA 92728. Requests must specify the nature of the disability and the type of accommodation requested. A telephone number or other contact information should be included so that District staff may discuss appropriate arrangements. Persons requesting a disability-related accommodation should make the request with adequate time before the meeting for the District to provide the requested accommodation.



## **GENERAL MANAGER REPORT OF STAFF ACTIVITIES**

**October 2024**

MWDOC held its Member Agency Managers' meeting at its office in Fountain Valley on Thursday, August 22, 2024.

**In attendance:** Rudy Correa – Brea, Mike McGee – Buena Park, Mark Sprague – Fountain Valley, Toby Moore – Golden State Water Company, Chau Vu & Kristen Schroeder – Huntington Beach, Paul Weghorst– Irvine Ranch Water District, Keith Van Der Maaten – Laguna Beach County Water District, Paul Shoenberger – Mesa Water District, Johnathan Cruz, Drew Atwater & Matt Collings – Moulton Niguel Water District, Mark Vukojevic – Newport Beach, Jose Diaz – Orange, John Kennedy – Orange County Water District, Dustin Burnside & David Rebensdorf – San Clemente, Robert Grantham - Santa Margarita Water District, Iris Lee – Seal Beach, Rick Shintaku – South Coast Water District, Fernando Paludi & Michael Perea – Trabuco Canyon Water District, Mike Chandler – Tustin, Scott Miller - Westminster

**Staff in attendance:** Harvey De La Torre, Charles Busslinger, Heather Baez, Damon Micalizzi, Vicki Osborn, Sarina Sriboonlue, Alex Heide,

**General Meeting Information/Discussion Items:**

- Draft Board Agendas
- MWDOC Policy Principles
- MET Business Model Process
- Engineering Update
- WEROC Update (*Tentative Pending Availability*)

**Announcements:**

- Water Quality Workshop - October 1<sup>st</sup> at Yorba Linda Water District
- 3-2. Orange County Water Summit - Friday, September 27<sup>th</sup>

**Report Items**

- Monthly GM Report
- Legislative Reports
- WEROC Matrix
- Grant Funding Opportunities
- Additional Reports or Materials

Next managers meeting October 17, 2024

## ENGINEERING & PLANNING

### LEAD AND COPPER RULE REVISIONS – LEAD SERVICE LINE INVENTORY CHOICE PROGRAM

In mid-March 2023, multiple agencies requested MWDOC's assistance in complying with the U.S. Environmental Protection Agency (USEPA) Lead and Copper Rule Revisions (LCRR) - Service Line Inventories, which all water systems are required to complete and submit to the primacy agency (for California it is the State Water Resources Control Board - SWRCB) by October 16, 2024.

On September 20, 2023, the MWDOC Board approved a contract award to Hazen and Sawyer (Hazen) to provide technical assistance for a Service Line Inventory shared services program. The shared services program has 13 participating agencies, each with a customized scope of work.

On November 30, 2023, the USEPA announced draft rule changes to the LCRR, which are known as the Lead and Copper Rule Improvements (LCRI). The LCRI proposes significant changes to the LCRR in terms of both changed requirements and timelines.

In April 2024, USEPA formally declared its intent to take final action on the LCRI by October 2024. This declaration clarifies the documentation agencies must submit by October 16, 2024, but leaves additional ambiguity until the final proposed rules are published.

#### **The project remains on schedule.**

As of early October 2024, all 13 participating agencies completed final field verification work to identify service line material. No lead service lines were found, and all 13 participating agencies confirmed non-lead materials. Following this confirmation, agencies will submit a non-lead designation statement and their initial service line inventory to the Division of Drinking Water (DDW) by October 16, 2024.

Post-October 16, 2024, Hazen will transition to each agency the GIS database and backup information related to the service line identification methodology to prepare agencies for future maintenance and updates of their initial inventory. It is anticipated that the LCRI will require an annual update of the initial inventory. The USEPA is anticipated to publish the LCRI in mid-October 2024.

## SHUTDOWNS

### **Allen McColloch Pipeline (AMP) Prestressed Concrete Cylinder Pipe (PCCP) Inspection and Rehabilitation**

In response to the November 2023 AMP PCCP inspection findings, MET initiated Special Operating Conditions (SOC) for the AMP to reduce pressure on the pipeline.

In April 2024, MET shut down the lower reaches of the AMP down gradient of OC-70 and installed steel liners to segments of PCCP between OC-70 and OC-88. A bulkhead was also installed down the gradient of OC-88, and the upper reaches of the AMP returned to normal operations.

The reaches below OC-88 (down gradient of the bulkhead) remain dry to allow for permanent repairs to the most critical PCCP segments in the lower reaches of the AMP.

MET's Board awarded a construction contract for the downstream reach work to JF Shea Construction on May 14, 2024, and the contractor mobilized to the first site on June 17, 2024. Construction began in early July 2024 and will continue through the end of January 2025.

#### **The shutdown remains on schedule.**

Affected retail agencies have coordinated extensively with neighboring agencies, MET, and MWDOC to accommodate the extended AMP shutdown through January 2025. The planned use of the AMP through OC-88 into the South County Pipeline, the Baker Water Treatment Plant, EOCF#2, ATM, OC Feeder, El Toro Reservoir, Upper Chiquita Reservoir, as well as local resources are all being used extensively to support this shutdown.

## WATER QUALITY & OPERATIONAL PLANNING WORKSHOPS

Significant changes to Orange County's imported water demands are expected over the next few years as a number of local supply projects are completed and water use efficiency efforts continue to reduce water demands.

The reduction of imported water demands, anticipated to be particularly significant during the winter months, has the potential to increase water aging in the imported water distribution system. The additional water aging potentially could lead to water quality issues (e.g. disinfection by-product formation, disinfectant decay, nitrification).

MWDOC Engineering is working with MET staff and the retail agencies on a series of workshops to begin discussions on coordinating efforts to change how the imported water system is operated in Orange County. The first two workshops occurred on August 29 and October 1, 2024. The 4.5-hour workshops provided a review of the state of the science of understanding nitrification in water distribution systems, initiated

discussions on future water quality and operations considerations, and provided a foundation for a shared understanding of operations and control measures. The workshops highlighted Metropolitan's conveyance system operations, focusing on Diemer area operations and the operations, capabilities, and constraints of key Orange County pipelines and local distribution systems.

MWDOC Engineering will provide further details by presenting at the P&O Committee meeting on November 12, 2024.

## EMERGENCY PREPAREDNESS

*(Events listed only Include WEROC involvement. Events and incidents happen every day but may not require reporting or coordination with WEROC)*

- Airport Fire 9/9/24, (3 Agencies)
- Suspicious Activity (2 Agency)

## WEROC AGENCY PLANNING, COORDINATION AND PROGRAM EFFORTS

### **AWIA & Multi-Jurisdictional Hazard Mitigation Multi-Plan Project**

In September, all agencies participating in the Multi-Jurisdictional Hazard Mitigation Plan ensured their public education campaign using websites and social media. As the consultant, Herndon Solutions Group (HSG) audited all agencies to ensure they met federal requirements. Vicki presented to 2 agencies' Boards and provided PowerPoint presentations to three others during September.

The target date is still the beginning of November to have the draft plan received from the consultant, provided to all the agencies, and available for public comments during this time.

The AWIA Project also kicked off in September with Tier 1 agencies. Six workshops were conducted in September to capture changes to assets and assessment of risk profiles.

All the Contract agreements were sent to the WEROC Member agencies. Many will take these for execution as their jurisdiction requires them in September or August, depending on when their Board or Council meets. Vicki also met with MWDOC Financial to go over the payment plan and schedule for invoicing, which has been shared with the participating agencies.

On 9/23, Gabby submitted an eCurrent article to Public Affairs for publishing on the Multi-Jurisdictional Hazard Mitigation Plan (MJHMP).

### **Cyber Security and OCIAC Partnership**

WEROC continues to send out important information to the Cyber Security Distribution Group as received from DHS or the OCIAC. WEROC has been providing information to the member agencies as required about highlighted threats to the water industry and other current world events as required.

The CalOES Cyber Task Force sent out a survey to its task force members so that they could develop guidelines and look at providing funding received at the federal level.

## **DIESEL ENGINE CARB EMISSIONS ADVOCACY PROJECT**

Vicki is working with Heather from Government Affairs on the CARB/AQMD issues. There was a workshop on the proposed policies.

Vicki will continue to work with CalOES on this issue as well.

## **MWDOC Planning**

Gabby has been working with MWDOC Admin staff on revisions to the all-hazard evacuation plan since the fire drill was conducted last month.

## **Operational Area Executive Board and Plans**

Vicki is currently reviewing or aiding the development/revisions of the following plans as the Operational Area Mutual Aid Coordinator for Water and Wastewater as the water and wastewater agency advocate.

Regional Mutual Aid/Assistance Plans  
Airport Fire Debris Flow Plan

## **Presentations**

On 8/29, Vicki was part of an Emergency Management Panel at the American Planners Association (APA) California Chapter. This panel highlighted how we can plan better with Planning Department personnel and some of the challenges we are facing now and in the future.

## **Regional Water Distribution Plan**

The Water Distribution TTX has been scheduled for November 12<sup>th</sup> at the County EOC. Additional TTX will be scheduled around the county to maximize participation if required. Janine created and sent out the flyer and will be handling registration. Vicki will be developing the exercise and facilitating it on the day of.

## **Training and Exercises**

Gabby will be attending the International Association of Emergency Managers Conference in Colorado. (November). This was a budgeted item for Osborn to attend but sending staff for training opportunities to continue their education and professional development.

On September 25 & 26, Gabby and Janine attended a training hosted by the City of Irvine—Disaster Management for Public Services (MGT 137).



## **Exercises:**

9/25 Vicki assisted OCWD with their annual evacuation drill and provided input to their current plans so they could enhance their capabilities and skills for next time.

10/30 ETWD TTX - Vicki is developing a TTX for ETWD. Scenario will be based on their Dam Plans.

11/12 has been set for the Water Distribution TTX at the County EOC. Vicki is developing and will be facilitating.

## **WEROC Mobile EOC/Command Vehicle**

Gabby is working on phase 2 of the WEROC Mobile Emergency Operations Center, which includes outfitting the internal equipment described in the spreadsheet provided to the Board in September 2023.

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## **OTHER PROJECTS**

Janine scheduled a virtual AlertOC Training for WEROC's member agencies on Wednesday, September 18, 2024. Due to the Airport Fire, the training had to be canceled at the last minute.

Janine is working with Dave Anderson on WEROC's file conversion to SharePoint.

Janine continues working with the Center for Demographic Research (CDR) on the WEROC Water/Wastewater Atlas. She has now been introducing Gabby to the project and bringing her on board to assist in the final phases of the project.

Janine has begun updating the home addresses of MWDOC staff for location purposes in the event of a disaster or event to increase safety awareness for our staff.

Gabby is working with FVFD to verify if the Emergency Action Plan aligns with the Exit and Occupancy analysis. 9/25 evacuation baseline drill completed. Gabby will continue to work with Admin Staff for future training and introduction of the Emergency Action Plan in compliance with CalOSHA 3220 to enhance personnel knowledge of responsibility, resources, and safety during emergencies at the MWDOC facility.

On 9/27, Gabby worked with IT, Finance, Government Affairs, and WEROC staff on the grant submission towards funding opportunity with the State & Local Cybersecurity Grant Program (SLCGP) on cybersecurity funding for future planning and assessments.

Vicki, Janine, and Gabby attend upcoming workshops for MJHMP, Risk Resiliency Assessments, and Emergency Response Plans with WEROC's participating agencies.

Gabby will attend Foundations in Excellence leadership training starting 10/2 every Wednesday in October.

## MET ITEMS CRITICAL TO ORANGE COUNTY

### MET FINANCE AND RATE ISSUES

#### Metropolitan Finance

There was no Metropolitan Finance and Insurance Committee meeting in September; therefore, no update is available.

#### Metropolitan Business Model Update

On July 22, 2024, Board leadership [provided direction](#) to Metropolitan's Member Agency General Managers to form an ad hoc working group to review and refine Metropolitan's Business Model. Direction was provided to the working group to develop a series of proposals on Business Model refinements that the Task Force could consider.

On August 19, 2024, the ad hoc working group developed a framework for collaboration, which was formalized through [a letter](#) sent to Board leadership and signed by all 26 member agency general managers. The framework included two retreats of the ad hoc working group, which would culminate in proposed refinements to the business model that the Task Force could then consider.

The first workshop of the ad hoc working group has been scheduled for early October. Metropolitan has hired a professional facilitator, Ken Kirby, to assist with the process.

Future updates on the Business Model will be brought forward to the MWDOC Directors and MWDOC Member Agencies as appropriate.

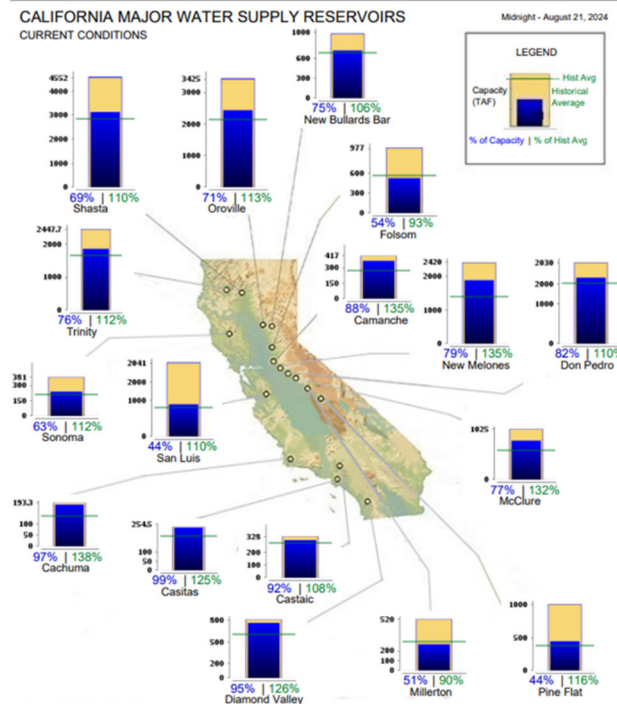
### MET'S SUPPLY CONDITION UPDATE

The 2023-24 Water Year (2023-24 WY) officially started on October 1, 2023. Thus far, Northern California's accumulated precipitation (8-Station Index) has been reported at **48.0. inches or 97% of normal** as of August 28th. The Northern Sierra Snow Water Equivalent peaked at **35.1 inches on April 2<sup>nd</sup>**, which is **124% of normal** for that day. The Department of Water Resources (DWR) has set the State Water Project (SWP) **"Table A" allocation for WY 2023-24 at 40%.**

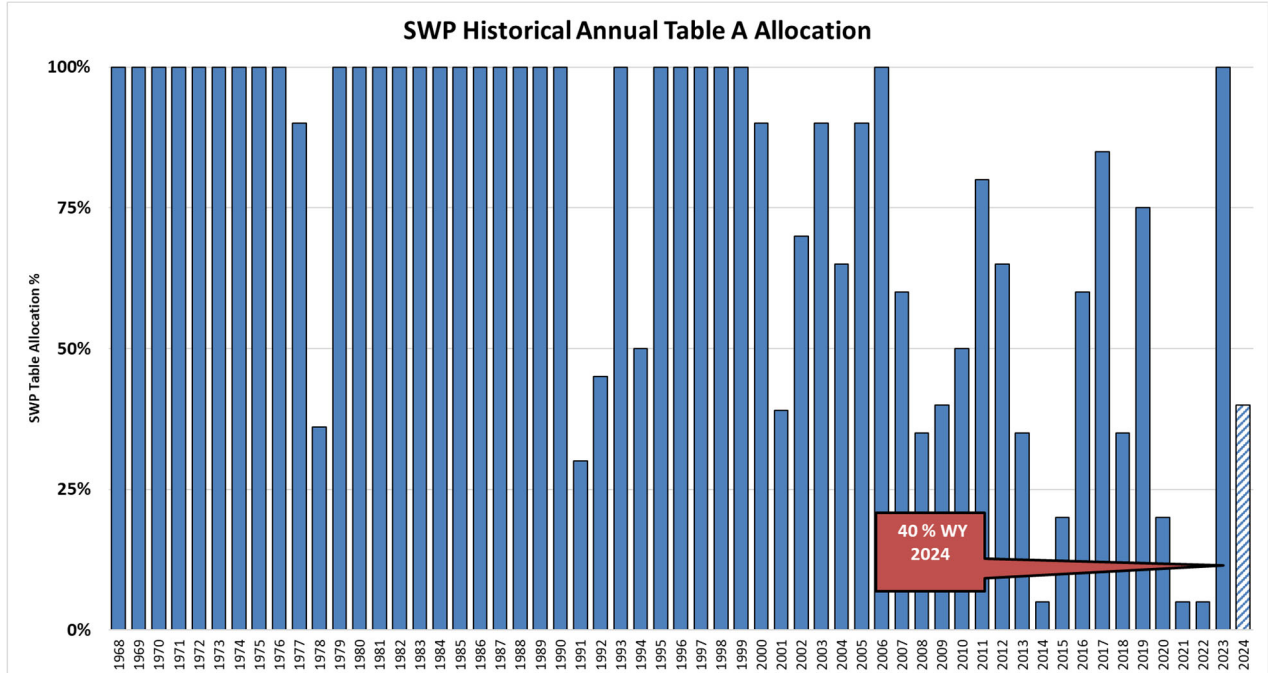
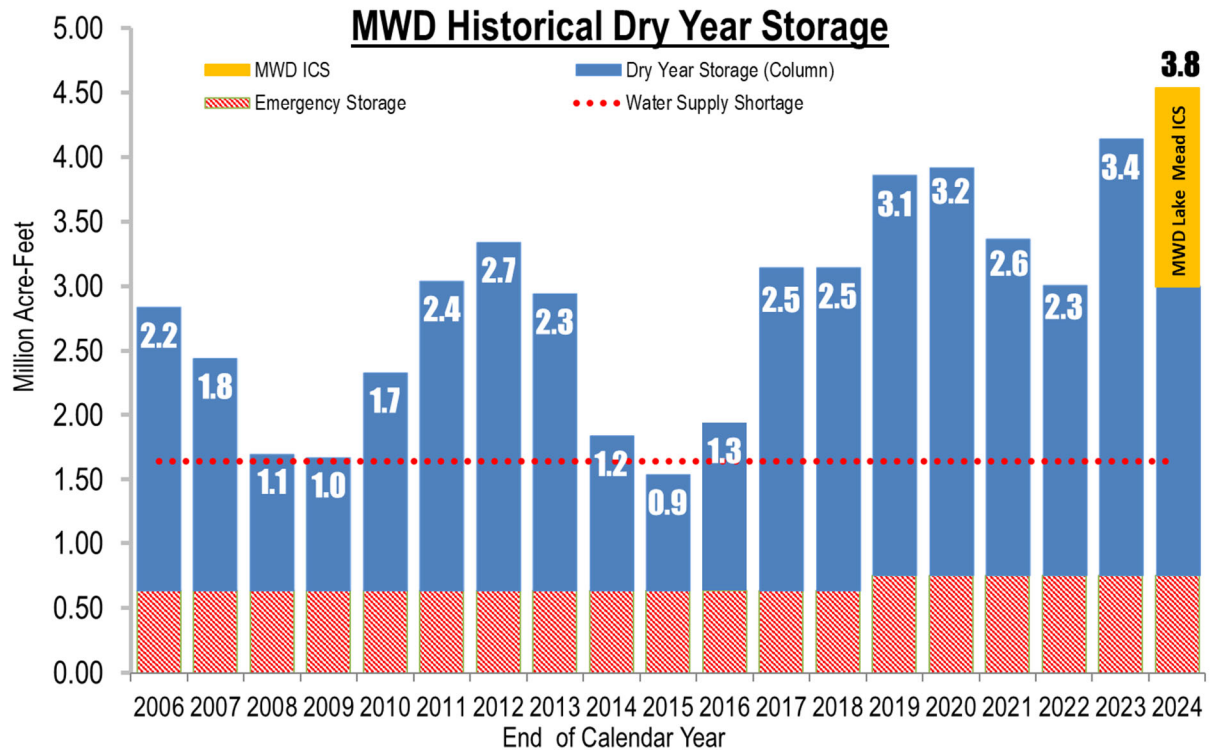
The Upper Colorado River Basin accumulated precipitation, which is reported to be **28.4 inches or 105% of normal as of August 26<sup>th</sup>**. On the Colorado River system, snowpack is measured across four states in the Upper Colorado River Basin. The Upper Colorado River Basin Snow Water Equivalent peaked at **17.2 inches as of April 9<sup>th</sup>**, which is **86% of normal** for that day. Due to the below-average inflows into Lake Powell over the past several years, the United States Bureau of Reclamation **declared a shortage at Lake Mead that has been ongoing since January 1<sup>st</sup>, 2022.** As of June 2024, **there is a 100% chance of shortage continuing in CY 2025, an 80% chance**

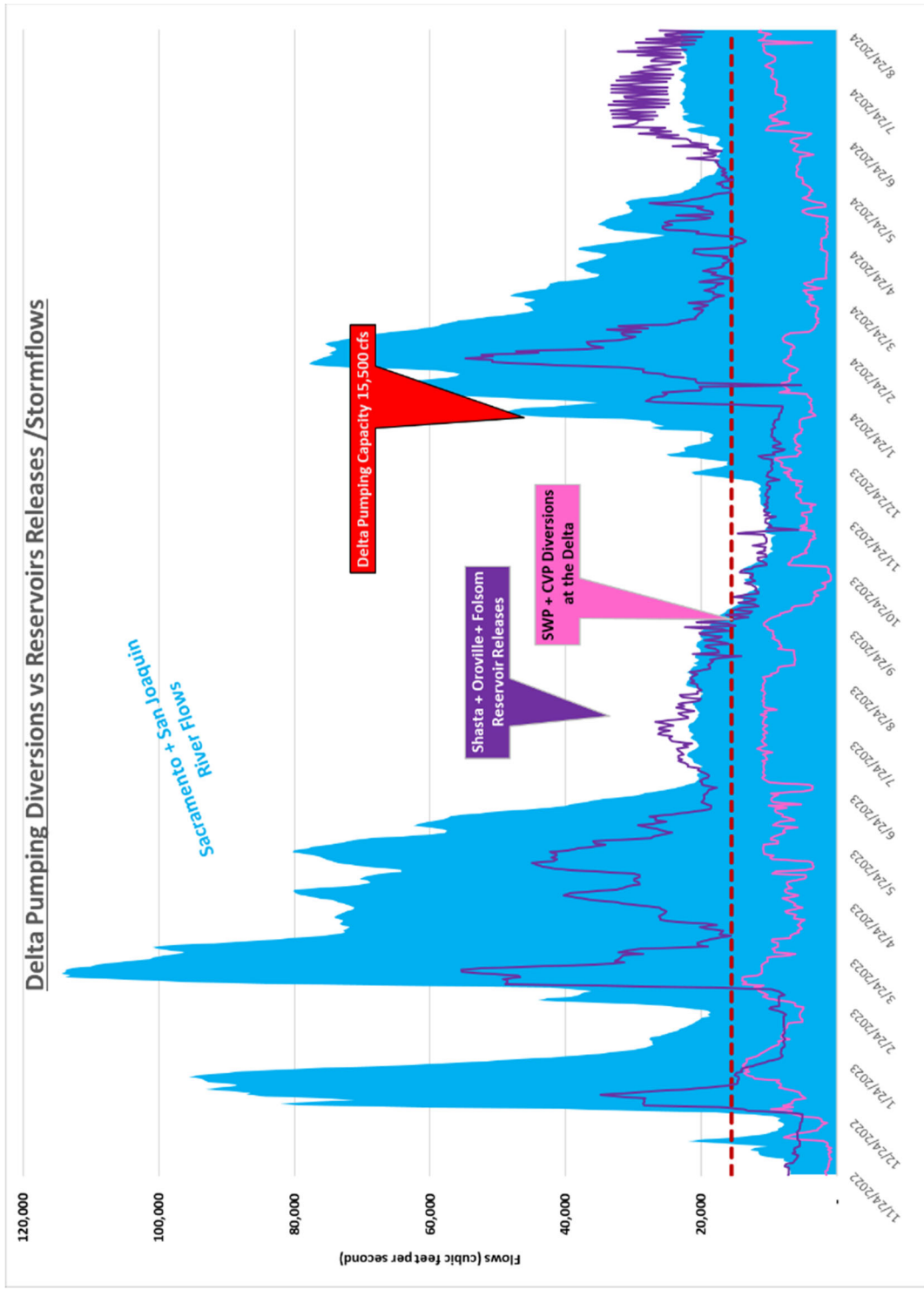
in CY 2026, and a 70% chance in CY 2027. In addition, there is a 3% chance of a California shortage in 2027.

As of August 27<sup>th</sup>, Lake Oroville's storage is at 69% of the total capacity and 112% of the normal capacity. As of August 27<sup>th</sup>, San Luis Reservoir has a current volume of **45% of the reservoir's total capacity and is 115% of normal.**



With Calendar Year (CY) 2024 estimated total demands and losses of 1.34 million acre-feet (MAF) and with a 40% SWP Table A Allocation, Metropolitan is projecting that supplies will exceed demand levels in CY 2024. Based on this, the estimated total dry-year storage for Metropolitan at the end of **CY 2024 will increase to approximately 3.8 MAF**. The projected dry-year storage supply of **3.8 MAF is approximately 2.7 MAF more storage than when Metropolitan typically goes into Water Supply Allocations**. A large factor in maintaining a high-water storage level is lower than expected water demands. We are seeing regional water demands reaching a 40-year low. **However, with a majority of Metropolitan's water supplies stored in Lake Mead and still a 5-year shortage projection at Lake Mead, there remains a lot of uncertainty about where supply balances will be in the future. In addition, Colorado River Basin States have been meeting for months to negotiate new post-2026 operations at Glen Canyon Dam at Lake Powell and Hoover Dam at Lake Mead.**







## 2024 WSDM Storage Detail

|                                             | 1/1/2024 Estimated Storage Levels | CY 2024 Put Capacity <sup>1</sup> | 2024 Total Storage Capacity |
|---------------------------------------------|-----------------------------------|-----------------------------------|-----------------------------|
| <b>WSDM Storage</b>                         |                                   |                                   |                             |
| Colorado River Aqueduct Delivery System     | 1,544,000                         | 78,000                            | 1,657,000                   |
| Lake Mead ICS                               | 1,544,000 <sup>2</sup>            | 78,000                            | 1,657,000                   |
| State Water Project System                  | 1,033,000                         | 295,000                           | 2,131,000                   |
| MWD & DWCV Carryover                        | 297,000                           | 149,000                           | 350,000 <sup>3</sup>        |
| MWD Articles 14(b) and 12(e)                | 28,000 <sup>4</sup>               | 0                                 | N/A                         |
| Castaic and Perris DWR Flex Storage         | 219,000                           | 0                                 | 219,000                     |
| Arvin Edison Storage Program                | 100,000                           | 0 <sup>5</sup>                    | 350,000                     |
| Semitropic Storage Program                  | 190,000                           | 59,000                            | 350,000                     |
| Kern Delta Storage Program                  | 141,000                           | 48,000                            | 250,000                     |
| Mojave Storage Program                      | 19,000                            | 0                                 | 330,000                     |
| AVEK Storage Program                        | 27,000                            | 0                                 | 30,000                      |
| AVEK High Desert Water Bank Program         | 11,000                            | 40,000                            | 252,000 <sup>6</sup>        |
| <b>In-Region Supplies and WSDM Actions</b>  | <b>1,016,000</b>                  | <b>106,000</b>                    | <b>1,246,000</b>            |
| Diamond Valley Lake                         | 753,000                           | 57,000                            | 810,000                     |
| Lake Mathews and Lake Skinner               | 207,000                           | 19,000                            | 226,000                     |
| Conjunctive Use Programs (CUP) <sup>7</sup> | 56,000                            | 30,000                            | 210,000                     |
| <b>Other Programs</b>                       | <b>586,000</b>                    | <b>269,000</b>                    | <b>1,181,000</b>            |
| Other Emergency Storage                     | 381,000                           | 0                                 | 381,000                     |
| DWCV Advanced Delivery Account              | 205,000                           | 269,000                           | 800,000                     |
| <b>Total</b>                                | <b>4,180,000</b>                  | <b>747,000</b>                    | <b>6,215,000</b>            |
| Emergency                                   | 750,000                           | 0                                 | 750,000                     |
| <b>Total WSDM Storage (AF) <sup>8</sup></b> | <b>3,430,000</b>                  | <b>747,000</b>                    | <b>5,465,000</b>            |

<sup>1</sup> Put capacity assumed under a 40 percent SWP Table A Allocation. Storage program losses included where applicable.

<sup>2</sup> Reflects USBR's final accounting for 2023, released May 2024. This amount is net of the water Metropolitan stored for IID in Lake Mead in an ICS sub-account.

<sup>3</sup> Total storage capacity varies year-to-year potentially increasing as the contractual annual storage limit combines with the remaining balance from the previous year. Metropolitan may opt to exceed the 350 TAF storage capacity as shown to enhance drought protection for the service area, however there is a potential risk that Metropolitan's stored water be converted to SWP contractor water if San Luis Reservoir approaches full capacity.

<sup>4</sup> Approved carryover supplies under Articles 14 (b) and 12 (e) of the State Water Project Contract for delivery in 2024.

<sup>5</sup> Puts are limited due to water quality considerations.

<sup>6</sup> Reflects 90 percent of the AVEK High Desert Water Bank Program's total storage capacity that has been constructed. The total storage capacity for the AVEK High Desert Water Bank is 280 TAF. Full recharge and recovery operation anticipated by 2027.

<sup>7</sup> Total of all CUP programs including IEUA/TVMWD (Chino Basin); Long Beach (Central Basin); Long Beach (Lakewood); Foothill (Raymond and Monk Hill); MWD OC (Orange County Basin); Three Valleys (Live Oak); Three Valleys (Upper Claremont); and Western.

<sup>8</sup> Total WSDM Storage level subject to change based on accounting adjustments. Total may not sum due to rounding.

## **MET'S WATER QUALITY UPDATE**

### **Water System Operations**

Metropolitan member agency water deliveries were 136,300 acre-feet (AF) for July, with an average of 4,400 AF per day, which was about 1,000 AF per day higher than in June. Metropolitan continued delivering water to the Cyclic and Conjunctive Use Programs. Treated water deliveries were 17,800 AF higher than in June, for a total of 76,300 AF or 56 percent of total deliveries for the month. The Colorado River Aqueduct (CRA) pumped a total of 99,000 AF in July. State Water Project (SWP) imports averaged 2,900 AF per day, totaling about 88,900 AF for the month. The target SWP blend is 25 percent for Weymouth, Diemer, and Skinner plants.

Metropolitan expects to have sufficient SWP and Colorado River supplies to meet demands in 2024. Water continues to be managed according to Water Surplus and Drought Management (WSDM) principles and operational objectives, emphasizing positioning SWP supplies to meet future demands in the SWP-dependent areas. Metropolitan continued maximizing deliveries to Desert Water Agency and Coachella Valley Water District. Metropolitan is also continuing to minimize the use of Table A supplies this year to improve SWP carryover for drought reliability next year.

### **Water Treatment and Distribution**

The SWP target blend entering the Weymouth and Diemer plants, and Lake Skinner remained at 25 percent in July. The blend leaving Lake Skinner has gradually increased over the past few weeks and now matches the blend entering the lake.

Flow-weighted running annual averages for total dissolved solids from May 2023 through April 2024 for Metropolitan's treatment plants capable of receiving a blend of supplies from the SWP and the CRA were 397, 478, and 463 mg/L for the Weymouth, Diemer, and Skinner plants, respectively.

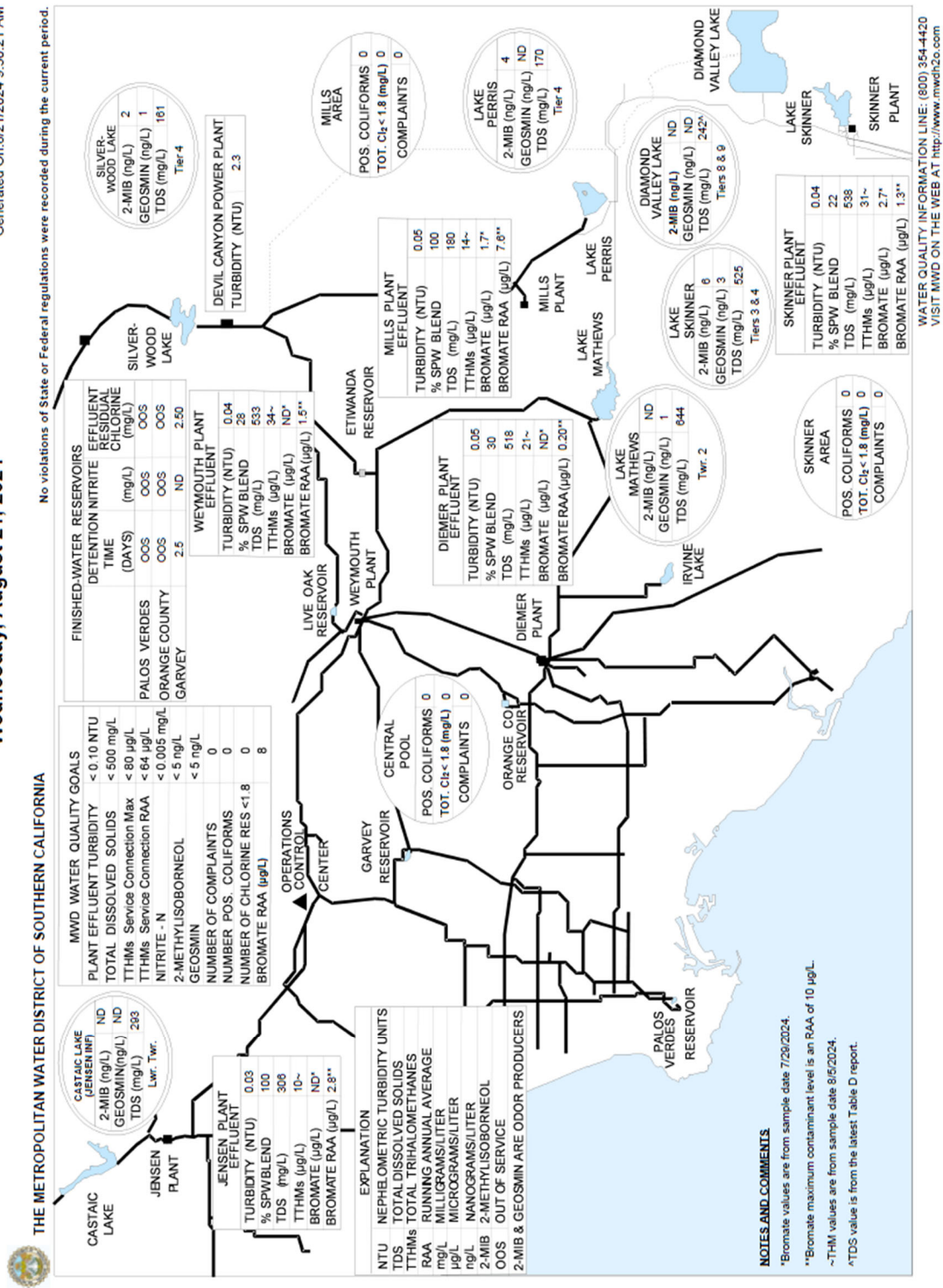
Metropolitan staff replaced existing end-of-life reduced voltage starters for Lake Skinner Outlet Tower chlorine pumps. The new soft starters gradually increase pump speed, ensuring a controlled build-up of system pressure to meet operational needs. This mitigates the risk of water hammer, a phenomenon that can cause pipe ruptures and leaks because of sudden pressurization. The chlorine pumps are used four times per year for quagga mussel control in the Lake Skinner Outlet Tower and associated Lake Skinner Outlet Conduit.

With the southern portion of the Allen-McColloch Pipeline shut down for maintenance, the OC-88 pump station is projected to experience higher flows than usual. Because of this, a temporary power source is necessary to allow two chiller units to function at full capacity so they can provide the required cooling water for additional pumps. Metropolitan staff used a nearby motor control center to supply temporary power for the additional chiller units.

# Weekly Water Quality System Status

Wednesday, August 21, 2024

Generated On: 8/21/2024 9:30:21 AM





# The Metropolitan Water District of Southern California

## Weekly Operations Plan for 8/22/2024 – 8/29/2024

For additional information, please contact James Bodnar at (213) 217-6099

1. **COLORADO RIVER AQUEDUCT:** The CRA is at a 7-pump flow.
2. **EAST BRANCH SPW:** Rialto Pipeline will average a flow of 1,275 AF/day. Santa Ana Valley Pipeline will average a flow of 250 AF/day. Inland Feeder will average a flow of 1,240 AF/day.
3. **WEST BRANCH SPW:** The flow from Castaic Lake will be at 620 AF/day. Flow to SCVWA (formerly CLWA) is currently at 100 AF/day.
4. **TERMINAL RESERVOIRS:**

| Reservoir    | Current Storage* (AF) | Percent of Capacity |
|--------------|-----------------------|---------------------|
| Lake Mathews | 107,100               | 59%                 |
| Lake Skinner | 37,800                | 86%                 |
| DVL          | 766,200               | 95%                 |

\*as of 8/21/2024

5. **WATER QUALITY:**

| Plant    | Targeted Blend<br>(% SPW) | TDS (mg/L)      | TTHMs (µg/L)    |
|----------|---------------------------|-----------------|-----------------|
|          | As of 8/21/2024           | As of 8/21/2024 | As of 7/22/2024 |
| Weymouth | 25                        | 533             | 30              |
| Diemer   | 25                        | 518             | 27              |
| Skinner  | 25                        | 538             | 22              |
| Jensen   | 100                       | 306             | 12              |
| Mills    | 100                       | 180             | 19              |

6. **WATER DELIVERIES:** August deliveries are forecasted to be about 144 TAF. As of August 21, 2024, total system demands are about 6,150 AF/day, a decrease of about 150 AF/day from last week.
7. **HYDROELECTRIC GENERATION:** As of August 21, 2024, the total daily average generation for the week was about 13.5 MW, with 6 of 15 hydroelectric plants in operation.

## **COLORADO RIVER ISSUES**

### **U.S. Bureau of Reclamation 2025 Annual Operating Plan Consultation**

The U.S. Bureau of Reclamation (Reclamation) held the second of three annual consultation meetings regarding its Annual Operating Plan for Colorado River Reservoirs (AOP) for 2025. Each year, Reclamation prepares an AOP that reports on operations of Colorado River Reservoirs during the past year and projects operations and releases for the current year based on current and projected reservoir elevations and hydrologic conditions throughout the basin. The AOP provides Metropolitan with significant operational information regarding projected releases from Lake Powell to Lake Mead and whether the Lower Division States (California, Arizona, and Nevada) will be at normal, surplus, or shortage conditions. Metropolitan uses information in the AOP to plan diversions, Intentionally Created Surplus (ICS) creation and/or delivery, interstate banking determinations, and Drought Contingency Plan Contributions.

Reclamation's draft AOP states that the annual release from Lake Powell is forecast to be 7.48 million acre-feet. The Lower Basin is forecast to be in shortage condition, requiring Nevada, Arizona, and Mexico to take shortages and make Drought Contingency Plan (DCP) contributions. California is not forecast to be required to make DCP contributions in 2025. ICS may be created and delivered, and reservoir protection conservation as provided in the Lower Basin Plan will be implemented consistent with the Supplemental Environmental Impact Statement Record of Decision.

### **Metropolitan Issues Annual Following Call for Palo Verde Program**

By July 31 of each year, Metropolitan is required to make an annual following call for the amount of land it wishes to be fallowed in Palo Verde Valley for the following two years. This year, the call was for 100 percent of the lands to be fallowed from 2025-2026. However, rather than the water being made available to Metropolitan, the water will be added to Lake Mead as system water, per the terms of the System Conservation Agreement executed by Reclamation, Palo Verde Irrigation District (PVID), and Metropolitan. Reclamation is funding the entire cost of the program and will be receiving 117,000 acre-feet per year through 2026. Part of Reclamation's funding will be set aside to fund community improvement projects in the city of Blythe and the surrounding area. A committee of three directors, each from PVID and Metropolitan, will be meeting to determine the process for selecting projects to be funded by the nearly \$7.5 million established through an agreement signed by PVID and Metropolitan.

## **DELTA CONVEYANCE ACTIVITIES AND STATE WATER PROJECT ISSUES**

### **Sites Reservoir**

At the July 19 Joint Reservoir Committee and Sites Authority Board meeting, the Reservoir Committee and the Authority Board approved a new asset management policy to establish guidelines for the effective and efficient management of assets

owned and operated by the Sites Project Authority in compliance with relevant contractual and regulatory requirements and industry best practices.

### **Science Activities**

Metropolitan staff published a paper with researchers at Southern Illinois University and UC Davis on contaminants in the Sacramento Deep Water Ship Channel. The paper, titled "A Baseline Assessment of Contamination in the Sacramento Deep Water Ship Channel," was published in Environmental Pollution. Contaminants of concern were detected in the sediment, water column, and fish prey, suggesting multiple hazard routes for toxicity.

Metropolitan staff helped to plan and implement a workshop on cyanobacteria, which forms toxic blooms in the Sacramento-San Joaquin Delta, with the Delta Science Program, UC Davis, Restore the Delta, and Little Manila Rising. Restore the Delta and the Delta Science Program were the lead organizers. The one-day workshop provided information, materials, and online resources for the communities in the Sacramento-San Joaquin Delta on the cyanobacteria blooms and their potential hazard risks to the communities and wildlife. The workshop received positive feedback. Additional workshops are being planned.

### **Delta Island Activities**

Metropolitan staff held the first public meeting for the Webb Tract Wetland Restoration and Rice Conversion projects. Over thirty interested parties attended the meeting. Two levee improvement projects continue to progress on Bouldin Island and Bacon Island. Staff attended the inaugural Wetlands Preservation Foundation and Restore the Delta's Rice Field Day.

### **Metropolitan Bay Delta Conservation Plan/California WaterFix and California EcoRestore/Delta Conveyance Project (BDCP/CWF-CER/DCP) Expenditure**

The following is a summary of Metropolitan's cumulative BDCP/CWF-CER/DCP expenditures updated for the quarter ending June 2024. This report includes the total internal costs of the BDCP, the CWF-CER, and the subsequent DCP efforts with the state administration.

| <b><u>Total (July 2005 – June 2024)</u></b> |                                 |
|---------------------------------------------|---------------------------------|
| <b>BDCP/CWF-CER/DCP Internal MWD</b>        | <b>Total Costs (19.00 yrs.)</b> |
| Labor & Benefits <sup>(1)</sup>             | \$ 38.55M                       |
| Professional Services                       | \$ 7.20M                        |
| Travel                                      | \$ 1.80M                        |
| Other <sup>(2)</sup>                        | \$ 0.21M                        |
| <b>SUBTOTAL</b>                             | <b>\$ 47.76M</b>                |
| Administrative Overhead                     | \$ 14.02M                       |
| <b>TOTAL</b>                                | <b>\$ 61.78M</b>                |

<sup>(1)</sup> Labor costs include salary, leave and non-leave benefits

<sup>(2)</sup> Other includes charges for materials and supplies, trainings & seminars, conferences & meetings, reprographics, and other incidental expenses

## **PUBLIC/GOVERNMENT AFFAIRS**

### **MEMBER AGENCY SUPPORT**

#### **Public Affairs Staff:**

- Connected Bathgate Elementary with Santa Margarita Water District to provide water donations for their fun run

#### **Government Affairs Staff:**

- Circulated the Grants Tracking and Acquisition Report to all participating member agencies
- Presented MWDOC's Legislative Policy Principles as edited for 2025 to the member agency managers group and solicited comments and feedback
- Solicited support letters on behalf of Trabuco Canyon Water District for their USBR grant application from the elected officials that represent their district
- Provided a letter of support to Santa Margarita Water District for their USBR grant application

### **COMMUNITY AND SPECIAL EVENTS**

#### **Public Affairs Staff:**

- Coordinated Ricky Raindrop's 50th Celebration Event
- Coordinated promotional items for Girl Scouts of Orange County's STEM Expo
- Coordinated and staffed the California Coastal Cleanup Day Event

#### **Government Affairs Staff:**

- Attended the Orange County Public Affairs Association Annual Legislative Aides Luncheon
- Coordinated with the Orange County legislative delegation staff to provide certificates and attend Ricky Raindrop's 50th celebration event
- Attended the annual Women of Character Luncheon honoring Director Linda Ackerman
- Attended the ACC-OC Regulatory and Legislative Committee meeting
- Attended the OCBC Governmental Affairs Committee meeting
- Participated in the OCBC Infrastructure Committee meeting

### **K-12 WATER EDUCATION**

#### **Public Affairs Staff:**

- Attended and participated in Metropolitan Water District of Southern California's Water Education Committee meeting and 40th Anniversary celebration of the Education Unit
- Met with MWDOC Choice School Program contractor Inside the Outdoors to check in on the progress of new lesson plans, pre- and post-activities, and bookings for the new school year

- Provided information regarding the FY 23-24 MWDOC Choice School Programs and calendar to school program contractors and the Cities of Tustin, San Clemente, Garden Grove, Anaheim, Fullerton, and La Habra
- Coordinated reprint and delivery of Ricky the Raindrop<sup>SM</sup> booklets to the MWDOC Choice School Program contractors for distribution

## WORKFORCE INITIATIVE

### Public Affairs Staff:

- Met with the Water Replenishment District (WRD) to discuss developing skill craft videos highlighting careers in water using front-line employee talent
- Met with the Moulton Niguel Water District to discuss Water Energy Education Alliance (WEEA) activities and sponsorship of WEEA
- Met with the Executive Director of California State University (CSU)-Water and Association of California Water Agencies (ACWA) Foundation board member to discuss how WEEA, CSU-Water, ACWA, and others could foster collaboration among academics, industry, and workforce professionals to advance workforce development
- Met with Generation: NOW to discuss potential outcomes for an impending meeting with the Tiger Woods (TGR) Foundation and San Diego County Office of Education's (SDCOE) Linda Vista Innovation Center.
- Met with SDCOE Assistant Superintendent – Innovation to discuss the presentation outline for his keynote at the next WEEA Leadership Roundtable meeting on October 24
- Met with the TGR Foundation and SDCOE's Linda Vista Innovation Center to discuss potential partnership opportunities
- Participated in the WRD Water Workforce Ad-Hoc Committee
- Coordinated OC Water Summit attendance for ten (10) bright young students interested in careers in water and energy from the National Society of Black Engineers, University of California, Los Angeles, University of California, Irvine, University of California, Riverside, California State University, Long Beach, Santiago Canyon College, and San Bernardino Valley College

## DIGITAL COMMUNICATIONS, PUBLICATIONS, AND MEDIA ENGAGEMENT

### Public Affairs Staff:

- Completed several updates for the MWDOC.com website
- Developed and distributed social media content across MWDOC's social media channels
- Prepared and delivered the [October edition of eCurrents](#)
  - Open rate: 52% (utilities average 28%)
- Prepared and distributed the following press releases:
  - [MWDOC's Ricky Raindrop Celebrates 50 Years of Good Water Stewardship](#)
  - [MEDIA ADVISORY: Ricky the Rambunctious Raindrop<sup>SM</sup> Celebrates 50 Years of Water Education!](#)

- [MWDOC Receives \\$100,000 Grant for Water Efficiency in The Commercial Sector](#)
- [MWDOC Awards Over \\$363,000 In Refunds to Member Agencies for Dedicated Irrigation Meter Area Measurements Project](#)

## **SPECIAL PROJECTS**

### **Public Affairs Staff:**

- Prepared, coordinated, and hosted the 2024 OC Water Summit at the Westin South Coast Plaza for 300+ attendees
- Prepared and distributed the final invite for the 2024 OC Water Summit
- Prepared and distributed the OC Water Summit Satisfaction Survey
- Coordinated, finalized, and attended the initial meeting for the State Water inspection trip on September 20-21, co-hosted by Directors Dick and Erdman
- Finalized inspection trip for Director Ackerman
- Speakers Bureau: Finalized details for Director Thomas's speaking engagement with Irvine Chamber
- Met with the Center for Demographic Research to discuss the potential of developing a new, searchable map for the mwdoc.com website
- Developed a one-page MWDOC overview handout for general use and for a presentation to the Metropolitan Board of Directors
- Gathered photos and quotes from MWDOC staff and developed a graphic treatment to celebrate Water Professionals Appreciation Week across MWDOC social media platforms

### **Governmental Affairs Staff:**

- Staffed the ISDOC Executive Committee meeting
- Staffed the September WACO meeting with guest speakers from the City of Santa Ana
- Met with the Executive Director of the Mountain Counties Water Resources Association to talk about WACO and possibly presenting at a future meeting
- Staffed the WACO Planning meeting
- Staffed the State Water Project Inspection Trip with Directors Dick and Erdman
- Confirmed and coordinated with the October WACO speaker
- Made edits and additions to the ISDOC Executive Committee agenda and minutes
- Drafted and circulated a letter to ISDOC members announcing the results of the 2025-2026 Executive Committee election results
- Staffed the ISDOC Executive Committee
- Participated in the CSDA Professional Development Committee meeting
- Staffed the October WACO Meeting featuring a presentation on the County of Orange's Climate Action Plan



## OUTREACH METRICS

### Public Affairs Staff:

- Google Performance Analytics (GM Report Timeframe)
  - 460 business profile interactions
  - 4,759 people viewed the business profile
- Website Analytics (GM Report Timeframe)
  - 13,192 pageviews
  - Top pages for this date range
    - Home Page – 2,552
    - Residential Rebates – 846
    - Turf Replacement Program – 583
    - Agendas, Packets, Minutes – 512
    - RFPs/RFQs – 378
    - Board of Directors – 362
  - ocwatersmartparks.com: 8 site sessions
- ocwatersmartgardens.com Analytics (August 2024)
  - 602 Sessions, 388 New Users
  - Top pages for this date range
    - Eligible Sustainability Feature Trees
    - Landing Page
    - Helpful Plant List
- Social Media (GM Report Timeframe)

According to Hootsuite – the global leader in social media management –a good engagement rate is between 1% and 5%.

For this period, MWDOC's engagement rate is at 8.54%

  - 227,258 post reach (number of people)
    - 19,408 Post engagement (actions taken – likes, shares, etc.)

## LEGISLATIVE AFFAIRS

### Governmental Affairs Staff:

- Attended the CSDA Annual Conference in Palm Desert and attended various sessions, such as:
  - County Chapters Roundtable (served as a presenter)
  - Securing LAFCO Representation
  - Leadership from the Outside In
  - Legislative Update
- Participated in the CMUA Low-Income Rate Assistance Strike Team "Next Steps" meeting
- Attended the CMUA Regulatory Committee meeting
- Participated in the Metropolitan Member Agency Legislative Coordinators meeting
- Met with legislative staff from the City of Burbank to discuss priorities for 2025
- Along with Alex Heide, we met with staff at DWR to discuss duplicative reporting.
- Attended a California Air Resources Board Workshop related to Advanced Clean Fleets – it was the second workshop on the implementation of AB 1594

## GRANTS UPDATE – 3RD QUARTER

### July-August-September 2024

|                                                             |             |
|-------------------------------------------------------------|-------------|
| # of agencies contacted for updates to project list         | 2           |
| # of projects added to project list                         | 11          |
| # of projects removed from the project list                 | 0           |
| # of agencies that do not have projects on the project list | 4           |
| Total Projects                                              | 255         |
| # of funding programs added to tracking sheet               | 0           |
| Total Funding Programs                                      | 208         |
| # of emails communicating funding opportunities             | 150         |
| # of Go/No-Go evaluations completed                         | 5           |
| # of funding update conference calls with member agencies   | 30          |
| Total amount received in grant/loan awards                  | \$0         |
| Total applications submitted                                | 2           |
| Total amount requested (grants and loans)                   | \$6,623,339 |



## **WATER USE EFFICIENCY**

### **ORANGE COUNTY DATA ACQUISITION PARTNERSHIP (OCDAP) STEERING AND TECHNICAL ADVISORY COMMITTEE (STAC)**

On September 10 and October 8, Rachel Waite-Harvey attended the OCDAP STAC. The working group collaborates on and organizes a regional effort to share costs for the acquisition of high-resolution aerial imagery and related products. Discussion focused on the Cycle #3 vendor options, planning, and logistics.

The next meeting is scheduled for November 12.

### **METROPOLITAN WATER USE EFFICIENCY WORKGROUP MEETING**

On September 19, Tina Fann and Melissa Hurtado attended Metropolitan's Water Use Efficiency Workgroup meeting. Items on the agenda included:

- Board Meeting Update
- MWD Conservation Program Updates
  - Turf Replacement Program Update
  - Addendum 22 and Forms Update
  - Master Agreements Update
  - MAAP Invoicing and Grant Funding Update
  - Conservation Credits Program "101"
  - ICP Presentations
- External Affairs Update

The next meeting is scheduled for October 17.

### **WATERSMART INNOVATIONS (WSI) CONFERENCE**

Between October 24-26, Tina F. attended the 2024 WaterSmart Innovations Conference in Las Vegas, Nevada. During the conference, Tina attended professional sessions that covered the following topics:

- Hoover Dam Tour
- Water Conservation and Incentive Programs
- Working with the CII Sector
- Water Efficient Landscaping
- Tools for Effective Education & Outreach
- Applying AMI to Conservation Practices

## **PROJECT AGREEMENT 22 (PA 22) ADVISORY WORKGROUP**

On October 26, Rachel W. joined the PA 22 Advisory Workgroup hosted by the Santa Ana Watershed Project Authority (SAWPA) and attended by SAWPA member agencies. Topics discussed included the Proposition 1 Enhanced Decision Support Tool and SARCCP Water Budget Assistance.

The next meeting is scheduled for November 18.

## **WHOLESALE WATER PROVIDERS GROUP MEETING**

On October 1, Joe Berg, Rachel Davis, Rachel W., and Beth Fahl participated in the Wholesale Water Providers Group meeting hosted by the San Diego County Water Authority and attended by water use efficiency staff from other Metropolitan wholesale water providers. Topics on the agenda included:

- New MAAP Programs. Changes and Comments
- Program Updates: New Programs? Ongoing Programs? Terminating Programs?
- Focus of Landscape Efforts: Residential? Commercial?
- MWDOP's Leak Detection Program Update
- Tools to Assist Member Agencies with New Regulations

The next meeting for this Group has not yet been scheduled.

## **SAN DIEGO COUNTY WATER AUTHORITY (SDCWA) LEGISLATION IMPLEMENTATION WORKSHOP**

On October 2, Beth participated in the SDCWA Legislation Implementation Workshop. Agenda items included:

- Overview of the Final Adopted Regulations
- CalWEP New CII Classification Guidebook
- SDCWA New CII DIM Guidebook
- SWRCB's Reporting Tool Testing & Update
- Regulation Timeline Long Term and First Steps
- AWWA WaterSmart Innovations Conference Highlights
- Resource Cheat Sheet

The next workshop is scheduled for November 20.

## **ORANGE COUNTY WATER USE EFFICIENCY WORKGROUP MEETING**

On October 3, Joe, Rachel D., Rachel W., Beth, Sam, and Tina F. hosted the Orange County Water Use Efficiency Workgroup meeting via Zoom. Items on the agenda included:

- AB 1572 – Nonfunctional Turf Ban – Presentation and Panel Discussion

- Public Agency Turf
- Conservation as a California Way of Life Standards/Framework Update
  - Framework RFP and panel volunteers
- MET Conservation Program Updates
  - Turf Replacement Program Update
  - Grant Funding Update
- Water Use Efficiency Updates
  - AMI Survey and Workgroup Meetings
  - Grant Funding Update
  - Trees as a Sustainability Feature and MET Tree Rebate Program Update

The next meeting is scheduled for November 7.

### **ALLIANCE FOR WATER EFFICIENCY (AWE) LARGE LANDSCAPES PROJECT PROGRAM ADVISORY COMMITTEE (PAC) MEETING**

On October 8, Rachel W. and Tina F. joined the AWE Large Landscapes Project PAC meeting. Discussion focused on the large landscape research AWE is undertaking in partnership with PAC members. Preliminary results of the Market Readiness Assessment were presented to the PAC.

The next meeting will be scheduled at a TBD date.

**INFORMATION CALENDAR**

**MWDOC GENERAL INFORMATION  
ITEMS**

**MWDOC BOARD OF DIRECTORS**

- Al Nederhood
- Larry D. Dick
- Bob McVicker
- Karl W. Seckel
- Randall Crane
- Jeffery M. Thomas
- Megan Yoo Schneider

MEETING OF THE BOARD OF DIRECTORS OF THE  
MUNICIPAL WATER DISTRICT OF ORANGE COUNTY  
Jointly with the  
**EXECUTIVE COMMITTEE**  
October 17, 2024, 8:30 a.m.  
18700 Ward Street, Conf. Room 101, Fountain Valley, CA 92708

Teleconference Sites:  
25652 Paseo De La Paz, San Juan Capistrano, CA 92675  
17420 Walnut Street, Fountain Valley, CA 92708

**This meeting will be held in person at 18700 Ward Street, Fountain Valley, California, 92708 (Conference Room 101). As a convenience for the public, the meeting may also be accessed by Zoom Webinar and will be available by either computer or telephone audio as indicated below. Because this is an in-person meeting and the Zoom component is not required, but rather is being offered as a convenience, if there are any technical issues during the meeting, this meeting will continue and will not be suspended.**

**Computer Audio: You can join the Zoom meeting by clicking on the following link:**

<https://zoom.us/j/8828665300>

**Telephone Audio:** (669) 900 9128 fees may apply  
(877) 853 5247 Toll-free  
**Webinar ID:** 882 866 5300#

Bob McVicker, President  
Jeffery Thomas, Vice President  
Megan Yoo Schneider, Immediate Past President

Staff: H. De La Torre, M. Goldsby, D. Micalizzi

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MWDOC Committee meetings are noticed and held as joint meetings of the Committee and the entire Board of Directors and all members of the Board of Directors may attend and participate in the discussion. Each Committee has designated Committee members, and other members of the Board are designated alternate committee members. If less than a quorum of the full Board is in attendance, the Board meeting will be adjourned for lack of a quorum and the meeting will proceed as a meeting of the Committee with those Committee members and alternate members in attendance acting as the Committee.

## **ROLL CALL**

## **PUBLIC PARTICIPATION**

### **ITEMS RECEIVED TOO LATE TO BE AGENDIZED**

Determine there is a need to take immediate action on item(s) and that the need for action came to the attention of the District subsequent to the posting of the Agenda. (Requires a unanimous vote of the Committee).

**ITEMS DISTRIBUTED TO THE BOARD LESS THAN 72 HOURS PRIOR TO MEETING -- Pursuant to** Government Code section 54957.5, non-exempt public records that relate to open session agenda items and are distributed to a majority of the Board less than seventy-two (72) hours prior to the meeting will be available for public inspection in the lobby of the District's business office located at 18700 Ward Street, Fountain Valley, California 92708, during regular business hours. When practical, these public records will also be made available on the District's Internet Web site, accessible at <http://www.mwdoc.com>.

1. EXECUTIVE COMMITTEE REVIEW OF FUTURE AGENDAS
2. DISCUSSION REGARDING UPCOMING ACTIVITIES OF SIGNIFICANCE
3. MEMBER AGENCY RELATIONS
4. GENERAL MANAGER'S REPORTS
5. REVIEW AND DISCUSS DISTRICT AND BOARD ACTIVITIES

## **ADJOURNMENT**

**NOTE:** At the discretion of the Committee, all items appearing on this agenda, whether or not expressly listed for action, may be deliberated, and may be subject to action by the Committee. On those items designated for Board action, the Committee reviews the items and makes a recommendation for final action to the full Board of Directors; final action will be taken by the Board of Directors. Agendas for Committee and Board meetings may be obtained from the District Secretary. Members of the public are advised that the Board consideration process includes consideration of each agenda item by one or more Committees indicated on the Board Action Sheet. Attendance at Committee meetings and the Board meeting considering an item consequently is advised.

Accommodations for the Disabled. Any person may make a request for a disability-related modification or accommodation needed for that person to be able to participate in the public meeting by telephoning Maribeth Goldsby, District Secretary, at (714) 963-3058, or writing to Municipal Water District of Orange County at P.O. Box 20895, Fountain Valley, CA 92728. Requests must specify the nature of the disability and the type of accommodation requested. A telephone number or other contact information should be included so that District staff may discuss appropriate arrangements. Persons requesting a disability-related accommodation should make the request with adequate time before the meeting for the District to provide the requested accommodation.

AGENDA  
JOINT PLANNING COMMITTEE  
WITH BOARD OF DIRECTORS\*  
MUNICIPAL WATER DISTRICT OF ORANGE COUNTY AND  
ORANGE COUNTY WATER DISTRICT  
18700 Ward Street, Conf. Room 101, Fountain Valley, CA 92708  
October 23, 2024, 8:30 A.M.

**This meeting will be held in person. As a convenience for the public, the meeting may also be accessed by Zoom Webinar and will be available by either computer or telephone audio as indicated below. Because this is an in-person meeting and the Zoom component is not required, but rather is being offered as a convenience, if there are any technical issues during the meeting, this meeting will continue and will not be suspended.**

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(877) 853 5247 Toll-free**

**Webinar ID: 882 866 5300#**

Teleconference Sites:

25652 Paseo De La Paz, San Juan Capistrano, CA 92675  
17420 Walnut Street, Fountain Valley, CA 92708  
10382 Bonnie Drive, Garden Grove  
20 Civic Center, Santa Ana  
1502 North Broadway, Santa Ana  
1454 Madison Street, Tustin

The meeting of the Joint Planning Committee will be conducted simultaneously with meetings of both Boards of Directors in order to allow all Board members to participate in the discussions and to ensure compliance with the Brown Act. Directors receive no additional compensation or stipend as a result of simultaneously convening this Board of Directors meetings. Items recommended for approval at this meeting will be placed on a future Board Agenda for approval by one or both agencies, as determined by the Committee.

**PUBLIC COMMENTS** - At this time, members of the public will be given an opportunity to address the Committee and the Boards concerning items within the subject matter jurisdiction of either Board. Members of the public may also address the Committee about a particular Agenda item at the time it is considered and before action is taken. The Committee requests, but does not require, that members of the public who want to address the Committee or the Boards complete a voluntary "Request to be Heard" form available from the Board Secretary prior to the meeting.

**ITEMS RECEIVED TOO LATE TO BE AGENDIZED** - Determine there is a need to take immediate action on item(s) and that the need for action came to the attention of the Districts subsequent to the posting of the Agenda. (Requires a two-thirds vote of those present, or a unanimous vote if less than two-thirds are present.)

**ITEMS DISTRIBUTED TO THE COMMITTEE LESS THAN 72 HOURS PRIOR TO MEETING** -- Pursuant to Government Code section 54957.5, non-exempt public records that relate to open session agenda items and are distributed to a majority of the Committee less than seventy-two (72) hours prior to the meeting will be available for public inspection in the lobby of the Districts' business office, located at 18700 Ward Street, Fountain Valley, California 92708, during regular business hours. When practical, these public records will also be made available on each of the District's Internet Web site, accessible at [www.ocwd.com](http://www.ocwd.com) or [www.mwdoc.com](http://www.mwdoc.com).

1. Imported water supply update
2. Groundwater basin update
3. Status Update on MWD's Business Model
4. Boardroom AV system update
5. Status of OCWD Resilience Plan
6. Any future agenda items
7. Future Meeting Date: January 22, 2025

Accommodations for the Disabled. Any person may make a request for a disability-related modification or accommodation needed for that person to be able to participate in the public meeting by telephoning Christina Fuller, OCWD District Secretary at 714/378-3234, or Maribeth Goldsby, MWDOC District Secretary, at (714) 593-5006, or writing to Orange County Water District at P.O. Box 8300, Fountain Valley, CA, 92728, or Municipal Water District of Orange County at P.O. Box 20895, Fountain Valley, CA 92728. Requests must specify the nature of the disability and the type of accommodation requested. A telephone number or other contact information should be included so that District staff may discuss appropriate arrangements. Persons requesting a disability-related accommodation should make the request with adequate time before the meeting for the District to provide the requested accommodation.

**SOUTH ORANGE COUNTY AGENCIES GROUP JOINT MEETING with  
MUNICIPAL WATER DISTRICT OF ORANGE COUNTY (MWDOC) and  
ORANGE COUNTY WATER DISTRICT (OCWD)  
THURSDAY, SEPTEMBER 26, 2024  
12:00 P.M. to 1:30 P.M.  
AGENDA**

EL TORO WATER DISTRICT  
24251 LOS ALISOS BLVD., LAKE FOREST, CA 92630

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1. Welcome and Introductions
2. MWDOC Update/Discussion
  - a. MWDOC Current Issues
  - b. Other Matters
3. MET Update/Discussion
  - a. MET Current Issues
  - b. MET Business Model Discussion
  - c. AMP Repair Project
  - d. MET Water Supply Issues
  - e. Other Matters
4. OCWD Update/Discussion
  - a. A. Current Issues
  - b. Other Matters
5. Legislative/Regulatory Update
  - a. Local
    - i. OC-LAFCO Matters
  - b. State
  - c. Federal
6. Regional Project Interests/Updates
  - a. Regional Recycled Water Discussion
  - b. South County Emergency GW Supply Project
  - c. Doheny Ocean Desalination Project Update
  - d. San Juan Watershed Project
  - e. Other Project Interests/Updates
7. Any Agency/City Updates
8. Adjournment

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*SOUTH ORANGE COUNTY AGENCIES' GROUP CONSISTS OF MEMBERS AND REPRESENTATIVES FROM*

City of San Clemente • El Toro Water District • Emerald Bay Service District  
Irvine Ranch Water District • Laguna Beach County Water District • Moulton Niguel Water District  
Santa Margarita Water District • South Coast Water District • Trabuco Canyon Water District

## **LOCAL AGENCY FORMATION COMMISSION OF ORANGE COUNTY**

### **REGULAR MEETING AGENDA**

**Wednesday, October 9, 2024  
8:15 a.m.**

**County Administrative North (CAN)  
First Floor Multipurpose Room 101  
400 W. Civic Center Drive, Santa Ana, CA 92701**

***Any member of the public may request to speak on any agenda item at the time the Commission is considering the item.***

**1. CALL THE MEETING TO ORDER**

**2. PLEDGE OF ALLEGIANCE**

**3. ROLL CALL**

**4. ANNOUNCEMENT OF SUPPLEMENTAL COMMUNICATION  
(Communications received after agenda distribution for agenda items.)**

**5. PUBLIC COMMENT**

This is an opportunity for members of the public to address the Commission on items not on the agenda, provided that the subject matter is within the jurisdiction of the Commission and that no action may be taken by the Commission on off-agenda items unless authorized by law.

**6. CONSENT CALENDAR**

**a.) [September 11, 2024 – Regular Commission Meeting Minutes](#)**

The Commission will consider approval of the September 11, 2024 meeting minutes.

**b.) [Fiscal Year 2024-25 Quarterly Financial Report \(First Quarter\)](#)**

The Commission will receive the first quarter financial report for Fiscal Year 2024-25.



**c.) Legislative Report (October 2024)**

The Commission will receive a report on the final status of bills previously reviewed by the Commission.

**7. PUBLIC HEARING**

No public hearing items scheduled.

**8. COMMISSION DISCUSSION AND ACTION**

**a.) Adoption of a Resolution Approving the Fifth Amendment to Memorandum of Agreement for the Position of Executive Officer with Carolyn Emery**

The Commission will consider adopting a resolution approving the Fourth Amendment to Memorandum of Agreement for the Position of Executive Officer.

**9. COMMISSIONER COMMENTS**

This is an opportunity for Commissioners to comment on issues not listed on the agenda, provided that the subject matter is within the jurisdiction of the Commission. No discussion or action may occur or be taken except to place the item on a future agenda if approved by the Commission majority.

**10. EXECUTIVE OFFICER'S REPORT**

Executive Officer's announcement of upcoming events and brief report on activities of the Executive Officer since the last meeting.

**11. INFORMATIONAL ITEMS & ANNOUNCEMENTS**

No informational items and announcements.

**12. CLOSED SESSION**

**a.) PUBLIC EMPLOYEE PERFORMANCE EVALUATION**

Pursuant to Government Code section 54957

Title: Executive Officer

**b.) CONFERENCE WITH LABOR NEGOTIATORS**

Pursuant to Government Code Section 54957.6

Agency designated representative: Commission Chair Donald P. Wagner and William Kelly of Kelly Associates Management Group

Unrepresented employee: Executive Officer

### 13. ADJOURNMENT OF REGULAR COMMISSION MEETING

The next Regular Commission Meeting will be held on Wednesday, November 13, 2024 at 8:15 a.m. at the County Administrative North (CAN), First Floor Multipurpose Room 101, 400 W. Civic Center Drive, Santa Ana, CA 92701.

#### PUBLIC PARTICIPATION:

The Local Agency Formation Commission of Orange County welcomes your participation. The public may share general comments or comments on agenda items through the following options:

- 1) **In-person** comments may be provided during the general comment period on off-agenda items and during the hearing of a specific agenda item. In accordance with the OC LAFCO guidelines, each speaker's comments may not exceed three (3) minutes for the respective item. If you have documents for the Commission, please bring 15 copies and submit to the Commission Clerk for distribution.
- 2) **Written** general comments or comments on specific agenda items may be submitted by email to the Commission Clerk at [ccarter-benjamin@oclafco.org](mailto:ccarter-benjamin@oclafco.org). Comments received no less than twenty-four (24) hours prior to the regular meeting will be distributed to the Commission and included in the record.

Pursuant to Government Code Section 54957.5, public records that relate to open session agenda items that are distributed to a majority of the Commission less than seventy-two (72) hours prior to the meeting will be made available to the public on the OC LAFCO website at <https://oclafco.org/meetings/>.

State law requires that a participant in an OC LAFCO proceeding who has a financial interest in a decision and who has made a campaign contribution of more than \$250 to any commissioner in the past year must disclose the contribution. If you are affected, please notify the Commission's staff before the hearing.

#### AMERICANS WITH DISABILITIES ACT (ADA)

All regular meeting agendas and associated reports are available at <https://oclafco.org/meetings/>. Any person with a disability under the Americans with Disabilities Act (ADA) may receive a copy of the agenda or associated reports upon request. Any person with a disability covered under the ADA may also request a disability-related modification or accommodation, including auxiliary aids or services, to participate in a public meeting. Requests for copies of meeting documents and accommodations shall be made with OC LAFCO staff at (714) 640-5100 at least three business days prior to the respective meeting.

# 2024 MEETING AND EVENTS CALENDAR

Approved November 8, 2023

2024



| January |    |    |    |    |    |    |
|---------|----|----|----|----|----|----|
| S       | M  | T  | W  | T  | F  | S  |
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| 7       | 8  | 9  | 10 | 11 | 12 | 13 |
| 14      | 15 | 16 | 17 | 18 | 19 | 20 |
| 21      | 22 | 23 | 24 | 25 | 26 | 27 |
| 28      | 29 | 30 | 31 |    |    |    |

| April |    |    |    |    |    |    |
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| 14    | 15 | 16 | 17 | 18 | 19 | 20 |
| 21    | 22 | 23 | 24 | 25 | 26 | 27 |
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| July |    |    |    |    |    |    |
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| 21   | 22 | 23 | 24 | 25 | 26 | 27 |
| 28   | 29 | 30 | 31 |    |    |    |

| October |    |    |    |    |    |    |
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| 13      | 14 | 15 | 16 | 17 | 18 | 19 |
| 20      | 21 | 22 | 23 | 24 | 25 | 26 |
| 27      | 28 | 29 | 30 | 31 |    |    |

| February |    |    |    |    |    |    |
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| 4        | 5  | 6  | 7  | 8  | 9  | 10 |
| 11       | 12 | 13 | 14 | 15 | 16 | 17 |
| 18       | 19 | 20 | 21 | 22 | 23 | 24 |
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| May |    |    |    |    |    |    |
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| 19  | 20 | 21 | 22 | 23 | 24 | 25 |
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| August |    |    |    |    |    |    |
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| November |    |    |    |    |    |    |
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| March |    |    |    |    |    |    |
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| 24    | 25 | 26 | 27 | 28 | 29 | 30 |
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| June |    |    |    |    |    |    |
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| 23   | 24 | 25 | 26 | 27 | 28 | 29 |
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| September |    |    |    |    |    |    |
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| 8         | 9  | 10 | 11 | 12 | 13 | 14 |
| 15        | 16 | 17 | 18 | 19 | 20 | 21 |
| 22        | 23 | 24 | 25 | 26 | 27 | 28 |
| 29        | 30 |    |    |    |    |    |

| December |    |    |    |    |    |    |
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| 8        | 9  | 10 | 11 | 12 | 13 | 14 |
| 15       | 16 | 17 | 18 | 19 | 20 | 21 |
| 22       | 23 | 24 | 25 | 26 | 27 | 28 |
| 29       | 30 | 31 |    |    |    |    |

- OC LAFCO Regular Meeting (*begins at 8:15 a.m.*)  
**Location:** County Administrative North, First Floor Multipurpose Room 101, 400 W. Civic Center Dr., Santa Ana, CA 92701.
- Office closure due to legal holidays and flexible work schedule.
- CALAFCO Annual Conference - October 16 - 18, 2024 at Tenaya Lodge at Yosemite.



## Executive Committee Meeting

Tuesday, October 1, 2024

7:30 a.m.

### Mailing Address

P.O. Box 20895  
Fountain Valley, CA 92728

The next meeting of the ISDOC Executive Committee will be via teleconference only.

The MWDOC/OCWD offices are closed to the public. Please use the information below to access the meeting.

### Meeting Location

MWDOC/OCWD  
18700 Ward Street  
Fountain Valley, CA 92708

Join Zoom Meeting

<https://us06web.zoom.us/j/3840960436>

(714) 963-3058  
(714) 964-5930 fax

<https://isdoc.specialdistrict.org/>

Dial by your location

669 900 9128 US (San Jose)

877 853 5247 US Toll-free

888 788 0099 US Toll-free

### Executive Committee

**President**  
**Hon. Greg Mills**  
*Serrano Water District*

### **1<sup>st</sup> Vice President**

**Hon. Bob McVicker**  
*Municipal Water District  
Orange County*

**2<sup>nd</sup> Vice President**  
**Hon. Paul Mesmer**  
*Surfside Colony Community  
Services District*

**3<sup>rd</sup> Vice President**  
**Hon. Scott Nelson**  
*Placentia Library District*

**Secretary**  
*Vacant*

**Treasurer**  
**Hon. Sandra Jacobs**  
*Santa Margarita Water District*

**Immediate Past President**  
**Hon. Mark Monin**  
*El Toro Water District*

### Staff Administration

**Heather Baez**  
*Municipal Water District of Orange  
County*

**Tina Dubuque**  
*Municipal Water District of Orange  
County*

## AGENDA

### **I. Welcome, Introductions**

[Please mute yourself when not speaking. Please raise hand on Zoom if you have a question or comment.]

### **II. Approval of Minutes**

- Approval of Minutes: September 3, 2024

### **III. Public Comments on items not on the agenda**

### **IV. New Business**

### **V. Old Business**

- Review ISDOC Election Results
- ISDOC Associate Member Event on October 30<sup>th</sup> – dues & deadline

### **VI. Treasurer's Report – Director Jacobs**

- Report of accounts

### **VII. CSDA Report – Director Schafer or Chris Palmer**

- Receive, discuss and file the CSDA Report

### **VIII. LAFCO Report – Director Fisler**

- Receive, discuss and file the LAFCO report

### **IX. ACWA Report – Director Jacobs**

- Receive, discuss and file the ACWA report

**X. OCCOG Report – Director Scheafer**

- Receive, discuss and file OCCOG report

**XI. California Association of Sanitation Agencies (CASA) Report – OCSD Representative**

- Receive, discuss and file the CASA report

**XII. Subcommittee Reports**

- Programs – Director McVicker
- Membership - Director Mesmer
- Legislative – Trustee Nelson

**XIII. Adjourn**



## Water Advisory Committee of Orange County (WACO) Virtual Meeting

Friday, October 4, 2024  
7:30 a.m. – 9:00 a.m.

### Zoom Registration:

[Click here to register](#)

#### Officers

**Chair**  
**Hon. Mark Monin**  
*El Toro Water District*

**Vice Chair**  
**Hon. Greg Mills**  
*Serrano Water District*

#### Staff Contacts

**Medha Paliwal / Dani Berch**  
*Orange County Water District (OCWD)*  
(714) 378-3200  
[www.ocwd.com/news-events/events/waco](http://www.ocwd.com/news-events/events/waco)

**Heather Baez / Pari Francisco**  
*Municipal Water District of Orange County (MWDOC)*  
(714) 963-3058  
[www.mwdoc.com/waco](http://www.mwdoc.com/waco)

## AGENDA

### Welcome

- Mark Monin, El Toro Water District

### Reports

- Metropolitan Water District of Southern California (MET)
- Association of California Water Agencies (ACWA)

### Program

County of Orange Climate Action Plan

Speaker:

Tara Tisopulos, Deputy Director of Environmental Sustainability,  
OC Waste & Recycling

### Agency Announcements

### Adjourn

### ***Next WACO Meeting***

Friday, November 1, 2024 at 7:30 a.m. via Zoom

### ***Next WACO Planning Committee Meeting***

Tuesday, October 15, 2024 at 7:30 a.m. via Zoom



**WACO Planning Committee**  
**Tuesday, October 15, 2024 at 7:30 A.M.**

**Join Zoom Meeting:** <https://zoom.us/j/92882659982>  
**Meeting ID:** 928 8265 9982  
**Phone Audio:** 669-900-9128

## **AGENDA**

### **WELCOME**

#### **Mailing Address**

P.O. Box 20895  
Fountain Valley, CA 92728

#### **Meeting Location**

Virtual - Zoom

(714) 378-8232  
(714) 963-0291 fax

[www.mwdoc.com/waco](http://www.mwdoc.com/waco)  
[www.ocwd.com/news-events/events/waco](http://www.ocwd.com/news-events/events/waco)

#### **Officers**

##### **Chair**

**Hon. Mark Monin**  
*El Toro Water District*

##### **Vice Chair**

**Hon. Greg Mills**  
*Serrano Water District*

#### **Staff Contacts:**

**Medha Paliwal/Dani Berch**  
*Orange County Water District*

**Heather Baez/Pari Francisco**  
*Municipal Water District of Orange County*

### **ACTION ITEMS**

1. November 1, 2024 WACO Meeting
  - Reports: MET, CSDA, ACWA
  - Program: Pure Water/DPR – John Bednarski, Interim Assistant General Manager of Water Resources and Technical Services, MET (*invited*)
    - *Backup: Preparing for the storm season – Ben Smith, Director of Recharge and Wetland Operations, OCWD*
  - Agency Spotlight: El Toro Water District – General Manager Dennis Cafferty
2. December 13, 2024 WACO Meeting
  - Reports: MET, ACWA
  - Program: Colorado River Users Association (CRUA) recap and update on Colorado River negotiations
  - Speaker: Bill Hasencamp, Manager of Colorado River Resources, Metropolitan Water District of Southern California

### **DISCUSSION ITEMS**

1. Chair/Vice Chair Elections Process
2. Discussion of October 4 meeting: County of Orange Climate Action Plan
3. Agency spotlights:
  - Mesa Water District (2025: Feb or later)
4. Discuss potential topics for future meetings:
  - Forest restoration and headwaters w/ Justin Caparusso, Executive Director, Mountain Counties Association (had a conflict for Nov. 2024)
  - Federal legislative update, Eric Sapirstein (early 2025)
  - Jeff Kightlinger, Acequia Consulting, LLC (retired MET GM)
  - San Diego County Water Authority, GM Dan Denham
  - Tulare Lake
  - Environmental water plans: how can/do they work? What are they doing with the water they've got?
  - Water banking – update on status of different programs
  - Delta conveyance plan – economics and state evaluation on estimated costs
  - Water deliveries from the Colorado River and the Rio Grande River and its impacts to Mexico/U.S.; All-American Canal at the U.S./Mexico border
  - MET's Climate Adaptation Master Plan for Water (CAMP4W)
  - "Virtual" water
  - MNWD emergency storage program for non-basin agencies
  - CARB advanced clean fleets rule
  - Ag/central valley drought resilience success stories: Floodplain Forward Coalition, the Sacramento Valley Dry Year Task Force, & the Kings River Conservation District

- CA Water Commission white paper “Potential State Strategies for Protecting Communities and Fish and Wildlife in the Event of Drought”
- Drought Resilience Interagency and Partners (DRIP) Collaborative
- Flood Program (with presentations by the Central Valley Flood Protection Board & DWR’s Divisions of Dam Safety & of Flood Management)
- WSIP projects update (possible presentations by Sites, Chino Basin, Kern Fan)
- California Irrigation Management Information System (CIMIS)
- OC demographics – where we’ve been and where we are going
- SWRCB’s conservation as a way of life plan w/ speakers David Mitchell and Joe Berg (and possibly Dave Bolland)
- How business and government might solve the freshwater crisis—together
- Aggregation of water rights
- Las Virgenes Municipal Water District – OceanWell desalination project
- Offshore desalination, subsea reverse osmosis (SSRO) technology w/ Ocean Well Water (Tim Quinn)
- Global warming: natural or manmade? w/ speaker Roy Spencer, Ph.D., climatologist, author & former NASA scientist (can also speak to related topics such as urbanizations effects on temperatures and Colorado River shortages)
- Updating California water laws to address drought and climate change w/ Holly Doremus, Professor of Law, Berkeley

#### **INFORMATIONAL ITEMS**

1. WACO meetings: Zoom meeting ID and meeting link change monthly
2. Planning meetings: Zoom link is the same every month
3. Meeting materials are posted at: <https://www.mwdoc.com/waco/>

#### **ADJOURN**



**DATES TO REMEMBER  
OCTOBER/NOVEMBER**

1. Oct 25 – 1:30 p.m. – Pres/VP/GM Meeting
2. Oct 30 – 11:30 a.m. – ISDOC Quarterly Luncheon
3. Nov 1 – DISTRICT OFFICE CLOSED
4. Nov 1 – 7:30 a.m. – WACO Meeting
5. Nov 5 – 7:30 a.m. – ISDOC Executive Meeting
6. Nov 5 – 10:00 a.m. – RRC Meeting
7. Nov 6 – 8:15 a.m. – LAFCO Meeting
8. Nov 6 – 8:30 a.m. – MWDOC Bd Workshop
9. Nov 7 – 8:30 a.m. – SOCWA Board Meeting
10. Nov 7 – 2:30 p.m. – SOCWMA Executive Quarterly Meeting
11. Nov 8 – 1:30 p.m. – Pres/VP/GM Meeting
12. Nov 11 – VETERANS DAY – DISTRICT OFFICE CLOSED
13. Nov 12 – 8:30 a.m. – MWDOC P&O
14. Nov 13 – 8:30 a.m. – MWDOC Admin/Finance Meeting
15. Nov 14 – 8:30 a.m. – SOCWA Engineering Committee Meeting
16. Nov 14 – 11:30 a.m. – CAG Meeting
17. Nov 15 – DISTRICT OFFICE CLOSED
18. Nov 18 – 1:30 p.m. – Agenda Review Meeting
19. Nov 19 – 7:30 a.m. – WACO Planning Meeting
20. Nov 19 – 10:30 a.m. – SOCWA Finance Committee Meeting
21. Nov 20 – 8:30 a.m. – MWDOC Board Meeting
22. Nov 21 – 8:30 a.m. – MWDOC Executive Committee Meeting
23. Nov 22 – 1:30 p.m. – Pres/VP/GM Meeting
24. Nov 25 – 7:30 a.m. – Regular Engineering and Finance Meeting
25. Nov 26 – 7:30 a.m. – Regular Board Meeting
26. Nov 26 – 12:00 p.m. – SOCAG
27. Nov 28/29 – THANKSGIVING DAY HOLIDAY/DISTRICT CLOSED

# EL TORO WATER DISTRICT

## Glossary of Water Terms

**Accumulated overdraft:** The amount of water necessary to be replaced in the intake area of the groundwater basin to prevent the landward movement of ocean water into the fresh groundwater body.

**Acre-foot, AF:** A common water industry unit of measurement. An acre-foot is 325,851 gallons, or the amount of water needed to cover one acre with water one foot deep. An acre-foot serves annual needs of two typical California families.

**ACWA:** Association of California Water Agencies.  
A statewide group based in Sacramento that actively lobbies State and Federal Government on water issues.

**Advanced treatment:** Additional treatment processes used to clean wastewater even further following primary and secondary treatment. Also known as tertiary treatment.

**AFY:** Acre-foot per year.

**Alluvium:** A stratified bed of sand, gravel, silt, and clay deposited by flowing water.

**AMP:** Allen McCulloch pipeline.

Major pipeline transporting treated water to water districts between Yorba Linda, where it starts to El Toro Water District reservoir, where it terminates.

**Annexation:** The inclusion of land within a government agency's jurisdiction.

**Annual overdraft:** The quantity by which the production of water from the groundwater supplies during the water year exceeds the natural replenishment of such groundwater supplies during the same water year.

**Aqueduct:** A man-made canal or pipeline used to transport water.

**Aquifer:** An underground geologic formation of rock, soil or sediment that is naturally saturated with water; an aquifer stores groundwater.

**Arid:** Dry; deserts are arid places. Semi-arid places are almost as dry as a desert.

**Artesian:** An aquifer in which the water is under sufficient pressure to cause it to rise above the bottom of the overlying confining bed, if the opportunity is provided.

**Artificial recharge:** The addition of surface water to a groundwater reservoir by human activity, such as putting surface water into recharge basins. (See also: groundwater recharge and recharge basin.)

**AWWA** American Water Works Association  
Nationwide group of public and private water purveyors and related industrial suppliers.

**Base flow:** The portion of river surface flow which remains after deduction of storm flow and/or purchased imported water.

**Bay-Delta:** The Sacramento-San Joaquin Bay-Delta is a unique natural resource of local, state and national significance. The Delta is home to more than 500,000 people; contains 500,000 acres of agriculture; provides habitat for 700 native plant and animal species; provides water for more than 25 million Californians and 3 million acres of agriculture; is traversed by energy, communications and transportation facilities vital to the economic health of California; and supports a \$400 billion economy.

**BIA:** Building Industry Association.

**Biofouling:** The formation of bacterial film (biofilm) on fragile reverse osmosis membrane surfaces.

**Biosolids:** Solid organic matter recovered from a sewage treatment process and used especially as fertilizer.

**BMP:** Best Management Practice. An engineered structure or management activity, or combination of these, that eliminates or reduces adverse environmental effects.

**Brackish water:** A mixture of freshwater and saltwater.

**Brown Act:** Ralph M. Brown Act enacted by the State legislature governing all meetings of legislative bodies. Also known as the Open Meeting requirements.

**Canal:** A ditch used to move water from one location to another.

**CASA:** California Association of Sanitation Agencies The sanitation equivalent of ACWA concerned solely with issues affecting the treatment and disposal of solid waste and wastewater.

**CEQA:** California Environmental Quality Act.

**CERCLA:** Comprehensive Environmental Response, Compensation and Liability Act. This federal law establishes the Superfund program for hazardous waste sites. It provides the legal basis for the United States EPA to regulate and clean up hazardous waste sites, and if appropriate, to seek financial compensation from entities responsible for the site.

**CFS:** Cubic feet per second.

**Chloramines:** A mixture of ammonia and chlorine used to purify water.

**Clarify:** To make clear or pure by separation and elimination of suspended solid material.

**Coagulation:** The clumping together of solids so they can more easily be settled out or filtered out of water. A chemical called aluminum sulfate (alum) is generally used to aid coagulation in water treatment and reclamation.

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**Coastkeepers:** A non-profit organization dedicated to the protection and preservation of the marine habitats and watersheds of Orange County through programs of education, restoration, enforcement and advocacy.

**Colored water:** Groundwater extracted from the basin that is unsuitable for domestic use without treatment due to high color and odor exceeding drinking water standards.

**Condensation:** The process of water vapor (gas) changing into liquid water. An example of condensation can be seen in the tiny water droplets that form on the outside of a glass of iced tea as warmer air touches the cooler glass.

**Confined aquifer:** An aquifer that is bound above and below by dense layers of rock and contains water under pressure.

**Conjunctive use:** Storing imported water in a local aquifer, in conjunction with groundwater, for later retrieval and use.

**Contaminate:** To make unclean or impure by the addition of harmful substances.

**CPCFA:** California Pollution Control Financing Authority. State agency providing funds for wastewater reclamation projects.

**Crisis:**

1. **a:** The turning point for better or worse **b:** a paroxysmal attack of pain, distress, or disordered function **c:** an emotionally significant event or radical change of status in a person's life <a midlife crisis>
2. The decisive moment (as in a literary plot)
3. **a:** An unstable or crucial time or state of affairs in which a decisive change is impending; *especially* : one with the distinct possibility of a highly undesirable outcome <a financial crisis> **b:** a situation that has reached a critical phase

**CTP** Coastal Treatment Plant

**CWPCA** California Water Pollution Control Association. A 7000 member non-profit educational organization dedicated to water pollution control.

**Dam:** A barrier built across a river or stream to hold water.

**Decompose:** To separate into simpler compounds, substances or elements.

**Deep percolation:** The percolation of surface water through the ground beyond the lower limit of the root zone of plants into a groundwater aquifer.

**Degraded water:** Water within the groundwater basin that, in one characteristic or another, does not meet primary drinking water standards.

**Delta:** Where the rivers empty; an outlet from land to ocean, also where the rivers deposit sediment they carry forming landforms.

**Delta Vision:** Delta Vision is intended to identify a strategy for managing the Sacramento-San Joaquin Delta as a sustainable ecosystem that would continue to support environmental and economic functions that are critical to the people of California.

**Demineralize:** To reduce the concentrations of minerals from water by ion exchange, distillation, electro-dialysis, or reverse osmosis.

**De-nitrification:** The physical process of removing nitrate from water through reverse osmosis, microfiltration, or other means.

**Desalting (or desalination):** Removing salts from salt water by evaporation or distillation. Specific treatment processes, such as reverse osmosis or multi-stage flash distillation, to demineralize seawater or brackish (saline) waters for reuse. Also sometimes used in wastewater treatment to remove salts other pollutants.

**Desilting:** The physical process of removing suspended particles from water.

**Dilute:** To lessen the amount of a substance in water by adding more water.

**Disinfection:** Water treatment which destroys potentially harmful bacteria.

**Drainage basin:** The area of land from which water drains into a river, for example, the Sacramento River Basin, in which all land area drains into the Sacramento River. Also called catchment area, watershed, or river basin.

**Drought:** A prolonged period of below-average precipitation.

**DPHS:** California Department of Public Health Services. Regulates public water systems; oversees water recycling projects; permits water treatment devices; certifies drinking water treatment and distribution operators; supports and promotes water system security; provides support for small water systems and for improving technical, managerial, and financial (TMF) capacity; provides funding opportunities for water system improvements.

**DVL:** Diamond Valley Lake. Metropolitan's major reservoir near Hemet, in southwestern Riverside County.

**DWR:** California Department of Water Resources. Guides development/management of California's water resources; owns/operates State Water Project and other water facilities.

**Endangered Species:** A species of animal or plant threatened with extinction.

**Endangered Species Act of 1973 (ESA):** The most wide-ranging of the dozens of United States environmental laws passed in the 1970s. As stated in section 2 of the act, it was designed to protect critically imperiled species from extinction as a "consequence of economic growth and development untended by adequate concern and conservation.

**Ecosystem:** Where living and non-living things interact (coexist) in order to survive.

**Effluent:** Wastewater or other liquid, partially or completely treated or in its natural state, flowing from a treatment plant.

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**Evaporation:** The process that changes water (liquid) into water vapor (gas).

**Estuary:** Where fresh water meets salt water.

**Evapotranspiration:** The quantity of water transpired (given off), retained in plant tissues, and evaporated from plant tissues and surrounding soil surface. Quantitatively, it is expressed in terms of depth of water per unit area during a specified period of time.

**FCH** Federal Clearing House – Environmental Review/Processing

**FEMA** Federal Emergency Management Agency

**Filtration:** The process of allowing water to pass through layers of a porous material such as sand, gravel or charcoal to trap solid particles. Filtration occurs in nature when rain water soaks into the ground and it passes through hundreds of feet of sand and gravel. This same natural process of filtration is duplicated in water and wastewater treatment plants, generally using sand and coal as the filter media.

**Flocculation:** A chemical process involving addition of a coagulant to assist in the removal of turbidity in water.

**Forebay:** A reservoir or pond situated at the intake of a pumping plant or power plant to stabilize water level; also, a portion of a groundwater basin where large quantities of surface water can recharge the basin through infiltration.

**Gray water reuse:** Reuse, generally without treatment, of domestic type wastewater for toilet flushing, garden irrigation and other non-potable uses. Excludes water from toilets, kitchen sinks, dishwashers, or water used for washing diapers.

**Green Acres Project (GAP):** A 7.5 million gallons per day (MGD) water reclamation project that serves tertiary treated recycled water to irrigation and industrial users in Costa Mesa, Fountain Valley, Huntington Beach, Newport Beach, and Santa Ana.

**God Squad:** A seven-member committee that is officially called the "Endangered Species Committee". Members consist of Secretary of the Interior, the Secretary of Agriculture, the Secretary of the Army, the Chairman of the Council of Economic Advisers, the Administrator of the National Oceanic and Atmospheric Administration and one individual from the affected state. The squad was established in 1978 by an amendment to the 1973 Endangered Species Act (ESA). It has only been called into action three times to deal with proposed federal agency actions that have been determined to cause "jeopardy" to any listed species. Such actions may receive an exemption from the ESA if five members of the committee determine that the action is of regional or national significance, that the benefits of the action clearly outweigh the benefits of conserving the species and that there are no reasonable and prudent alternatives to the action.

**Groundwater:** Water that has percolated into natural, underground aquifers; water in the ground, not water puddled on the ground.

**Groundwater basin:** A groundwater reservoir defined by the overlying land surface and the underlying aquifers that contain water stored in the reservoir. Boundaries of success-ively deeper aquifers may differ and make it difficult to define the limits of the basin.

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**Groundwater mining:** The withdrawal of water from an aquifer in excess of recharge over a period of time. If continued, the underground supply would eventually be exhausted or the water table could drop below economically feasible pumping lifts.

**Groundwater overdraft:** The condition of a groundwater basin in which the amount of water withdrawn by pumping exceeds the amount of water that recharges the basin over a period of years during which water supply conditions approximate average.

**Groundwater recharge:** The action of increasing groundwater storage by natural conditions or by human activity. See also: Artificial recharge.

**Ground Water Replenishment System (GWRS):** A joint project of the Orange County Water District and the Orange County Sanitation District that will provide up to 100,000 acre-feet of reclaimed water annually. The high-quality water will be used to expand an existing underground seawater intrusion barrier and to replenish the groundwater basin underlying north and central Orange County.

**Groundwater table:** The upper surface of the zone of saturation (all pores of subsoil filled with water), except where the surface is formed by an impermeable body.

**GPM:** Gallons per minute.

**Ground Water Replenishment System (GWRS):** Orange County Water District's state-of-the-art, highly advanced, waste-water treatment facility.

**Hydrologic balance:** An accounting of all water inflow to, water outflow from, and changes in water storage within a hydrologic unit over a specified period.

**Hydrologic cycle:** The process of water constantly circulating from the ocean, to the atmosphere, to the earth in a form of precipitation, and finally returning to the ocean.

**Imported water:** Water that has originated from one hydrologic region and is transferred to another hydrologic region.

**Inflatable rubber dams:** Designed to replace temporary sand levees that wash out during heavy storm flow, the dams hold back high-volume river flows and divert the water into the off-river system for percolation.

**Influent:** Water or wastewater entering a treatment plant, or a particular stage of the treatment process.

**Irrigation:** Applying water to crops, lawns or other plants using pumps, pipes, hoses, sprinklers, etc.

**JPIA** Joint Powers Insurance Authority. A group of water agencies providing self-insurance to members of the ACWA.

**LAIF** Local Agency Investment Fund. Statewide pool of surplus public agency money managed by State Treasurer.

**Leach:** To remove components from the soil by the action of water trickling through.

**MAF:** Million acre feet.

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**MCL:** Maximum contaminant level set by EPA for a regulated substance in drinking water. According to health agencies, the maximum amount of a substance that can be present in water that's safe to drink and which looks, tastes and smells good.

**MET:** Metropolitan Water District of Southern California.

**MGD:** Million gallons per day.

**Microfiltration:** A physical separation process where tiny, hollow filaments members separate particles from water.

**Microorganism:** An animal or plant of microscopic size.

**MWD:** Metropolitan Water District of Southern California.

**MWDOC:** Municipal Water District of Orange County. Intermediate wholesaler between MWD and 27 member agencies including ETWD.

**Non-point source pollution:** Pollution that is so general or covers such a wide area that no single, localized source of the pollution can be identified.

**NPDES** National Pollution Discharge Elimination System

**OCBC:** Orange County Business Council.

**OCEMA** Orange County Environmental Management Agency

**OCWD:** Orange County Water District.

**Opportunity:**

1. A favorable juncture of circumstances.
2. A good chance for advancement or progress .

**Organism:** Any individual form of life, such as a plant, animal or bacterium.

**PCM** Professional Community Management, Inc. Property Management company providing services to Laguna Woods Village and other homeowner associations.

**Perched groundwater:** Groundwater supported by a zone of material of low permeability located above an underlying main body of groundwater with which it is not hydrostatically connected.

**Percolation:** The downward movement of water through the soil or alluvium to the groundwater table.

**Permeability:** The capability of soil or other geologic formations to transmit water.

**Point source:** A specific site from which waste or polluted water is discharged into a water body, the source of which is identified. See also: non-point source.

**Potable water:** Suitable and safe for drinking.

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**PPB:** Parts per billion.

**Precipitation:** Water from the atmosphere that falls to the ground as a liquid (rain) or a solid (snow, sleet, hail).

**Primary treated water:** First major treatment in a wastewater treatment facility, usually sedimentation but not biological oxidation.

**Primary treatment:** Removing solids and floating matter from wastewater using screening, skimming and sedimentation (settling by gravity).

**Prior appropriation doctrine:** Allocates water rights to the first party who diverts water from its natural source and applies the water to beneficial use. If at some point the first appropriator fails to use the water beneficially, another person may appropriate the water and gain rights to the water. The central principle is beneficial use, not land ownership.

**Pumping Plant:** A facility that lifts water up and over hills.

**Recharge:** The physical process where water naturally percolates or sinks into a groundwater basin.

**Recharge basin:** A surface facility, often a large pond, used to increase the infiltration of surface water into a groundwater basin.

**Reclaimed wastewater:** Wastewater that becomes suitable for a specific beneficial use as a result of treatment. See also: wastewater reclamation.

**Reclamation project:** A project where water is obtained from a sanitary district or system and which undergoes additional treatment for a variety of uses, including landscape irrigation, industrial uses, and groundwater recharge.

**Recycling:** A type of reuse, usually involving running a supply of water through a closed system again and again. Legislation in 1991 legally equates the term "recycled water" to reclaimed water.

**Reservoir:** A place where water is stored until it is needed. A reservoir can be an open lake or an enclosed storage tank.

**Reverse osmosis:** (RO) A method of removing salts or other ions from water by forcing water through a semi-permeable membrane.

**RFP** Request for Proposal

**Riparian:** Of or on the banks of a stream, river, or other body of water.

**RO:** Reverse osmosis. See the listing under "reverse osmosis."

**R-O-W** Right-of-way

**Runoff:** Liquid water that travels over the surface of the Earth, moving downward due to gravity. Runoff is one way in which water that falls as precipitation returns to the ocean.

**RWQCB** Regional Water Quality Control Board. State agency regulating discharge and use of recycled water.

**Safe Drinking Water Act (SDWA):** The Safe Drinking Water Act (SDWA) was originally passed by Congress in 1974 to protect public health by regulating the nation's public drinking water supply. The law was amended in 1986 and 1996 and requires many actions to protect drinking water and its sources: rivers, lakes, reservoirs, springs, and ground water wells. (SDWA does not regulate private wells which serve fewer than 25 individuals.) SDWA authorizes the United States Environmental Protection Agency (US EPA) to set national health-based standards for drinking water to protect against both naturally-occurring and man-made contaminants that may be found in drinking water. US EPA, states, and water systems work together to make sure that these standards are met.

**Safe yield:** The maximum quantity of water that can be withdrawn from a groundwater basin over a long period of time without developing a condition of overdraft, sometimes referred to as sustained yield.

**SAFRA** Santa Ana River Flood Protection Agency

**Salinity:** Generally, the concentration of mineral salts dissolved in water. Salinity may be measured by weight (total dissolved solids - TDS), electrical conductivity, or osmotic pressure. Where seawater is known to be the major source of salt, salinity is often used to refer to the concentration of chlorides in the water.

**SAWPA:** Santa Ana Watershed Project Authority.

**SCADA** Supervisory Control and Data Acquisition

**SCAP** Southern California Alliance of Publicly. Newly formed group of public agencies seeking reasonable regulation of sewer industry.

**SCH** State Clearing House – Environmental Review/Processing

**Seasonal storage:** A three-part program offered by Metropolitan Water District of Southern California:

**STSS (Short Term Seasonal Storage)** financially encourages agencies with local groundwater production capabilities to produce a higher percentage of their demand in the summer from their local groundwater supplies, thus shifting a portion of their demand on the MWD system from the summer to winter;

**LTSS (Long Term Seasonal Storage)** financially encourages retail agencies to take and store additional amounts of MWD water above their normal annual demands for later use; Replenishment Water provides less expensive interruptible water that is generally available and used to increase the operating yield of groundwater basins.

**Seawater intrusion:** The movement of salt water into a body of fresh water. It can occur in either surface water or groundwater basins.

**Seawater barrier:** A physical facility or method of operation designed to prevent the intrusion of salt water into a body of freshwater.

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**Secondary treatment:** The biological portion of wastewater treatment which uses the activated sludge process to further clean wastewater after primary treatment. Generally, a level of treatment that produces 85 percent removal efficiencies for biological oxygen demand and suspended solids. Usually carried out through the use of trickling filters or by the activated sludge process.

**Sedimentation:** The settling of solids in a body of water using gravity.

**Settle:** To clarify water by causing impurities/solid material to sink to a container's bottom.

**Sewer:** The system of pipes that carries wastewater from homes and businesses to a treatment plant or reclamation plant. Sewers are separate from storm drains, which is a system of drains and pipes that carry rain water from urban streets back to the ocean. Overwatering your yard can also cause water to run into the streets and into storm drains. Storm drain water is not treated before it is discharged.

**SigAlert:** Any unplanned event that causes the closing of one lane of traffic for 30 minutes or more, as opposed to a planned event, like road construction, which is planned.

**SJBA** San Juan Basin Authority

**Sludge:** The solids that remain after wastewater treatment. This material is separated from the cleaned water, treated and composted into fertilizer. Also called biosolids.

**SOCWA** South Orange County Wastewater Authority. Regional Joint Powers Authority formed for collection and treatment of sewerage (previously known as AWMA/SERRA/SOCRA). SOCWA member agencies:

CSC – City of San Clemente

CSJC – City of San Juan Capistrano

CLB – City of Laguna Beach

ETWD – El Toro Water District

EBSD – Emerald Bay Service District

IRWD – Irvine Ranch Water District

MNWD – Moulton Niguel Water District

SCWD – South Coast Water District

SMWD – Santa Margarita Water District

TCWD – Trabuco Canyon Water District

**SRF** State Revolving Fund

**Storm Drain:** The system of pipes that carries rain water from urban streets back to the ocean. Overwatering your yard can also cause water to run into the streets and into storm drains. Storm drain

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water is not treated before it is discharged. Storm drains are separate from sewers, which is a separate system of pipes to carry wastewater from homes and businesses to a treatment plant or reclamation plant for cleaning.

**Storm flow:** Surface flow originating from precipitation and run-off which has not percolated to an underground basin.

**SWP:** State Water Project. An aqueduct system that delivers water from northern California to central and southern California.

**SWRCB** State Water Resources Control Board

**TDS:** Total dissolved solids. A quantitative measure of the residual minerals dissolved in water that remain after evaporation of a solution. Usually expressed in milligrams per liter.

**Tertiary treatment:** The treatment of wastewater beyond the secondary or biological stage. Normally implies the removal of nutrients, such as phosphorous and nitrogen, and a high percentage of suspended solids.

**THM:** Trihalomethanes. Any of several synthetic organic compounds formed when chlorine or bromine combine with organic materials in water.

**TMA:** Too many acronyms.

**TMDL:** Total maximum daily load; A quantitative assessment of water quality problems, contributing sources, and load reductions or control actions needed to restore and protect bodies of water.

**Transpiration:** The process in which plant tissues give off water vapor to the atmosphere as an essential physiological process.

**Turbidity:** Thick or opaque with matter in suspension; muddy water.

**Ultraviolet light disinfection:** A disinfection method for water that has received either secondary or tertiary treatment used as an alternative to chlorination.

**VE** Value Engineering

**VOC:** Volatile organic compound; a chemical compound that evaporates readily at room temperature and contains carbon.

**Wastewater:** Water that has been previously used by a municipality, industry or agriculture and has suffered a loss of quality as a result.

**Water Cycle:** The continuous process of surface water (puddles, lakes, oceans) evaporating from the sun's heat to become water vapor (gas) in the atmosphere. Water condenses into clouds and then falls back to earth as rain or snow (precipitation). Some precipitation soaks into the ground (percolation) to replenish groundwater supplies in underground aquifers.

**Water rights:** A legally protected right to take possession of water occurring in a natural waterway and to divert that water for beneficial use.

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**Water-use Efficiency:** The water requirements of a particular device, fixture, appliance, process, piece of equipment, or activity.

**Water year (USGS):** The period between October 1st of one calendar year to September 30<sup>th</sup> of the following calendar year.

**Watermaster:** A court appointed person(s) that has specific responsibilities to carry out court decisions pertaining to a river system or watershed.

**Water Reclamation:** The treatment of wastewater to make it suitable for a beneficial reuse, such as landscape irrigation. Also called water recycling.

**Watershed:** The total land area that from which water drains or flows to a river, stream, lake or other body of water.

**Water table:** The top level of water stored underground.

**WEF** Water Environment Federation. Formerly – Water Pollution Control Federation (WPCF). International trade group advising members of sewage treatment techniques and their effect on the environment.

**Weir box:** A device to measure/control surface water flows in streams or between ponds.

**Wellhead treatment:** Water quality treatment of water being produced at the well site.

**Wetland:** Any area in which the water table stands near, at, or above the land surface for a portion of the year. Wetlands are characterized by plants adapted to wet soil conditions.

**Xeriscape:** Landscaping that requires minimal water.