



California DRIP Collaborative

Roles and Responsibilities Workshop #1

Drought Resilience Interagency & Partners (DRIP) Collaborative

Wednesday, March 25, 2026

1:00PM - 4:30PM PT

Remote Participation (via Zoom)

Meeting Information

1. This meeting is being recorded for note taking purposes only.
2. This is a working meeting:
 - Your participation is important for our successful collaboration
 - This meeting does not require following BKA rules, but we are adhering to best practices
3. All participants are encouraged to keep their cameras on during the meeting to promote collaboration and discussion.
4. Please practice electronics courtesy and mute when not speaking.

Setting Commitment for Our Joint Work



- Whose perspective do you represent today?
- Why is it important for you to be part of this initiative work?

Setting Commitment for Our Joint Work



- Whose perspective do you represent today?
- Why is it important for you to be part of this initiative work?

Please enter response here:

<https://www.menti.com/aloy69sfzzyn>



menti.com
4884 2629

Roles and Responsibilities

Problem Statement: When domestic wells (DW) and state small water systems (SSWS) fail to provide safe drinking water, due to impaired water supply or quality, it impacts **Californians' Human Right to Water**. California currently lacks a comprehensive approach to address the urgent drinking water needs of households served by **failing DW and SSWS** and lacks a comprehensive policy for reducing the growth of dry DW and SSWS in the future.



2024 DRIP Collaborative Recommendation: Analyze and clarify the roles and responsibilities of State, local, and other entities in managing and coordinating **risk management efforts** to address **water supply losses and water quality issues** affecting private wells and SSWS.

This analysis should include:

- **Current Roles:** Assess existing responsibilities in managing domestic wells and SSWS across the drought-risk management cycle.
- **Identified Gaps:** Highlight inefficiencies in authority, funding, and coordination.
- **Gap Prioritization:** Focus on addressing the most critical gaps affecting drought resilience.
- **Proposed Solutions:** Provide recommendations for funding mechanisms and long-term planning to mitigate risks.

R&R Scoping



Human Right to Water: Every person in California has the right to safe, clean, affordable, and accessible water for drinking, cooking, and sanitation. The state must consider this right when making water policies and prioritize improving water access, especially for communities that lack reliable or safe drinking water.

→ What does this responsibility mean for state, local, NGOs, GSAs, water suppliers, and individuals?

Failing DW and SSWS: No clear definition but generally refer to the inability to supply safe water. Types of failing may be driven by

- Mechanical – pump failure, old well
- Hydrology – drought conditions
- Geology – subsidence, fractured rock
- Water quality - contaminants
- Demand – personal and competing uses

→ What other drivers may contribute to failing domestic wells and SSWS?

Framing the Vision for Roles and Responsibilities

Proposed vision statement:

Ensure that **all households** relying on domestic wells and state small water systems in California have **consistent reliable access** to **safe and sufficient drinking and sanitation water**, supported by a **comprehensive and coordinated statewide approach** to prevent, identify, and respond to failing wells.

Concepts to consider and define:

1. All households
2. Consistent reliable access
3. Safe and sufficient drinking and sanitation water
4. comprehensive and coordinated statewide approach

→ What else should be called out in the vision statement?



White Paper Development Process

PREPLANNING

- Identify individuals, organizations, and information resources to support topic development.
- Develop a draft vision and white paper outline to guide workshops discussions.

I. VISION FOR THE FUTURE

- Define the desired end state and the key questions to be addressed in the white paper.

Framing the Vision - Key Questions to Explore - White Paper Scope and Outline

II. UNDERSTANDING WHERE WE'RE AT

Establish a shared understanding of the current situation, experience, and capacity.

Current Conditions - Experience and Capacity

III. GAP ANALYSIS

Identify discrepancies between the current situation and the desired future vision.

Comparing Vision and Reality - Underlying Causes of Identified Gaps - Prioritizing Gaps

IV. LOOKING AHEAD

Identify practical pathways to move from current conditions toward the desired vision.

Opportunities for Progress - Barriers and Challenges - Proposed Next Steps

V. PUTTING IT ALL TOGETHER

Draft the white paper to document discussions, findings, and suggested next steps.

KEY QUESTIONS TO EXPLORE THROUGHOUT THE PROCESS



- 1. Responsible Parties**– Who are the relevant responsible parties when considering programs/initiatives to support DW and SSWS?
- 2. Existing Programs**– What are the current programs and initiatives that are relevant to supporting DW and SSWS?
- 3. Experience and Capacity** – What can be learned from existing programs and initiatives about what works and what is missing? What expertise, funding, and institutional support are available?
- 4. Comparing Vision and Reality** – What overlaps, inefficiencies, or gaps exist in governance or accountability? What is working well and should be leveraged?
- 5. Underlying Causes of Identified Gaps** – These may include policy or regulatory barriers, resource or funding limitations, institutional or communication breakdowns, and knowledge or data gaps.
- 6. Prioritizing Gaps and Opportunities for improvements** – Which gaps are most critical to address first? What dependencies or linkages exist among them?
- 7. Opportunities for Progress** – What promising new initiatives, partnerships, or policy shifts could support progress?
- 8. Barriers and Challenges** – What constraints or considerations must be addressed to advance these opportunities?
- 9. Proposed Next Steps** – How will new initiatives be evaluated to ensure progress toward the desired vision?



California

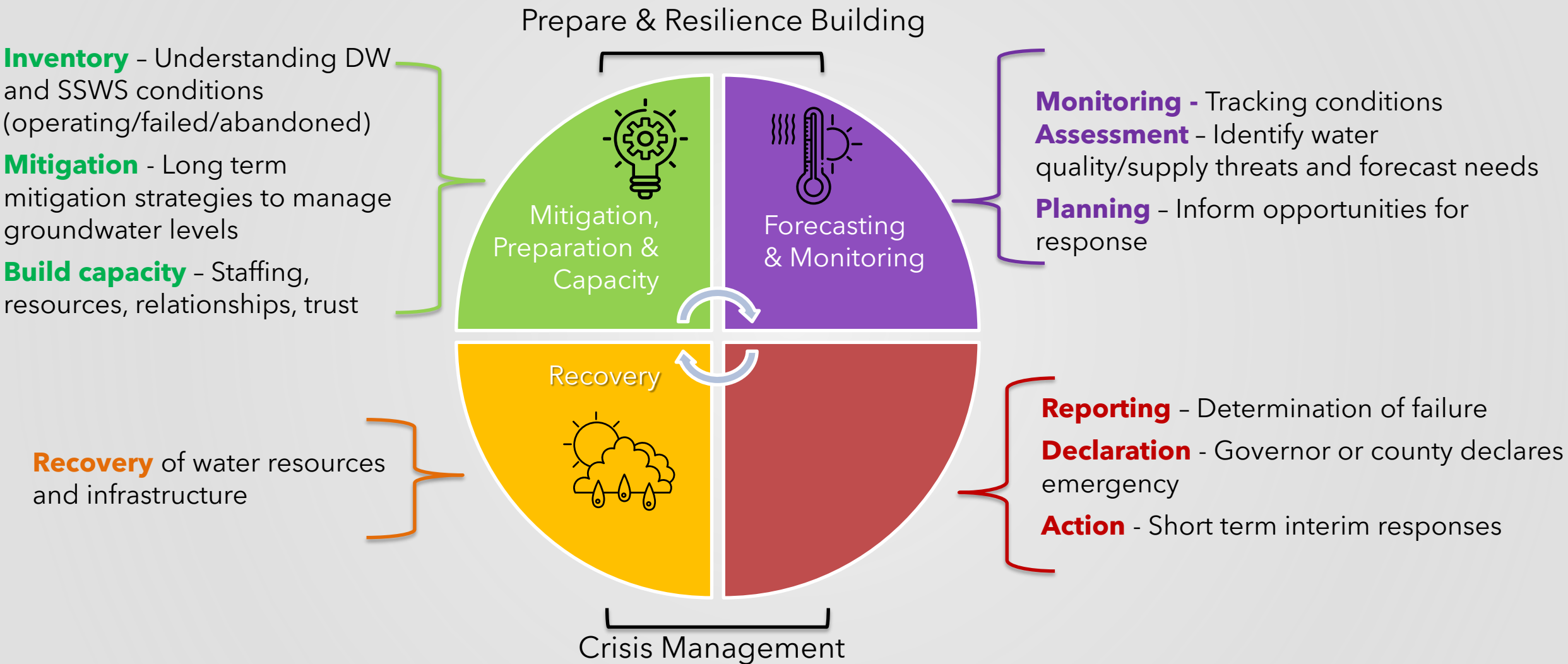
DRIP Collaborative

PROCESS GUIDING PRINCIPLES

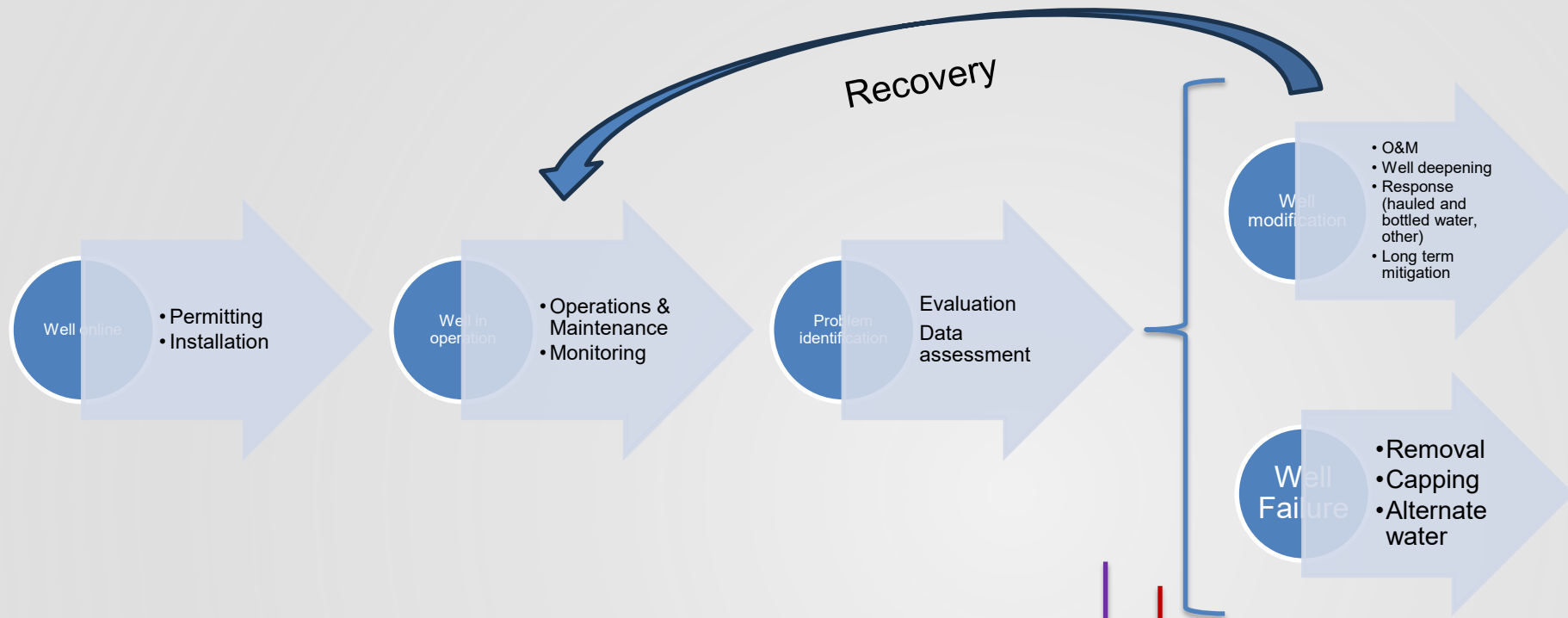
Aligning on current conditions: Taking time to work together to understand where we're at is a crucial step to making a meaningful progress. This means a commitment to

- ✓ **Examining the knowledge, expertise, experiences, and perspectives** that each participant brings.
- ✓ Intentionally leveraging these diverse viewpoints to refine our **collective understanding**.
- ✓ Developing a shared understanding **before moving forward in the problem-solving process**.
- ✓ Fully engaging with the **urgency of the problem** while ensuring solutions are informed, durable, and broadly supported.

Risk Management Cycle for DW and SSWS – Related Activities



Domestic Well and State Small Water System Lifecycle



Inventory – existing infrastructure

Assessment – identify water quality/supply needs

Planning – inform opportunities for response and long-term planning

Reporting – Dry wells are reported to my dry well DWR system

Declaration – Governor or county declares emergency

Action – Short term interim responses

Recovery of water resources and infrastructure

Mitigation – Long term mitigation actions to manage GW levels

- Julie Ekstrom , California Department of Water Resources - Water Justice Office
- Caryl Sheehan, State Water Board - Office of Sustainable Groundwater Management
- Hannah Romero, El Dorado Water Agency
- Tami McVay, Self Help Enterprises

SPOTLIGHT ON EXISTING PROGRAMS - PRESENTATIONS

Existing Programs that support Domestic Wells and SSWS

- ✓ Briefly share about a program that supports DW/SSWS
- ✓ Where along the risk management/life cycle does the program best fit?
- ✓ What is the program's impact?
- ✓ How does the program coordinate and align with related efforts to expand its impact?

DWR County Drought Planning Assistance Program

Building Capacity at Local-State to Improve Drought Resilience

Julie Ekstrom, DWR



CALIFORNIA DEPARTMENT OF
WATER RESOURCES

SB 552 (2021) Summary of Requirements

Small Water Suppliers*

- 1,000-2,999 connections + schools: Water shortage contingency plan (by July 2023)
- <1,000 connections: Drought assessment/element for 15-999 connections into Emergency Response Plan or Emergency Notification Plan
- All Small Suppliers: Supply conditions & production annual reporting
- All Small Suppliers: Drought resiliency standards – infrastructure upgrades

Counties

- Create a standing County Drought & Water Shortage Task Force for state smalls and domestic wells (or similar alternative)
- Develop County Drought Resilience Plan (including risk assessment) for state smalls and domestic wells in the county (or similar alternative)

State

- Water Shortage Vulnerability Tool (small suppliers, private supplied homes and state small systems 5-14 connections)
- Establish Standing Interagency Drought & Water Shortage Task Force (with local government and stakeholder membership)



**Includes community water systems serving less than 3,000 connections and 3,000 acre-feet. Includes non-transient, non-community water systems that are schools; excludes those covered under the requirements of Urban Water Management Plan 18*

County: Drought Resilience Plan

California Water Code Sec. 10609.70

Plan elements must include:

- Potential drought and water shortage risk
- Proposed interim and long-term solutions for state smalls and domestic wells in the county

Consider at a minimum:

- **Consolidations** for existing water systems and domestic wells
- **Domestic well drinking water mitigation programs**
- **Provision of emergency and interim drinking water solutions**
- An analysis of the **steps necessary to implement** the plan
- An analysis of **funding sources** available to implement the plan



County Drought Resilience Plan Guidebook

Task Force Formulation, Plan Development, and Implementation
Considerations for Implementing Senate Bill 552 (Hertzberg)

March 2023



California Department of Water Resources
Water Use Efficiency Branch

Guidebook developed by DWR with a 12-county workgroup: https://water.ca.gov/-/media/DWR-Website/Web-Pages/Programs/Water-Use-And-Efficiency/Urban-Water-Use-Efficiency/SB-552/DWR_Final_Guidebook_20230313_ADA_508_v5.pdf

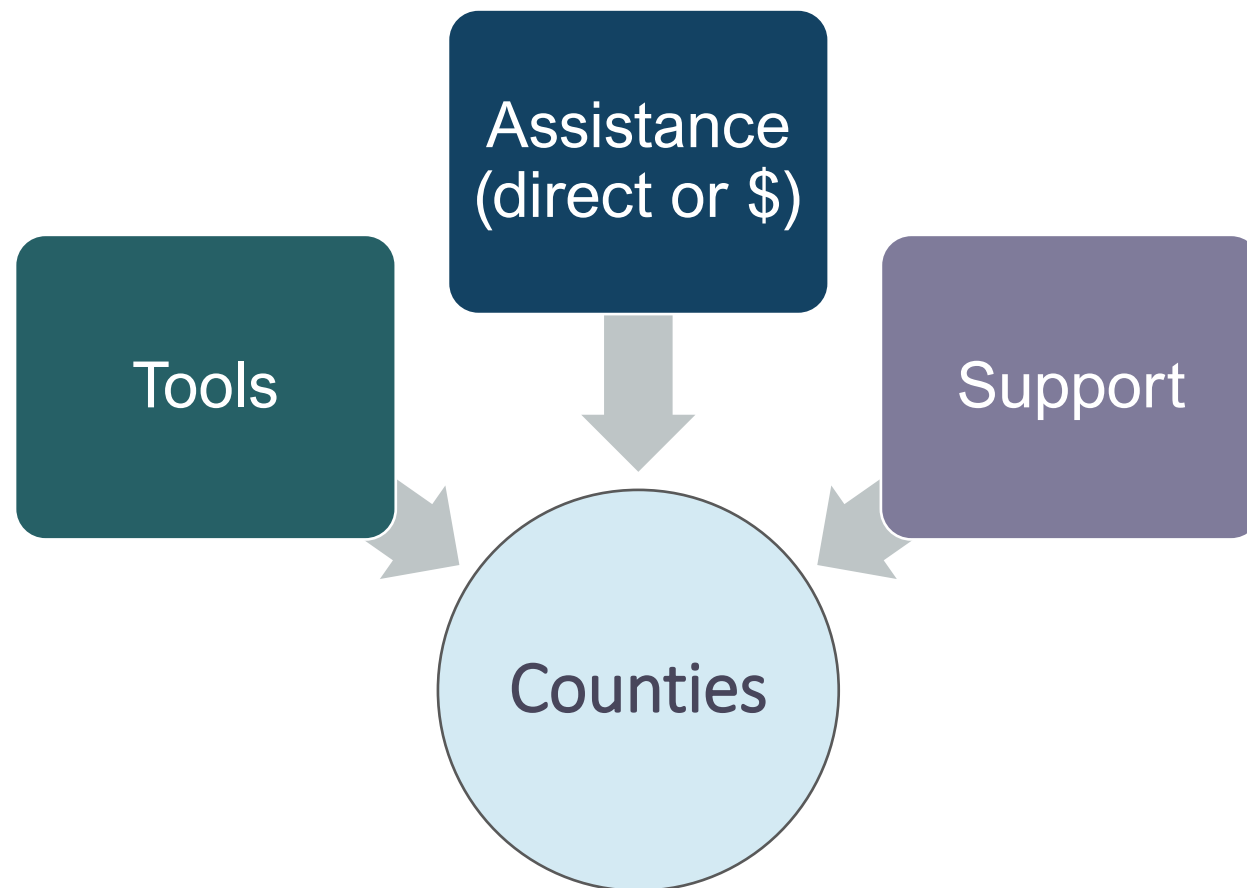


County Drought Resilience Planning Assistance

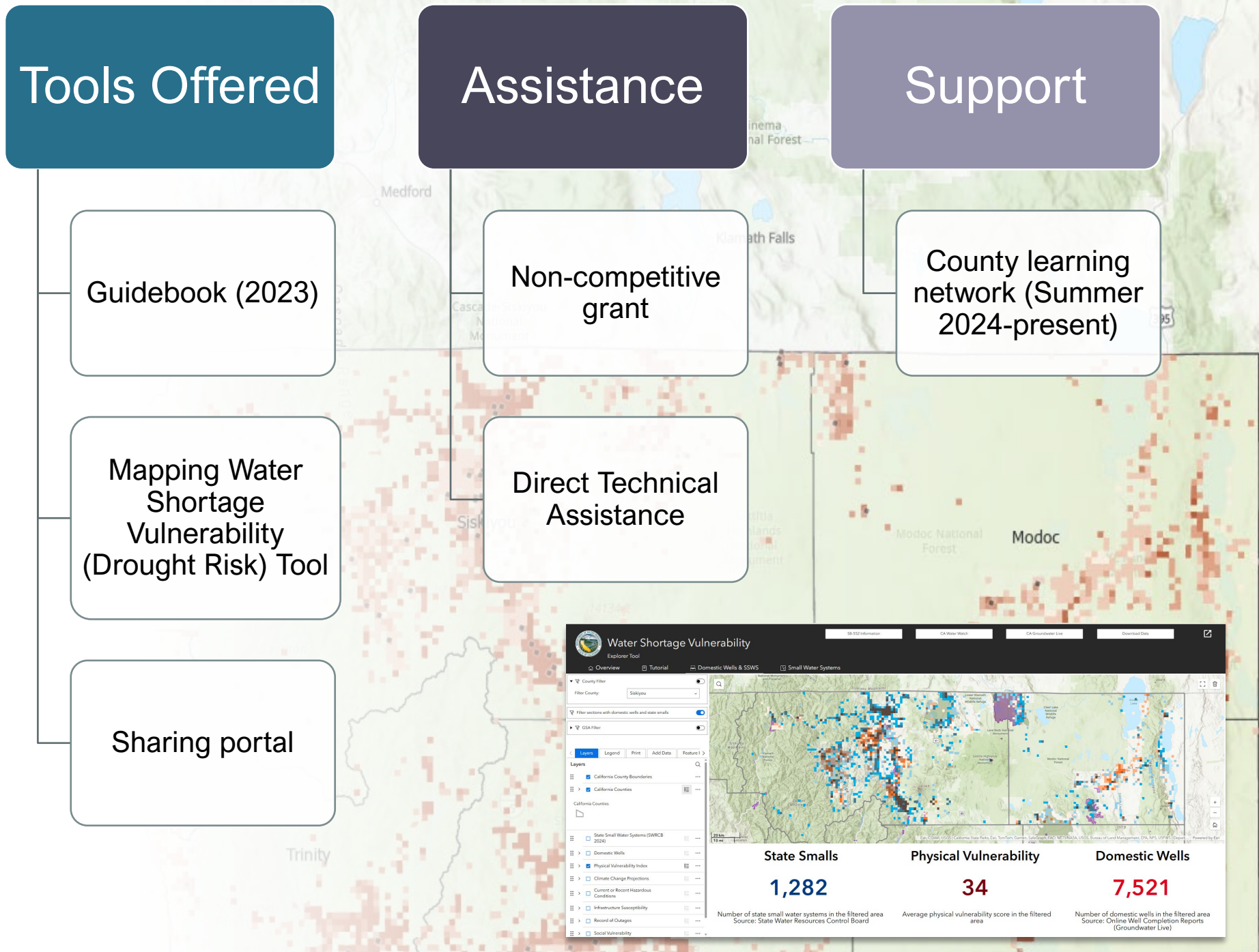
Program Purpose: Help counties get started on their SB 552 requirements

- Establish standing drought task force
- Develop drought resilience plan

Timeline: 2023-2026



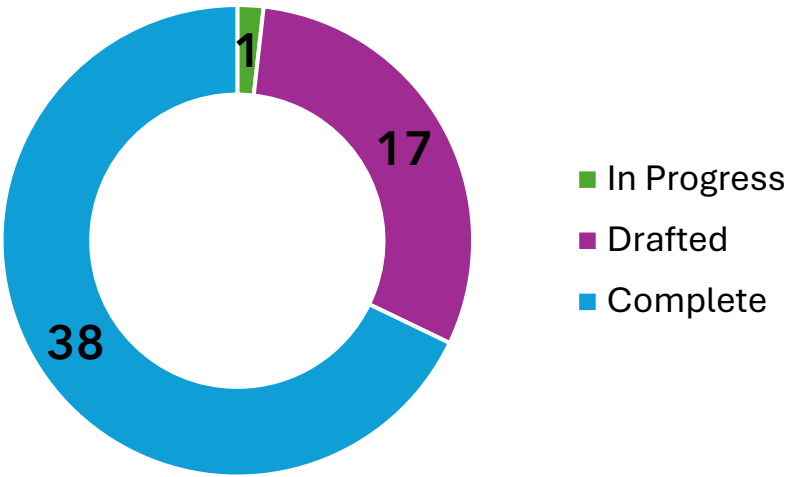
County Drought Resilience Planning Assistance Tools



Program Impact: County Task Forces & Plans

Program Component	%, # Counties Completed
Task Force Established	100%, 56
Risk Assessment	100%, 56
Response Actions & Mitigation Strategies	100%, 56
County Drought Resilience Plan	68%, 38

County Drought Resilience Plan Development



Source: 3/25/2026 data based on input from 56 counties enrolled in DWR’s assistance program. Exclusions: The City and County of San Francisco are covered by other requirements, and one has not enrolled in DWR’s assistance program.

Program Impacts

Short and Long Term Strategies



Standing Task Forces



Action/Strategy ID and Name	Priority	Status	Resource Requirement		
			Additional Staff Time	County Budget	External Funds
LTMS/A 09: Well Permitting Considering Future Growth	Long Term	Available	No	Yes	No
LTMS/A 10: County Planning Integration	Long Term	Proposed	Yes	Yes	No
LTMS/A 11: Well Permitting Considering Impacts to Other Groundwater Users	Near Term	In-Progress	Yes	Yes	No
LTMS/A 12: Regional Planning Integration	Near Term	Available	Yes	No	No
LTMS/A 13: Dry Well Abandonment	Mid Term	In-Progress	Yes	Yes	No
LTMS/A 14: State Small Water System Monitoring	Mid Term	Proposed	Yes	Yes	Yes
LTMS/A 15: Evaluate and Update Well Completion Report Administrative Record	Near Term	Proposed	Yes	No	Yes
LTMS/A 16: Database Management System	Near Term	Available	Yes	Yes	No
LTMS/A 17: Water Hauling, Bulk Water for Temporary Tanks	Near-Term	Available	Yes	No	Yes

Program Coordination & Alignment



DWR Sustainable GW Management Office (SGMO)



California State Association of Counties (CSAC)

- Cohost monthly webinars for counties



State Water Board SAFER

- SAFER Risk Assessment includes Water Shortage Vulnerability score
- Internal coordination

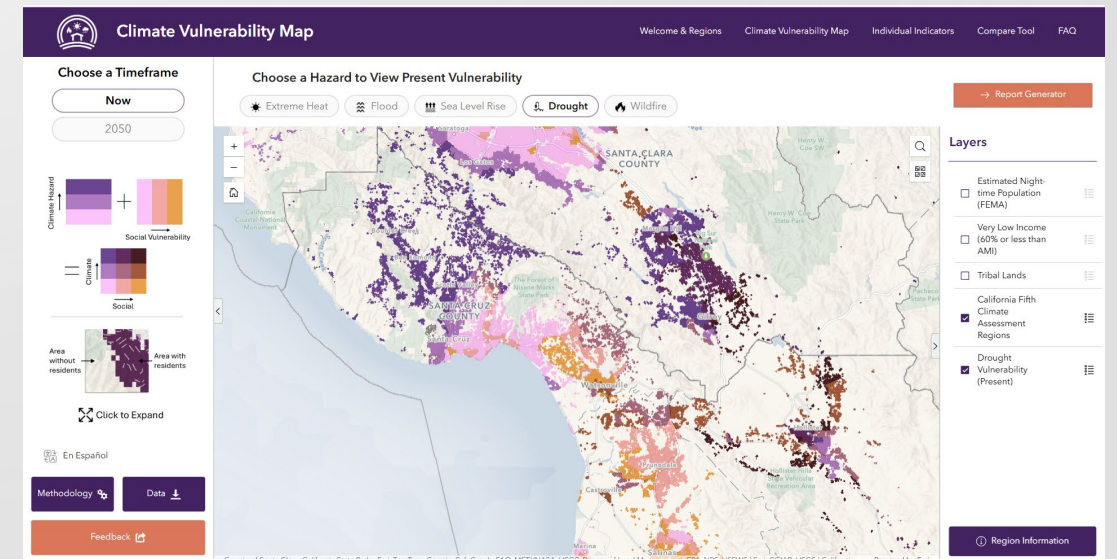
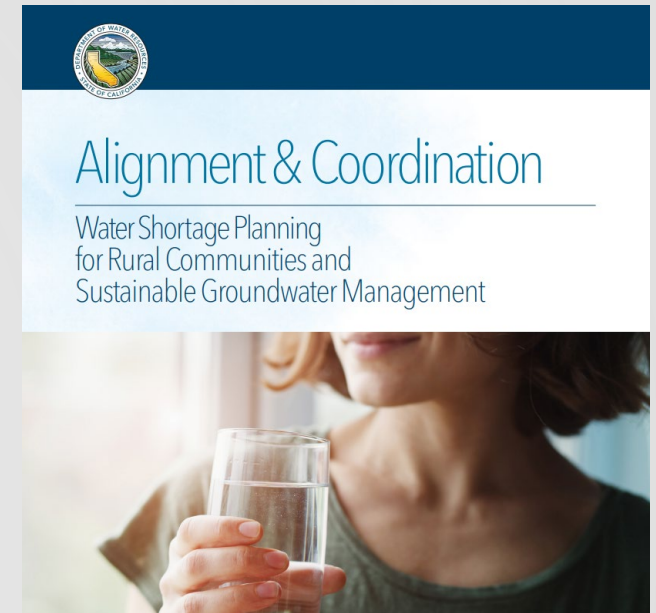


Land Use & Climate Innovation's (LCI)

- Integrate with Land Use Planning
 - General Plan Guidance Update, opt. water element
- Fifth Climate Change Assessment
- Vulnerable Communities Platform



CALIFORNIA DEPARTMENT OF
WATER RESOURCES



Sustainable Groundwater Management Act

Well Mitigation



California
DRIP Collaborative
March 25, 2026

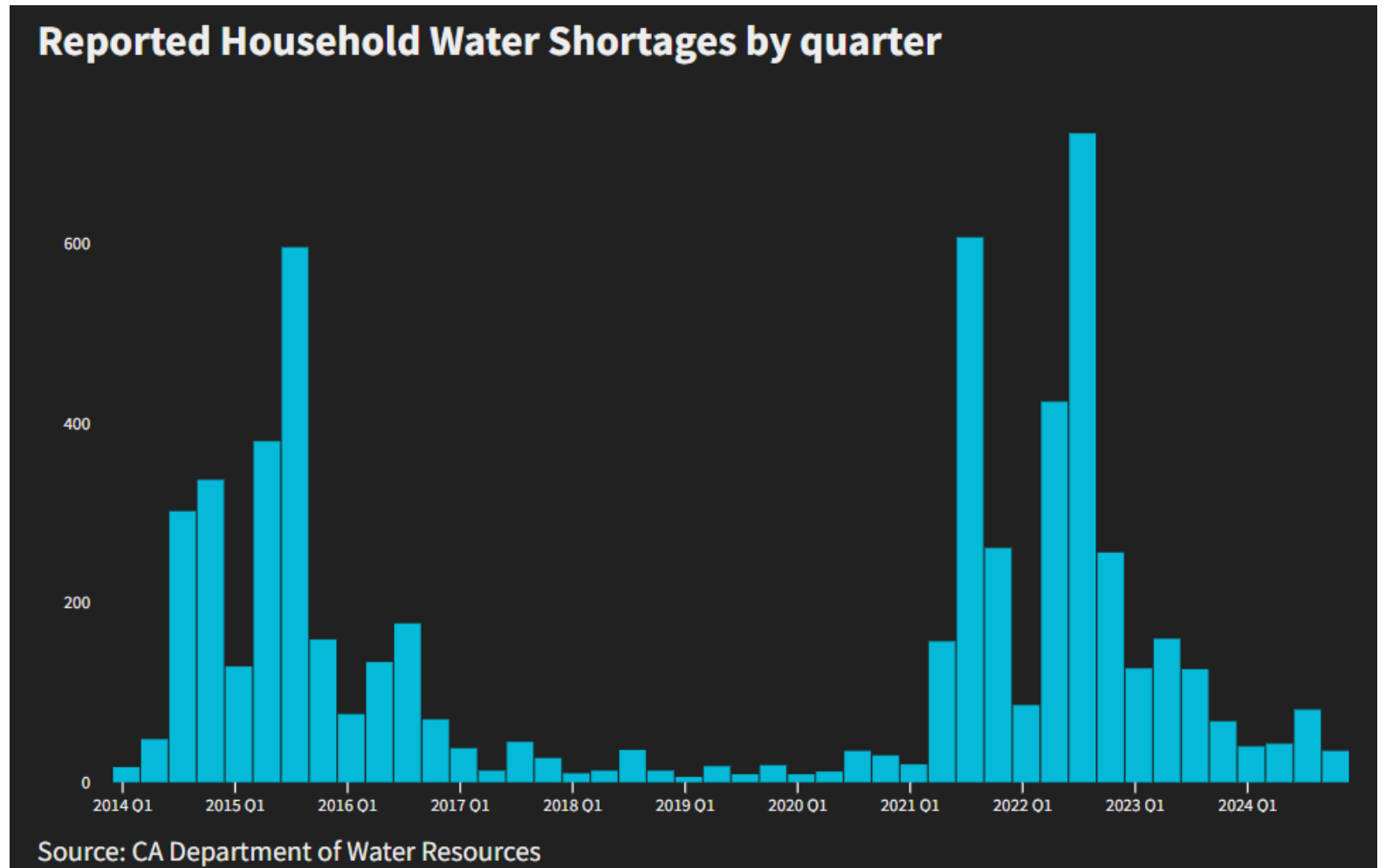


Office of Sustainable Groundwater Management

**OSGM staff
implements the
Water Board's
role under
SGMA**



GSAAs must prepare for a hotter, drier future by effectively implementing SGMA to prevent dry drinking water wells and mitigate when impacts are significant and unreasonable.



GSAAs are building stronger partnerships with NGOs and community groups to develop coordinated drinking water well mitigation plans.



Spotlight: Kaweah Subbasin's inclusive engagement in developing mitigation programs



GSA's are broadening mitigation efforts while partnering with emergency responders and well testing to support well owners in crisis.



Key Components of a Successful Plan include wide eligibility and funding to support the program



Identify the number of drinking water wells (domestic and other) that could go dry each year until 2040.



Develop a fund or reserve to cover the costs.

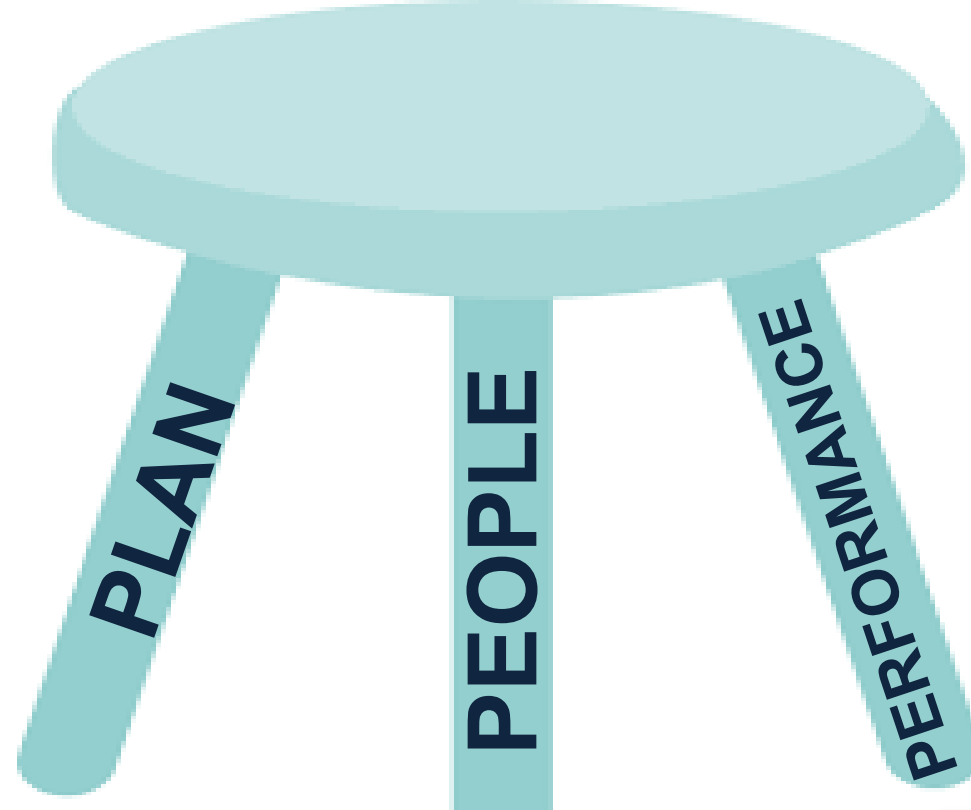


Define eligibility, decision processes, and appeal process.



GSAs that contract with Self-Help Enterprises must reimburse Self-Help Enterprises (not rely on state funding).

Successful mitigation programs are built on three foundational aspects



Mitigation plans are necessary to minimize impacts to wells and infrastructure now as the subbasins move toward sustainability by 2040.

Collaboration is critical to achieve SGMA's goals.

As these are implemented, there is still room for continuous improvement.

Office of Sustainable Groundwater Management

SGMA@waterboards.ca.gov

www.waterboards.ca.gov/sgma



El Dorado County Drought and Water Shortage Resilience: DRIP Roles & Responsibilities Workshop

March 25, 2026

Hannah Romero, Water Resources Principal



Background

- El Dorado County has unique conditions as a rural foothill county
- Still in recovery from catastrophic wildfires (i.e., 2021 Caldor Fire, 2022 Mosquito Fire)
- Facing severe threats of future wildfires and associated impacts
- The West Slope and the Tahoe Basin each have different vulnerabilities
 - For example, fractured rock in the West Slope and more Disadvantaged Communities in the Tahoe Basin



El Dorado County Drought and Water Shortage Resilience Plan (CDRP)

- El Dorado Water Agency actively participated in the County Drought Advisory Group (CDAG) formed in 2018 in response to AB 1668 and SB 606
- CDRP development funded with DWR grant and finalized in May 2025
- Extends beyond SB552 requirements to include all small water systems – 136 total
- Includes over 3,000 domestic wells with locally available data
- Incorporates statewide datasets, local data sources, and input from small water systems



Drought and Water Shortage Task Force

Core Members

El Dorado
Water Agency

County of El Dorado
(EMD, OES, DPH)

Advisory Members

Cities

County of El Dorado
(Planning & Building)

Small Water
Systems

Public Water
Purveyors

Local Farm Bureau

El Dorado County
Office of Education

Local Tribe

Groundwater
Sustainability
Agency





Roles and Responsibilities

El Dorado Water Agency

- Countywide water resources planning agency
- CDRP development lead and Task Force convenor through an MOU with the County

County of El Dorado, Environmental Management Department

- Local Primacy Agency for small water systems
- Well permitting and enforcement





Alignment with Related Planning Efforts

Agency-led Plans

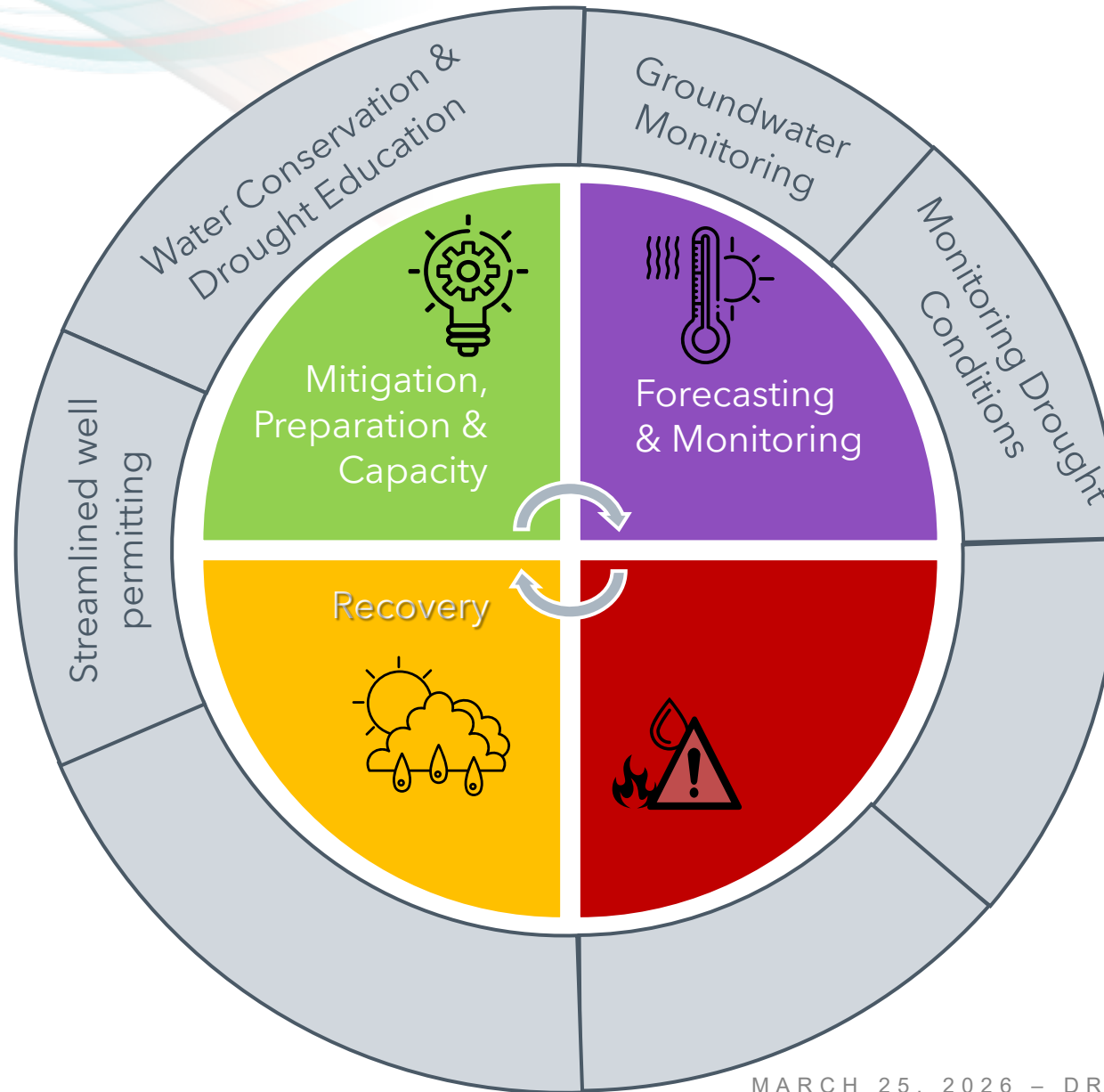
- Water Resources Development & Management Plan
- Strategic Plan
- Upper American River Basin Regional Drought Contingency Plan

County-led Plans

- General Plan
- Multi-Jurisdictional Hazard Mitigation Plan
- Climate Vulnerability Assessment



Examples of CDRP Implementation Actions



CDRP Impacts

- This collaborative process has strengthened partnerships, aligned related planning efforts, and helped organize and prioritize key implementation actions.
- While our planning helped incorporate our unique conditions, typical solutions are often not possible here (e.g., physical consolidation) and create a regulatory burden that our rural systems cannot take on.
- Additional funding and resources are needed to further on-the-ground implementation, yet many vulnerable communities are not currently eligible for existing funding opportunities.





Self-Help Enterprises

8445 W. ELOWIN COURT, VISALIA CA 93291 (559) 651-1000

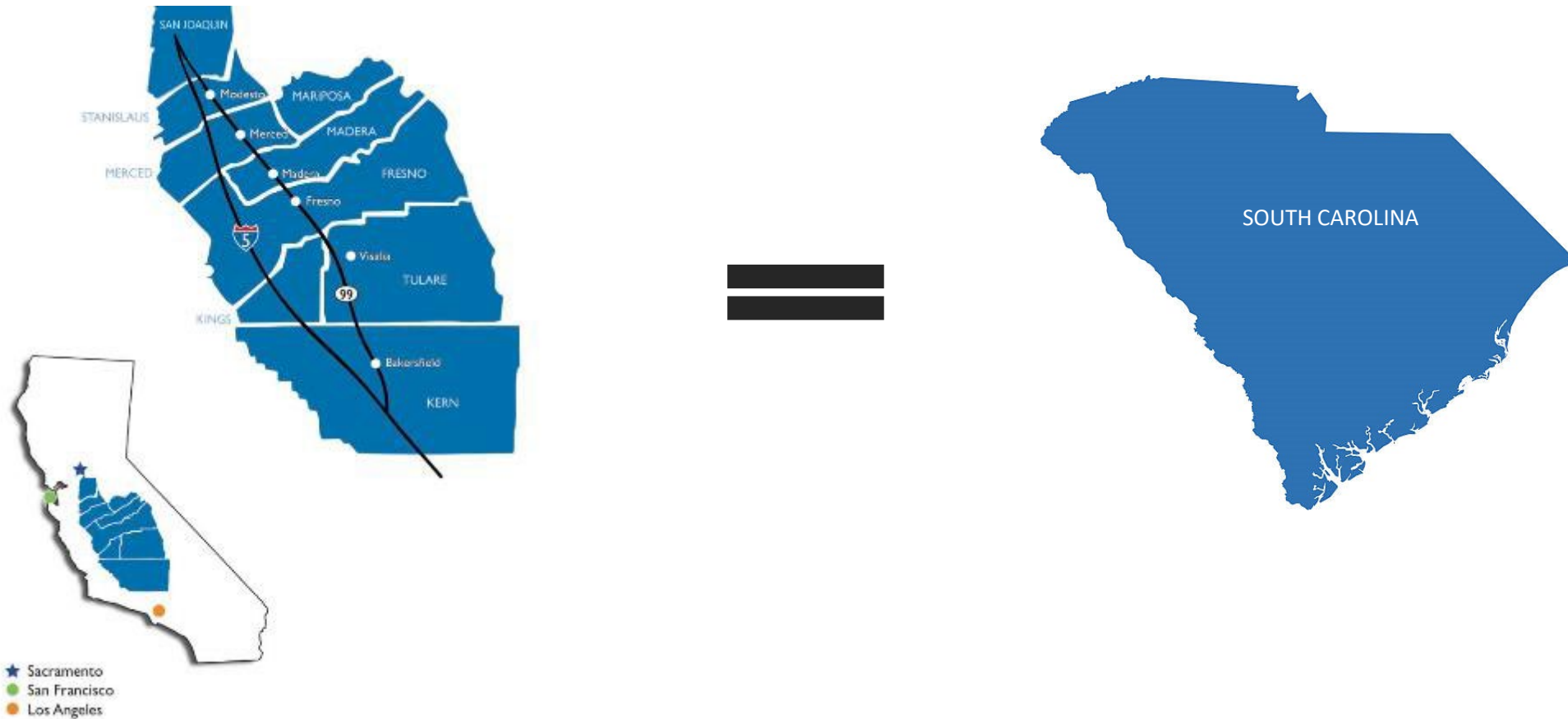
WWW.SELFHHELPENTERPRISES.ORG

EQUAL HOUSING OPPORTUNITY • SE HABLA ESPAÑOL

ENGLISH TTY (800) 735-2929 • SPANISH TTY: (800) 855-3000

Self-Help Enterprises is a non-profit organization dedicated to improving the living conditions of low-income residents and has been serving the Central San Joaquin Valley since 1965.

Service Territory – 29,000 mi²





First Contact

EMERGENCY SERVICES



Bottled Water Storage and Logistical Deployment

- Receive bottled water deliveries, up to 20 pallets at a time
- Field Technicians and Supervisors are forklift certified
- With the Coordination of the Bottled Water Team, we can deploy multiple teams to deliver bottled water to communities, individual homes, and special events/projects



Tank and Hauled Water Program

INTERIM SOLUTIONS

Community Water System Outages

Services Provided:

- Storage Tanks & Installation
- Hauled Water
- Urgent Bottled Water Distribution

Communities Currently Receiving Assistance:

- Tooleville
- Seville
- Tillie Creek
- Ridgecrest
- Spring Mountain



Community Response Steps

1. Coordinate with all parties involved (State Water Board and Community Development)
2. Identify the nature of the emergency (water deliveries to existing tank, bottled water, installation of larger tank, etc..)
3. Coordinate internally for logistical deployment of urgent bottled water distribution
4. Identify a water source for hauled water
5. Arrange for on-going support by securing a water hauler who will make ongoing deliveries until permanent solution is reached
6. Collaborate with others to secure a permanent solution plan



Field Team

EMERGENCY RESPONSE & INTERIM
SOLUTIONS

Field Team Activities



Well Assessment (Single Homes & Community Wells)



Tank Inspections (Weatherization & Repairs)



Post Tank Installation Inspections



Bottled Water Storage and Logistical Deployment



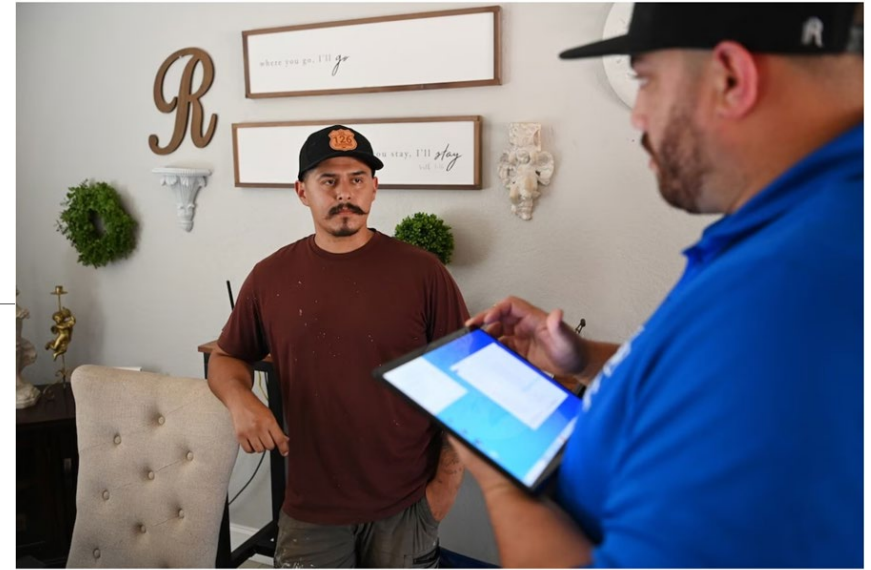
Community Bottled Water Deliveries



Emergency Response (EOS & LISTOS)

Well Assessments

- Appointments are scheduled by the Intake Team
- Field Technicians make contact with Participants
- Participant qualification and documentation are collected
- Inspection of well and well sounding takes place
- Assessing Well Sustainability
- Pictures are taken of the property and well site to determine Tank & Pump System placement
- Full Well Assessment Reports are submitted for approval
- 30 gallons of water are dropped off as part of the 72-hour response efforts



Salvador Ruiz, left, talks to Rubio of Self-Help Enterprises. Ruiz qualified for water deliveries because his family's well was dry. (Matt McClain/The Washington Post)



Ivan Rubio of Self-Help Enterprises checks the water level of a well at a home. (Matt McClain/The Washington Post)

Tank Inspections

- Post Tank Installation Inspections are scheduled to verify that Tank and Pump Systems are functioning properly and providing vital resources to our participants
- Tank Inspections are scheduled six (6) months after the initial approval and tank installation
- Weatherization of PVC and hose lines are installed to prevent lines freezing
- Weatherization of Tanks and PVC during extreme heat events



Domestic Water Well Repair, Replacement, and Connection Program

LONG-TERM SOLUTIONS

Quick Guide to Program Guidelines, Eligibility and Terms

Program Terms and Conditions

- Five Year unrecorded grant
- Maximum \$60,000 grant
- No payments or interest
- Grant may cover existing well repair or replacement, lateral connection to existing main for local water system and abandonment of existing well.

Property and Well Eligibility

- Located within service area (Fresno, Kings, Kern, Madera, Mariposa, Merced, San Joaquin, Stanislaus and Tulare Counties)
- Private Domestic Well Only
- Dry or unsustainable well as a result of drought
- Verifiable Title
- Well must be located on owner's parcel or proof of existing shared well agreement required
- Property must be currently occupied

Participant Eligibility

- Property Owner eligible (may be tenant occupied but owner must apply and qualify)
- Income may not exceed 80% MHI (based on 5-year average) OR
- Provide proof of eligibility in qualifying program (CARE, Medi-Cal, SNAP or TANF)
- Must retain ownership for five-year grant period

Process and Procedures

Phase 1: Application

- Submit complete application for review
- Complete and sign Income Self Certification Form
- Submit title documentation
- Certify and obtain verification property is not within existing water system sphere of influence and eligible for connection
- Submit a minimum of one complete estimate



Phase 2: Processing

- Inspection of well and vetting of submitted estimates
- Selection of well driller (for connections, selection of contractors)
- Completion of processing by SHE staff, notification of approval to participant
- Preparation of grant documents



Phase 3: Approval

- SHE grant approval review
- Grant document signing by participant
- Well driller signature on Terms of Award and final estimate
- Funding verification
- Ready to Go issued to driller



Phase 4: Well Construction

- Contractor will obtain permits and order materials needed
- Driller will schedule start date with participant
- SHE field staff will monitor well construction
- Upon completion testing will occur; filtration devices will be utilized as needed via our Water Quality Division
- Well monitoring device will be installed if participant authorized

Field Management – Construction/Repair Oversight

- Pre-Construction Well Assessment
- Complete vetting of estimates
- Job award oversight
- Coordinate on well construction and progress with driller
- Review and approve change orders during construction
- Act as an intermediary between driller and homeowner
- Complete final inspection upon well completion
- Verify water samples collected
- Review testing results and coordinate with driller and water quality team for potential filtration devices
- Complete final closeout of construction with driller





Water Quality Program

LONG-TERM SOLUTIONS

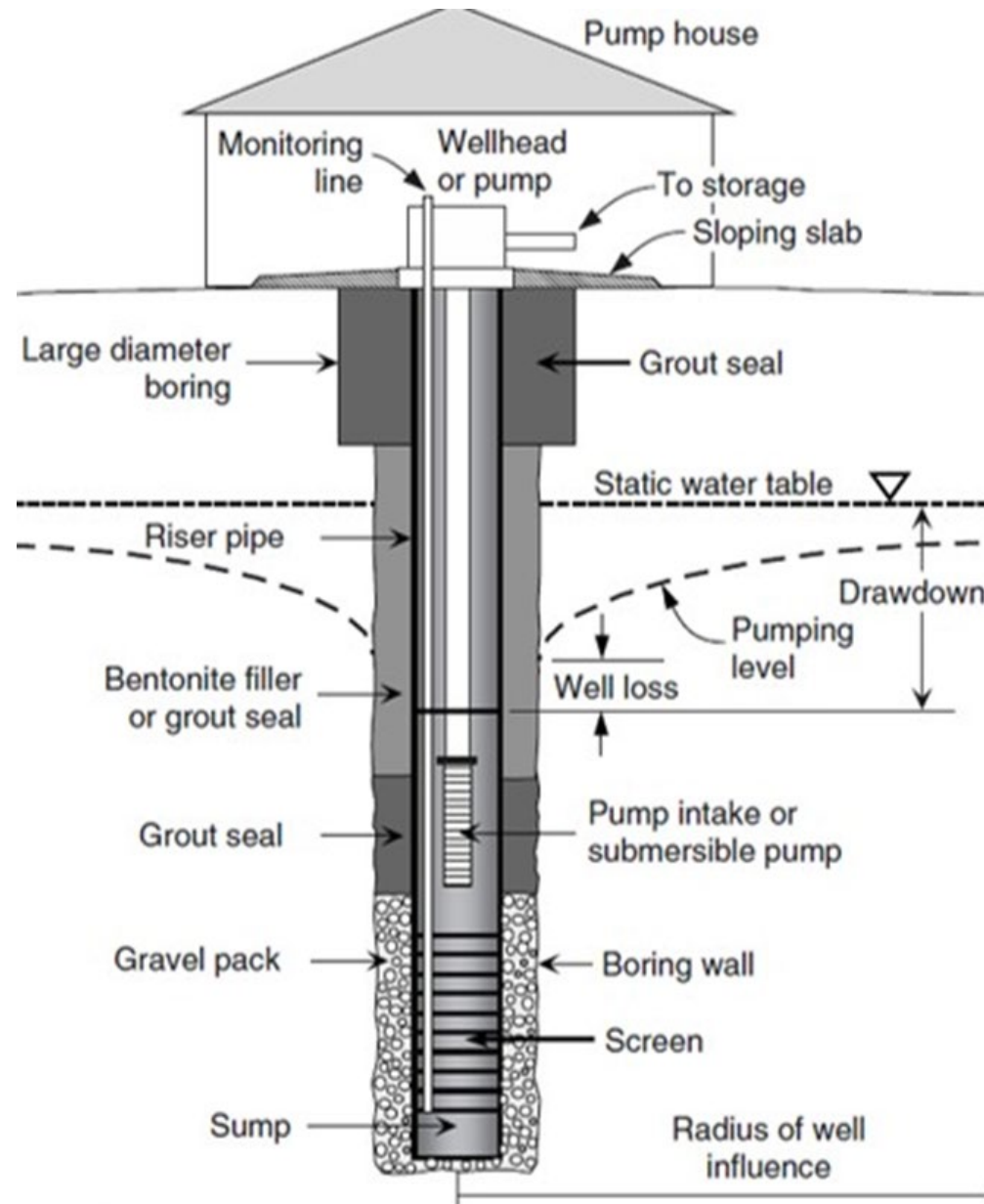
Water Quality Program Overview

- Conduct outreach to prospective disadvantaged households served by private wells or state small water systems
- Provide well assessment and sampling services
- Analyze testing results, determine any contamination issues
- Provide interim solutions including point of entry and/or point of use (POE/POU) filtration devices to households that have water quality issues
- Educate participants on water quality contamination, filter operation and maintenance

Water Quality Program Process

1. Participant intake, program qualification
2. Assess the private well, or state small water system
3. Identify potential point source contamination, check well for functionality, sound well depth, collect samples:

Total Coliform	Total Chromium	123TCP
E.coli	Lead	Uranium
Nitrate	Copper	Gross Alpha (Sierra Nevada Range only)
Perchlorate	EDB	Additional contaminants as deemed necessary
Arsenic	DBCP	
4. Review test results, determine if POE or POU is required
5. Oversee installation, conduct post water quality testing
6. Participant Education: contamination, well maintenance, filter O&M



Domestic Well Stewardship Program

EDUCATION

Funding for this project has been provided in full or in part under the Safe and Affordable Funding for Equity and Resiliency (SAFER) Drinking Water Program through an agreement with the State Water Resources Control Board. The contents of this document do not necessarily reflect the views and policies of the foregoing, nor does mention of trade names or commercial products constitute endorsement or recommendation for use.

TIME FOR Q&A

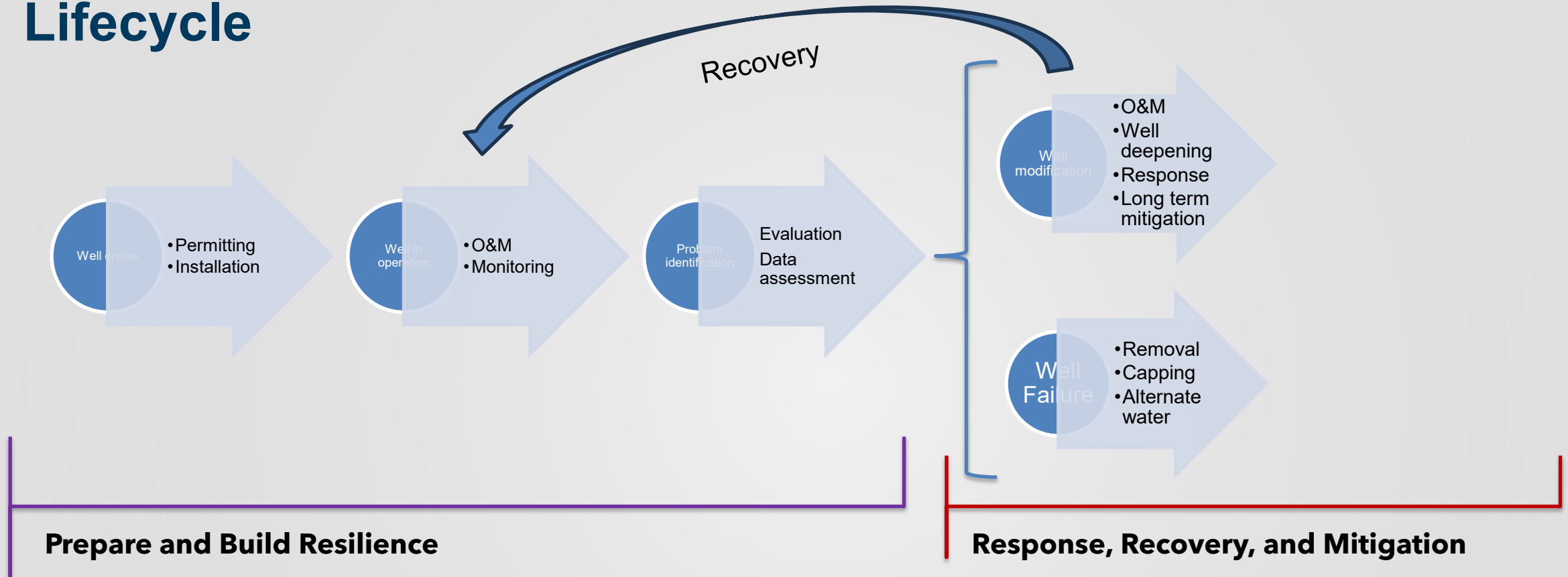




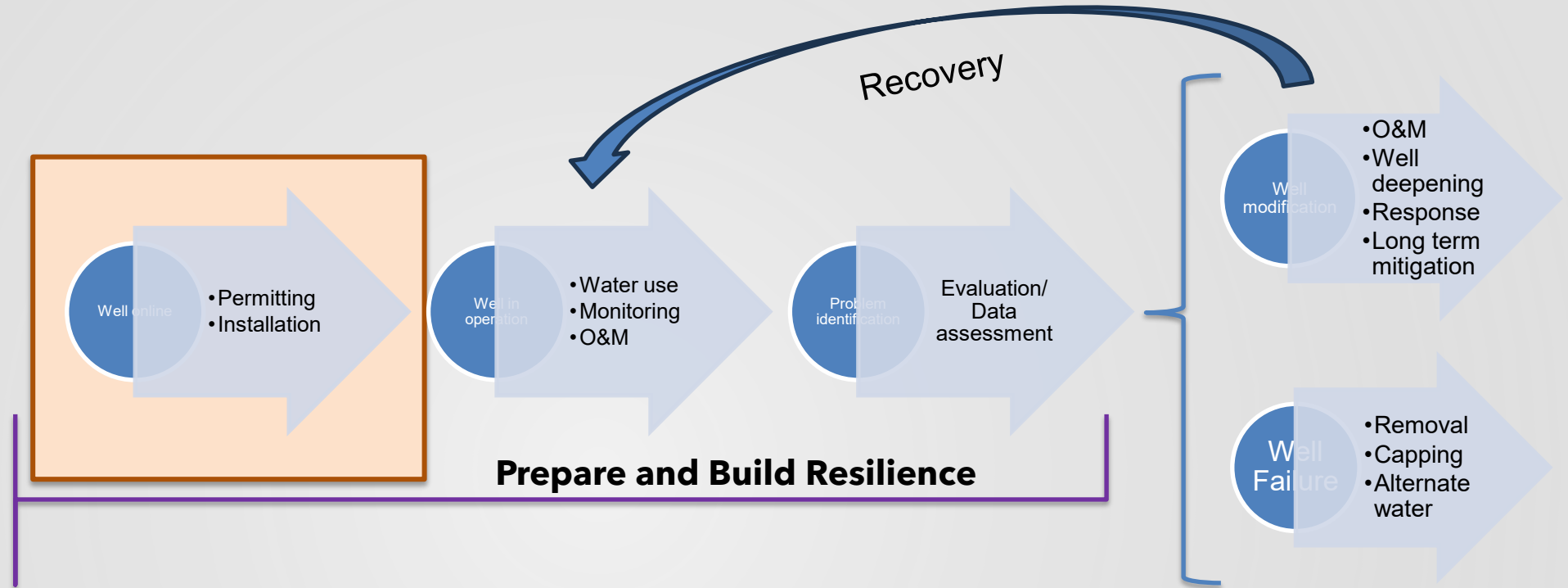
Purpose: You are invited to review and expand the list of programs that support DW/SSWS at different points of their life cycle. The goal is to identify additional programs, clarify their status, and note opportunities for coordination.

WORKING SESSION – PROGRAMS INVENTORY

Domestic Well (DW) and State Small Water System (SSWS) Lifecycle



DW and SSWS Lifecycle – Permitting and Installation



State (DWR)

- DWR Standards for Well Construction and Destruction
- Online System of Well Completion Reports database

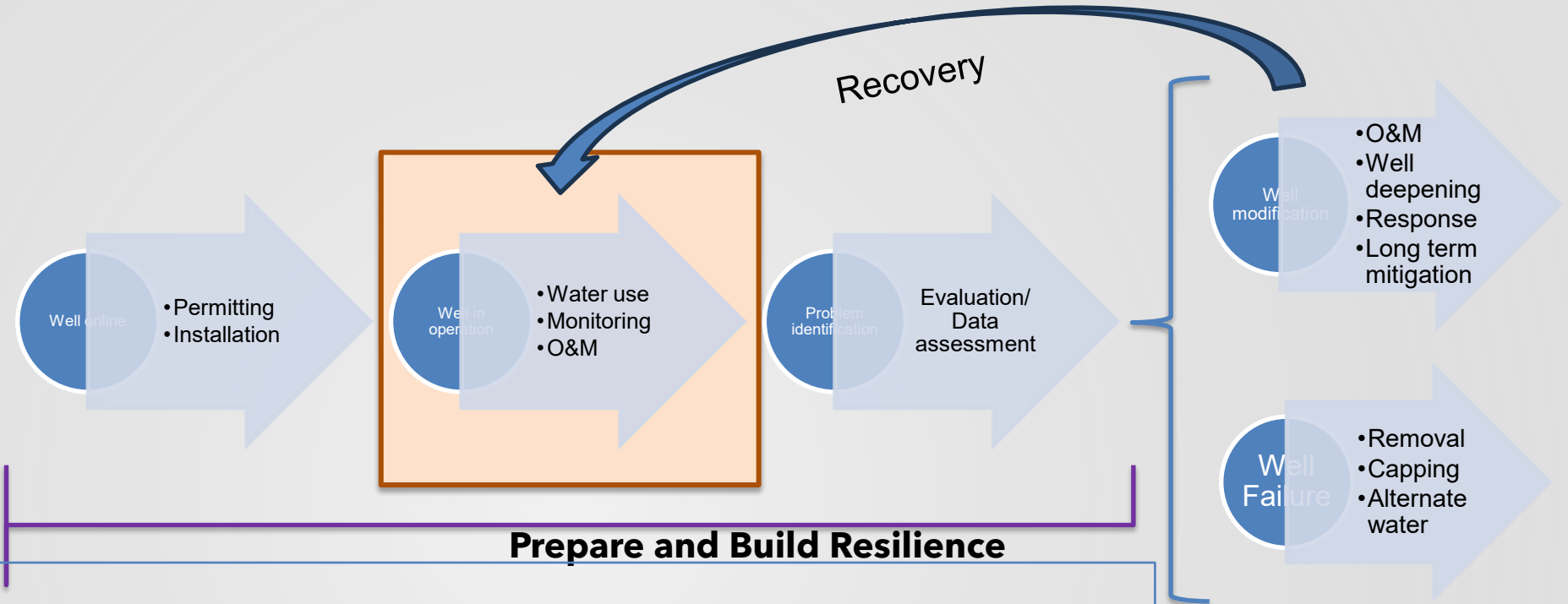
County/Local

- County Standards for Well Construction and Water Supply
- County Permit for installation, modification, or abandonment of wells
- Local ordinances for GSA validation, land use setback, CEQA, etc.

Others - Well Driller

- Driller completes well report

DW and SSWS Lifecycle – Operation and Monitoring



Federal (USEPA)

- EPA policy statement about domestic wells

State (DWR)

- Track dry well reports from domestic well users on publicly available database
- Maintain CASGEM and larger California's groundwater monitoring network
- Be Well Prepared campaign - Provide outreach and education campaign and materials for communicating about DW and groundwater

County

- Water quality testing for DW

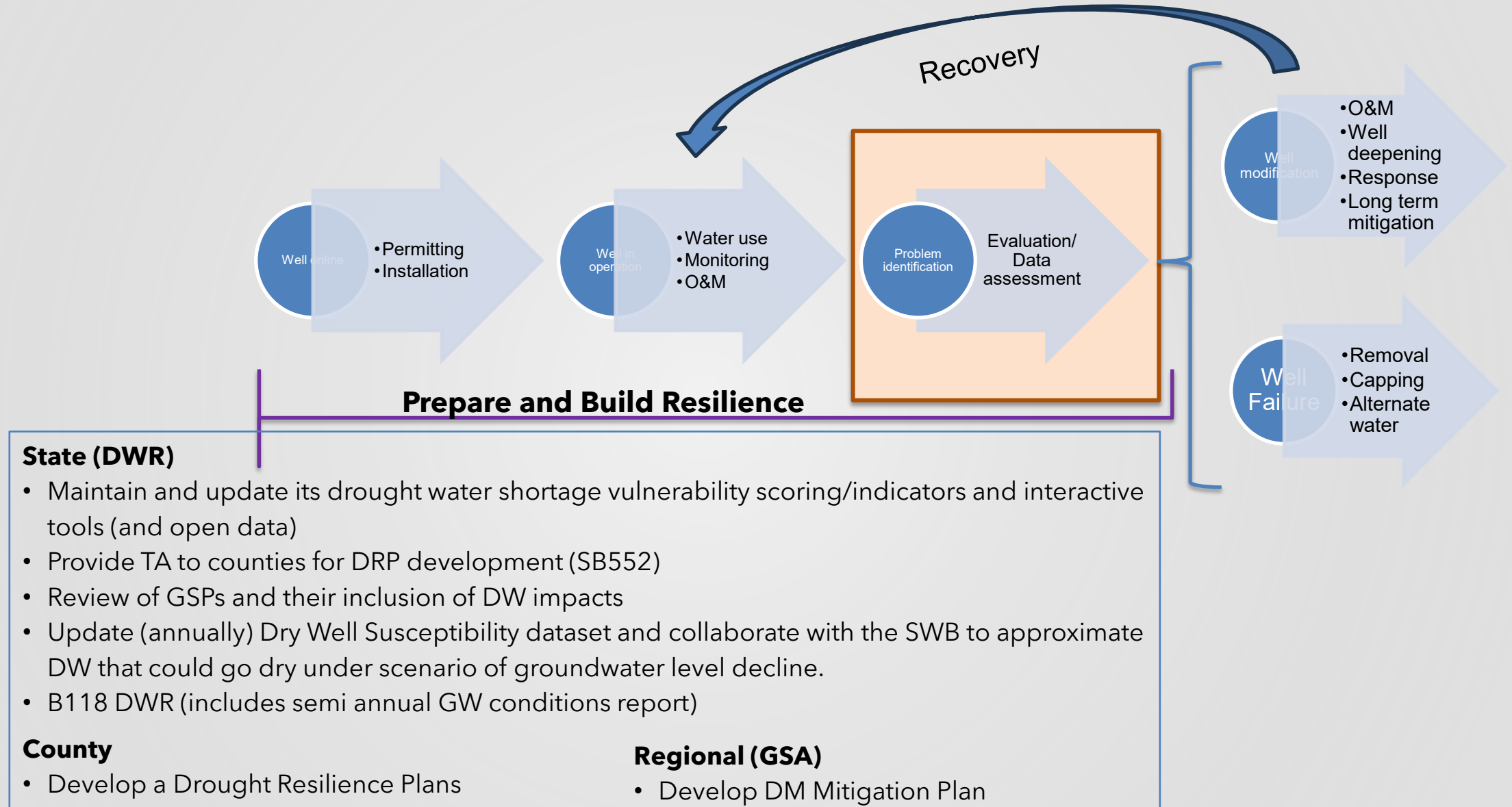
Landlords

- Test DW per State Primary Drinking Water Standard and report to residents

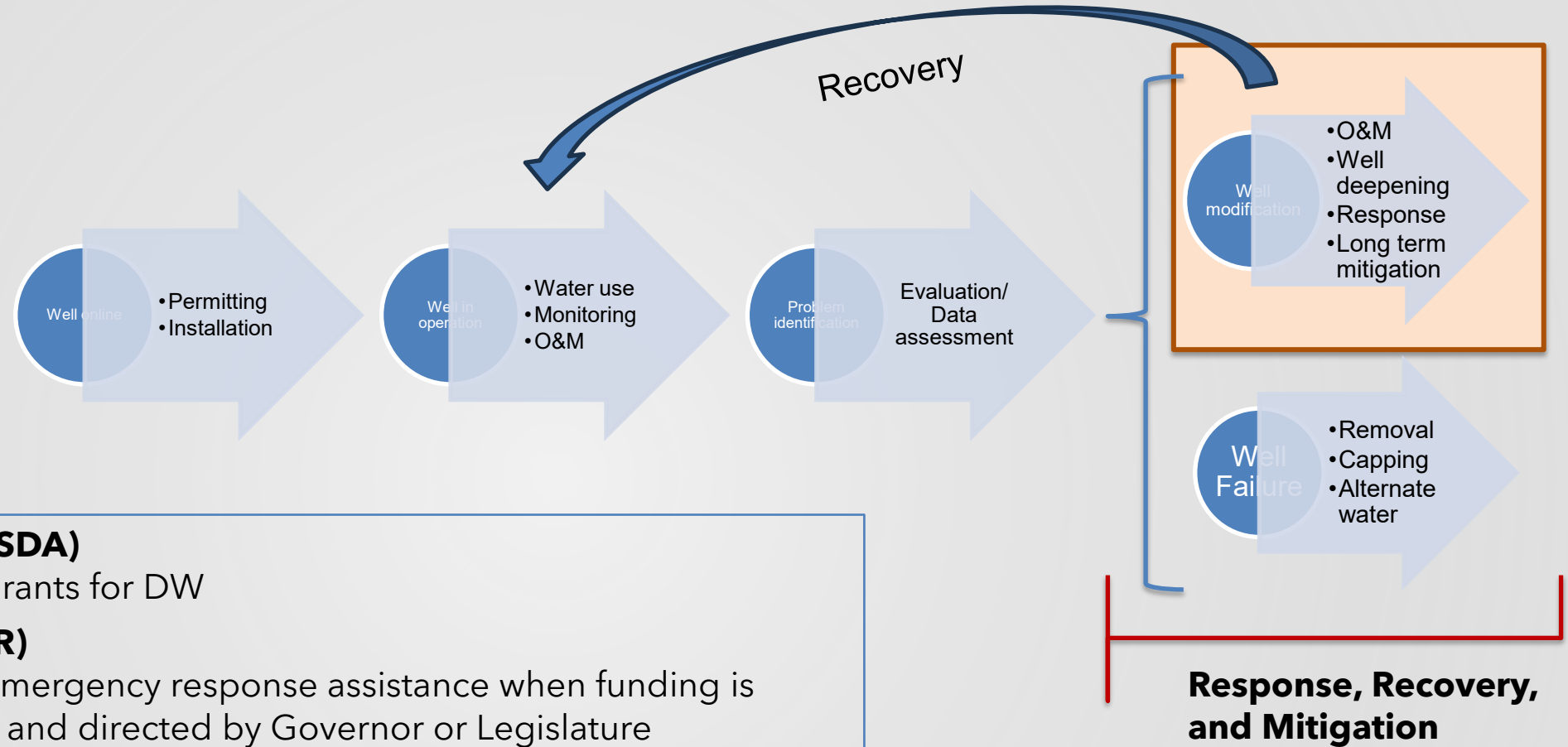
California

DRIP Collaborative

DW and SSWS Lifecycle – Evaluation and Assessment



DW and SSWS Lifecycle – Response and Mitigation



Federal (USDA)

- Provide grants for DW

State (DWR)

- Provide emergency response assistance when funding is allocated and directed by Governor or Legislature

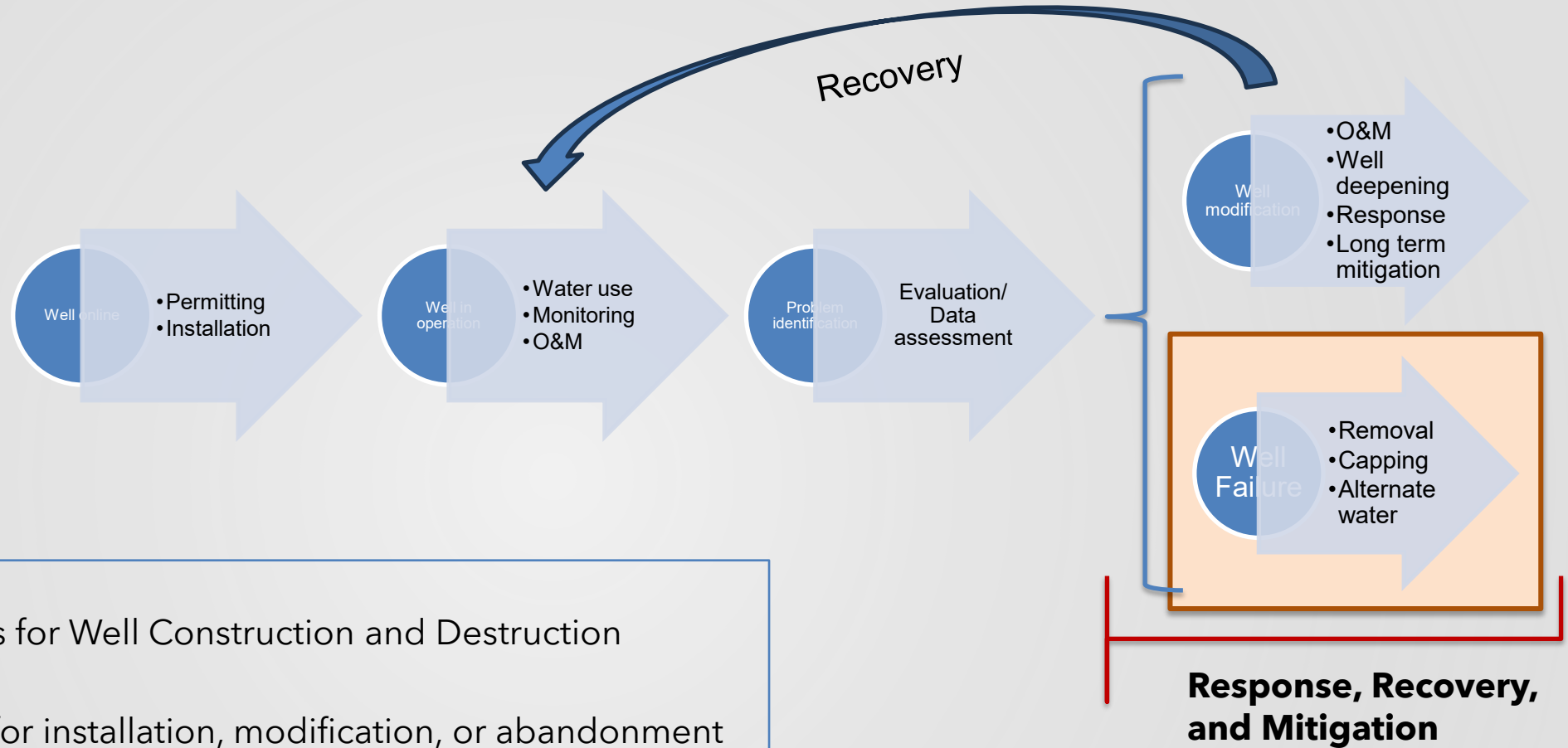
GSAs

- Mitigation programs for DW

County

- Water distribution

DW and SSWS Lifecycle – Well Failure



Existing Programs that support Domestic Wells

Breakout Discussions

Purpose: You are invited to review and expand the list of programs that support DW/SSWS at different points of their life cycle. The goal is to identify additional programs, clarify their status, and note opportunities for coordination.

1. **Permitting and Installation**
2. **Operation and Monitoring**
3. **Evaluation and Assessment**
4. **Response and Mitigation**

Working Session Instructions [35 minutes]

STEP 1. ROTATE THROUGH THREE BREAKOUT ROOMS: There are **four breakout rooms** that correspond to a specific stage in the DW/SSWS life cycle:

Permitting and Installation • Operation and Monitoring • Evaluation and Assessment • Response and Mitigation

STEP 2. CONTRIBUTE INFORMATION: For the phase identified, please review and add existing programs, initiatives, or resources to complete the list on the **shared Template document**

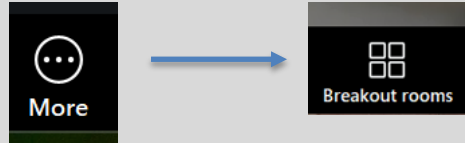
Include the following details if possible:

- 1) Program name, description, and responsible agency**
- 2) Program type** – Is it a statutory program or a gap-filling/support program?
- 3) Impact** – How does it relate to key aspects of the risk management cycle and data sharing
- 4) Coordination** – How does the program coordinate with other programs or initiatives?
- 5) Additional Information**

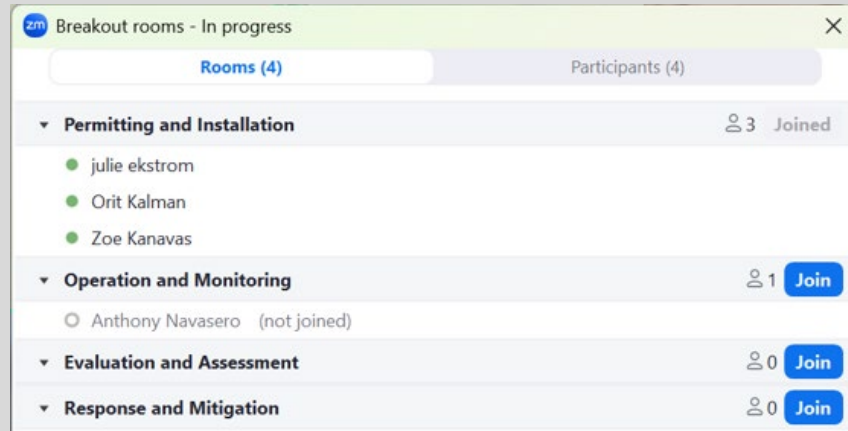
STEP 3. REPEAT: You have approximately **10 minutes in each breakout discussion** before moving to the next room. Please contribute as time allows and consider returning to the templates for additional input following the workshop.

Working Session Zoom Instructions

At the bottom of the screen – please find either MORE or BREAKOUT ROOM icon.



Use these to see the list and join a breakout rooms



Please spend time in rooms where you are:

- **Most engaged or knowledgeable**
- **Least engaged** (learning opportunity)
- **Somewhat engaged**

Note: The first round is randomly assigned. You get to move from one room to the next for rounds 2 and 3.

Existing Programs that support Domestic Wells

Key Takeaways from Discussion

- 1. Permitting and Installation**
- 2. Operation and Monitoring**
- 3. Evaluation and Assessment**
- 4. Response and Mitigation**

1. What are your overall impressions from this inventory exercise?
2. Where are efforts most/least concentrated across the lifecycle phases?
3. What are the clear opportunities to build on, better connect, or expand existing programs?

EVALUATION APPROACH

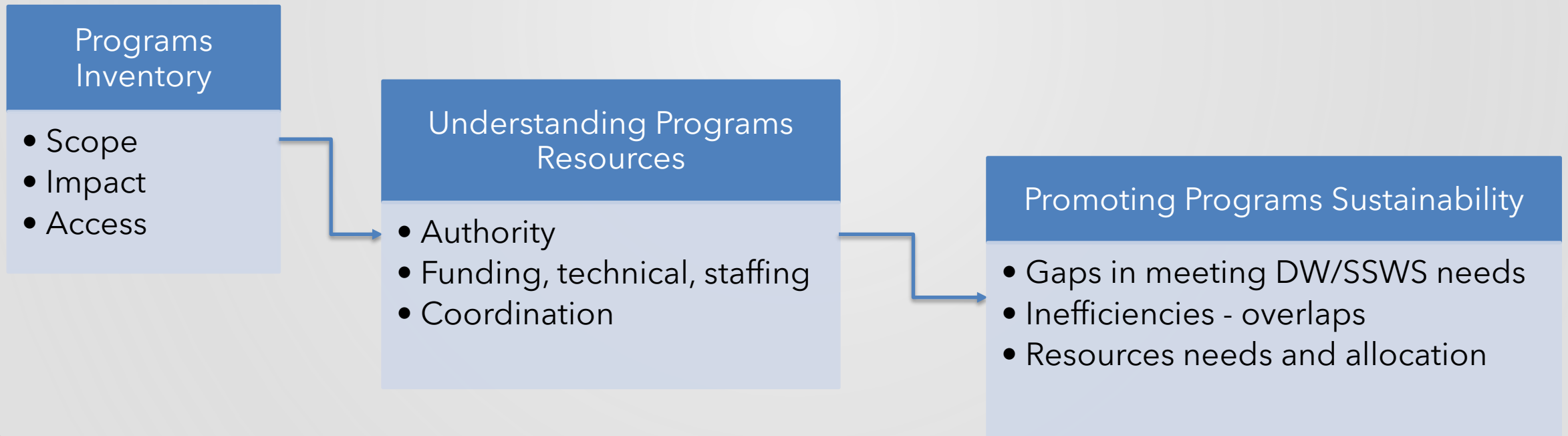
GETTING READY FOR WORKSHOP 2

Approach for R&R Evaluation

Identify Gaps and Opportunities for Improvements

Develop an approach to

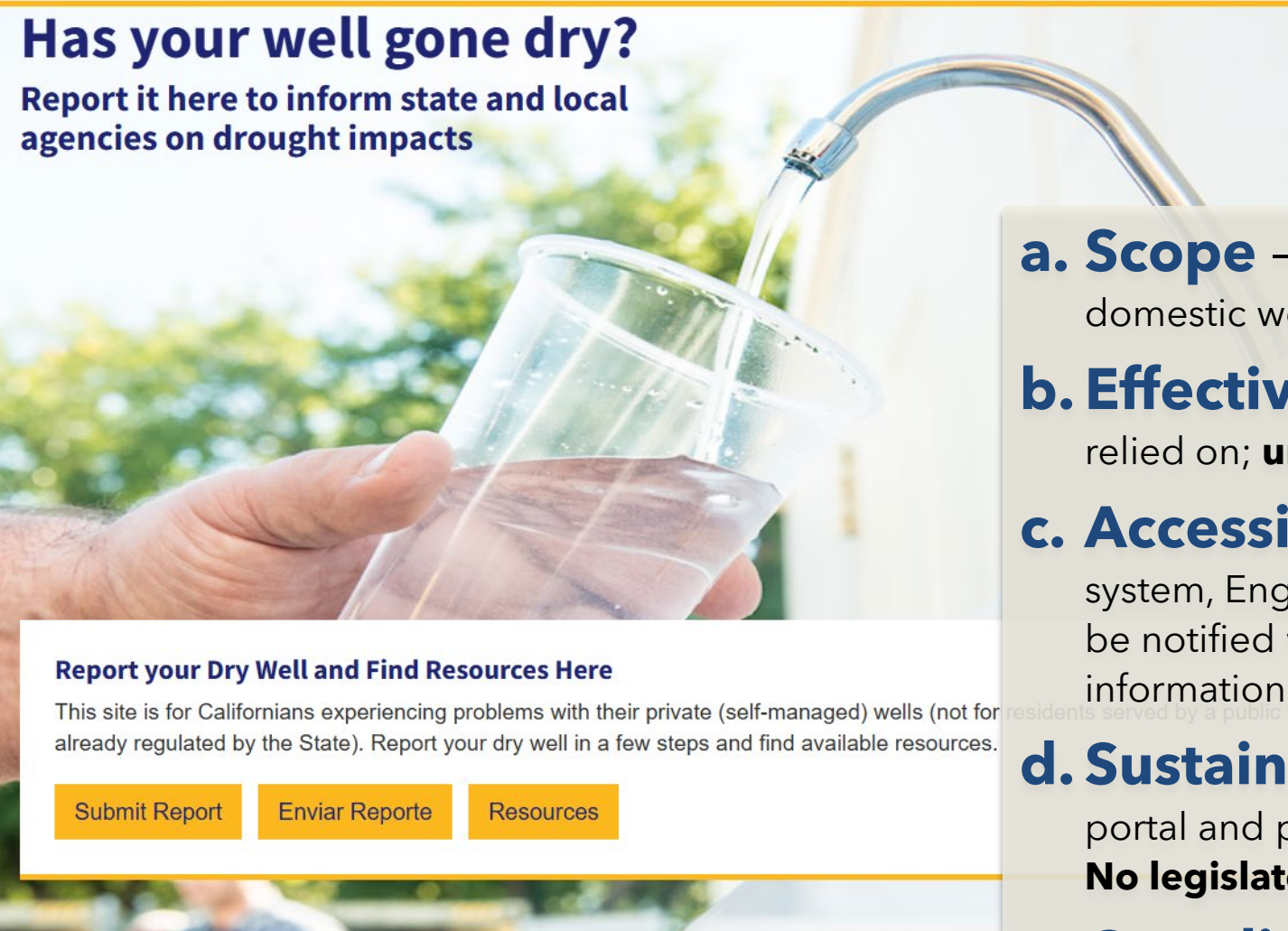
- identify gaps and highlight inefficiencies in authority, funding, and coordination, beginning with the inventory
- consider opportunities to advance from current conditions toward a desired future as defined by our vision statement



Questions to address as part of the R&R Evaluation



- a. Scope** – What is the role of identified programs in addressing domestic wells and SSWSs needs?
- b. Effectiveness/Impact** – Are the programs meeting their intended purpose?
- c. Accessibility and equity** – Are the programs easily accessible to their beneficiaries?
- d. Sustainability/Longevity** – Are there sufficient resources (technical, financial, staffing) in place to ensure continuity?
- e. Coordination** – Are the programs appropriately aligned and coordinated with related programs and agencies?



Report your Dry Well and Find Resources Here

This site is for Californians experiencing problems with their private (self-managed) wells (not for residents served by a public water system). Report your dry well in a few steps and find available resources.

Submit Report

Enviar Reporte

Resources

Tracking Dry Wells in CA

Example 1: Dry Well Reporting System

- a. Scope** – State-hosted reporting portal for VOLUNTARY domestic well or state smalls dry well reports
- b. Effectiveness/Impact** – Reported outages highly relied on; **underutilized due to awareness and trust/fears**
- c. Accessibility and equity** – User-friendly online system, English/Spanish; Local agencies can have own login to be notified when dry well is reported for their county, private information redacted, open data
- d. Sustainability/Longevity** – Accessible reporting portal and public data; **no dedicated funding** to maintain/host, **No legislated mandate**, current DWR commitment
- e. Coordination** –

Example 2: Be Well Prepared



a. Scope – DWR initiative to empower domestic well users by providing info and resources needed to maintain safe and reliable water supply.

b. Effectiveness/Impact – Work in progress, underutilized

c. Accessibility and equity – Materials and information available online in multiple languages.

d. Sustainability/Longevity – **No dedicated funding** to maintain/host and **no legislated mandate**, but DWR commitment

e. Coordination – Makes use of existing resources from DWR, Water Board, Self Help, and others, hosting in single location.

CA.gov Share: f t e

CALIFORNIA DEPARTMENT OF WATER RESOURCES

BE WELL prepared

As California continues to experience climate-driven drought, the California Department of Water Resources (DWR) is working to help domestic well owners and residents that use and manage their own wells.

Through our Be Well Prepared program, DWR is empowering domestic well owners and residents with the information and resources they need to maintain a safe and reliable water supply.

1 Contact a Certified Well Professional
A certified well professional can diagnose the cause of a dry well, and in some cases, it may be easy to fix. Find a Certified Well Professional in your area: wellowner.org/find-a-contractor
If a well professional determines that your well is dry due to lowering of groundwater levels, go to Step 2.

What do I do if my well goes dry?
For domestic well owners or residents on groundwater wells, follow these four initial steps if you think your well has gone dry.

Understanding Groundwater
A Guide for Well Users
For household well owners or residents on groundwater wells, explore these educational resources from the California Department of Water Resources to learn more about groundwater supplies and management.

Participate in Local Long-Term Groundwater Planning Efforts
Find your local Groundwater Sustainability Agency to ask them how you can participate in long-term groundwater planning efforts in your groundwater basin (simply type in your address): sgma.water.ca.gov/webgis/index.jsp?appid=gasmaster&cz=true

Learn about Local Groundwater Conditions
California's Groundwater Live is a thorough online platform for the latest groundwater information and conditions, including groundwater levels, land subsidence, and more: sgma.water.ca.gov/CalGWLive/

Learn How to Monitor Groundwater Levels in your Well
By monitoring groundwater levels at your own well you can track how groundwater levels rise and fall over time. If you are interested in learning how to monitor groundwater levels, email: casgem@water.ca.gov

Discover More about Groundwater and its Management
The California Department of Water Resources offers many educational resources about groundwater:
Groundwater: California's Vital Resource Video: (www.youtube.com/watch?v=Vtr07_bzKlg)
Also available in **Spanish**: [Punjabi](#): [Hmong](#)

Groundwater: Understanding and Managing this Vital Resource Storymap: storymaps.arcgis.com/stories/f075c25b77e4b1d95ce86a82b10fe96

Understanding the state's groundwater management law - The Sustainable Groundwater Management Act - also known as SGMA: SGMA Overview Brochure (available in English in an [online version](#) or an [11-inch by 17-inch printable version](#), and [Spanish in an online version](#) or an [11-inch by 17-inch printable version](#))

For additional information and resources, visit: water.ca.gov/bewellprepared

Emergency Response Entity or Service Provider
Sanislaus, Mariposa, Merced, Madera, Fresno, Kings, Tulare, and Stanislaus (a service provider) at 559-802-1685 or email: prises.org.
County Emergency Drought Contact here: drought/emergency_contacts.html, or contact your county Sheriff's Office.

Reported
If you are a California Department of Water Resource's Dry Well, please report it to the state at water.ca.gov/report (voluntary). If you are receiving support from the state, please make sure your dry well is reported to the state.

Share This Information!
Share this information with your neighbors and communities during drought conditions.

Water Quality
Annual testing of drinking water wells is recommended by the U.S. EPA.

Assistance
Protect Your Home's Water | US EPA provides information on testing well water including frequency, reasons to test, where to test and how to treat

Next Steps

Drought Indicators and Metrics – Wednesday, April 1, 2026, 9 am – 12:30pm

DRIP Collaborative meeting – Friday, April 17, 2026, 10 am – 5pm

- Report on key learnings from the workshop and inventory work
- Continue to hear diverse perspectives on needs to improve roles and responsibilities

Next R&R workshop – to be scheduled in May

- Begin evaluation process and identification of gaps

THANK YOU FOR YOUR CONTRIBUTION TODAY!

THANK YOU!

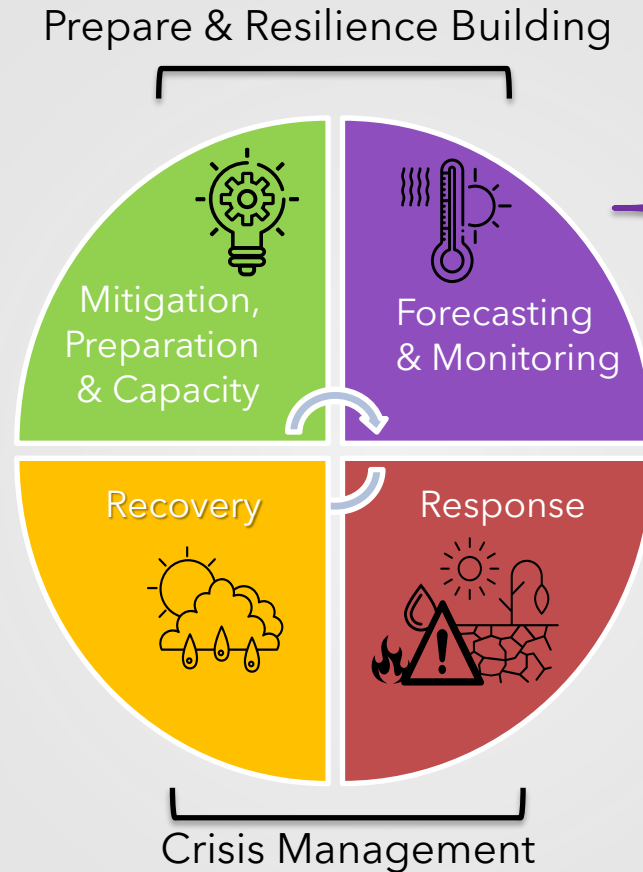
Ideal Scenario for Drought Risk Management Cycle



Inventory - County has existing infrastructure documented

Mitigation - Everyone has clear plan and geographic coverage. Programs differ by location:

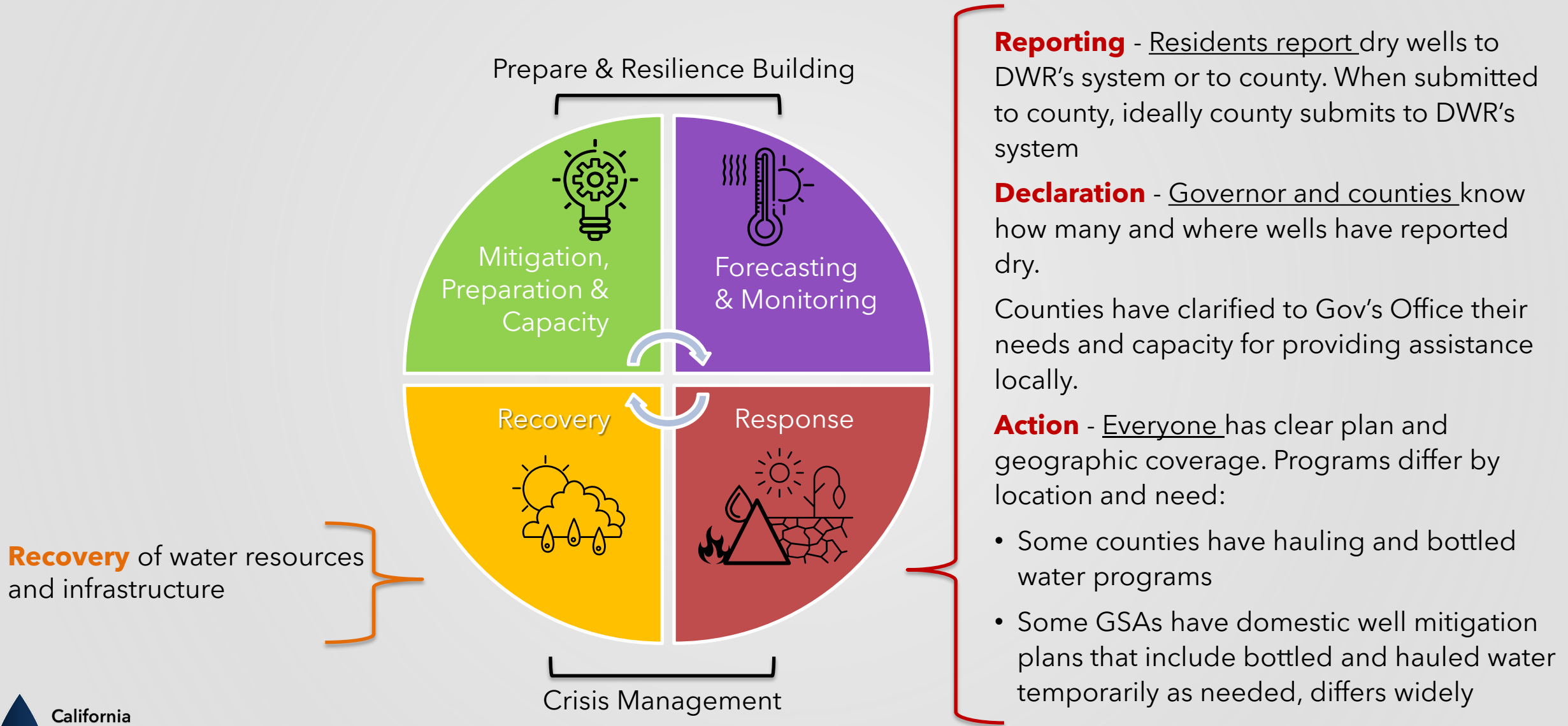
- GSAs manage. Some GSAs have domestic well mitigation plans that provide long term solutions;
- County SB552 plans include consideration of DW and small system consolidation and DW mitigation plan
- State supports locals implementation of MAR, consolidation, and other mitigation strategies.



Assessment - State provides locally relevant data as possible updated in real time, such as groundwater levels, precip and reservoir levels, dry well reports. E.g., reports tailored to county drought task forces for domestic wells and state smalls describing conditions based on the locally relevant data.

Planning - County convenes SB 552 Task Force or alternate committee regularly, with increased meetings as conditions are drier; triggers for each county may differ as locally determined.

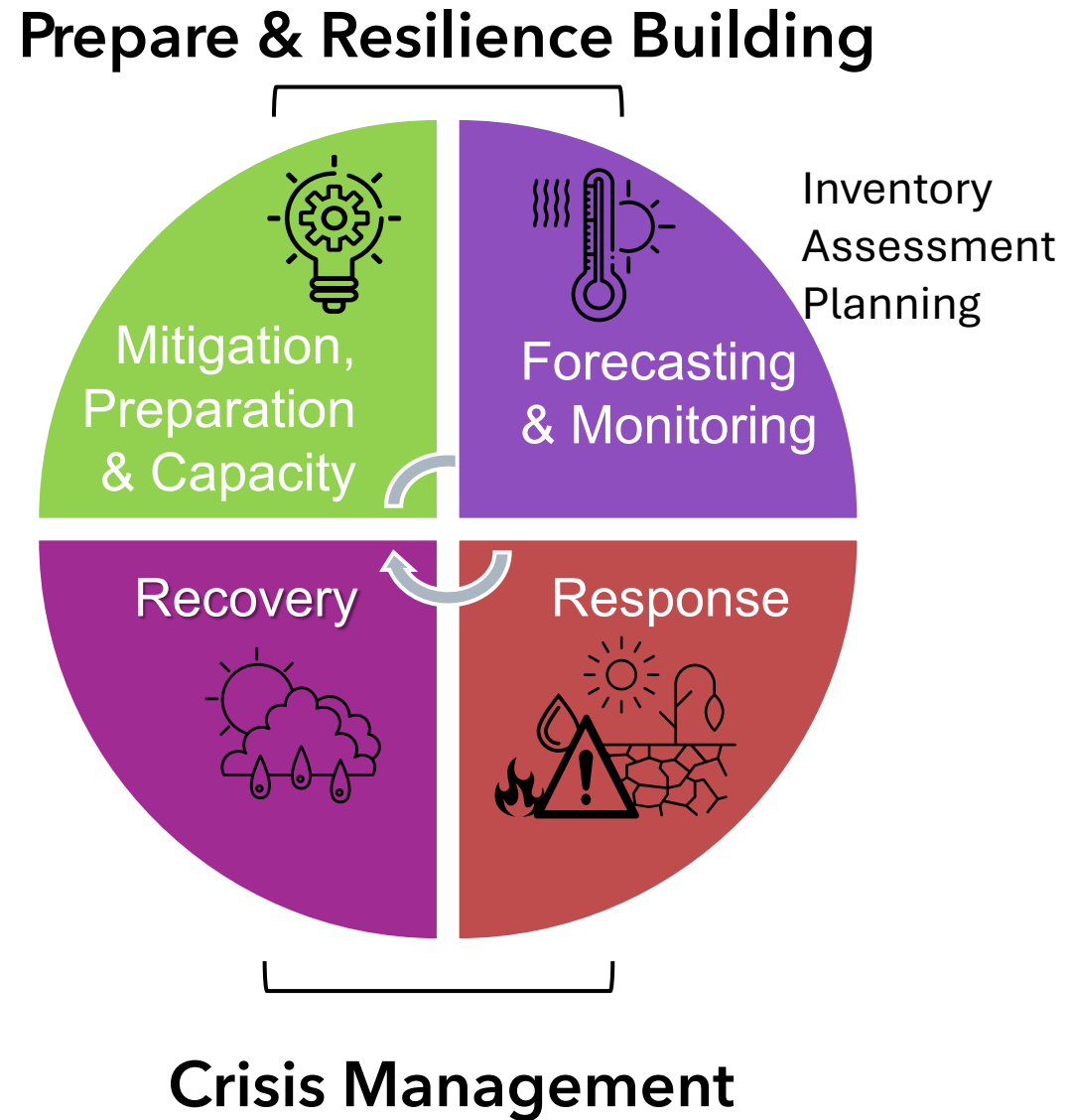
Ideal Scenario for Drought Risk Management Cycle



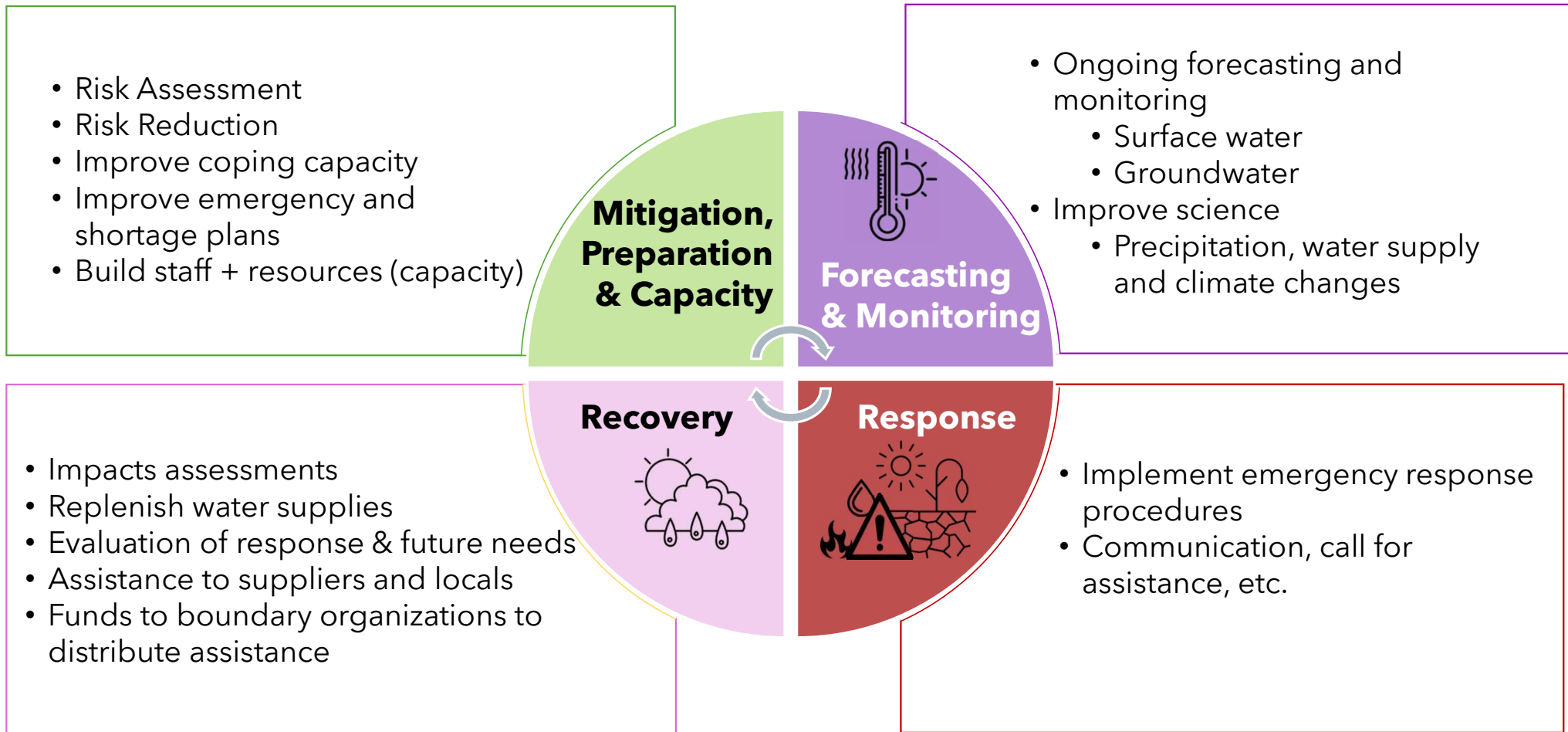
Drought Risk Management Cycle



Drought Risk Management Cycle



Drought Risk Management Cycle



Domestic Well Drought Risk Management

PREPARE & MITIGATE

- **Assist counties develop SB 552 plans (grants, plan assistance, data)**
- Support groundwater recharge
- Analysis of well permitting Executive Order to understand the long-term connection between well permitting, land use decisions, and the use of wells and groundwater resources.
- Support to GSAs for development and implementation of GSPs
- Continue and enhance the Be Well Prepared Campaign to empower well owners to be proactive about their well issues and have awareness/ greater education on their water well systems

- Monitoring and early warning systems for reservoirs (CDEC)
- Real-time data on precipitation and other relevant information publicly available through CA Water Watch
- Regular snowpack surveys to assess water content and accumulation levels
- **Extensive CASGEM & SGMA monitoring network for groundwater levels**
- **Dry Well reporting system for effective tracking of dry wells**
- Funded experimental forecasting products
- Advocate for seasonal forecasting

FORECAST

RECOVERY

- Continued support for well outages and drilling deeper wells with available funding (limited availability of funds by Spring 2023)
- Outreach and media presence to raise awareness that some wells are still dry; outages persist in certain homes and areas.
- Emphasis on groundwater recharge as a crucial strategy for replenishing aquifers during wet years
- **Efforts to obtain permits, facilitate, and fund the diversion of flood waters to drought-stricken basins for recharge purposes.**

- **Provision of hauling services, tanks, and bottled water, funded through DWR with legislated directives** (Small Community Drought Relief Program)
- Collaborative approach during the 2021-2022 drought, with agencies splitting responsibilities and resources across the state
- Close monitoring of needs, impacts, and conditions; coordination with Cal OES and Water Board through regular meetings
- Weekly meetings of secretaries and department heads to coordinate responses and interim solutions during worsening drought impacts

RESPONSE

Water Supply Shortage - Management Cycle

Mitigation & Preparation

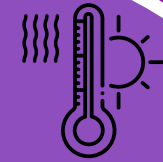
- Improved forecasting and modeling
- Improved monitoring and reservoir operation
- Increased funding to improve and modeling
- Increased funding to support of drought impacts

fore

Mitigation & Preparation



Forecasting & Monitoring



Forecasting & Monitoring

- Monitoring of conditions & impacts
- Forecasting and modeling
- Planning documents
- Risk communication

Recovery



Response



- Impact assessments
- Evaluation of response
- Replenish water supplies
- Resilience communication outreach

Recovery

- Preserve and protect water supply
- Increase water supply coordination
- Coordination on potential Executive Order provisions
- Increase conservation messaging

Response

Groundwater Depletion - Management Cycle

Mitigation & Preparation

- Airborne Electromagnetic Project
- Implement monitoring of subsidence and land surface elevation changes
- Increased communication and education

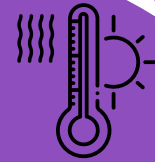
Mitigation & Preparation



Forecasting & Monitoring

- Forecasting, California Groundwater Update 2020 (Bulletin 118)
- Monitoring of conditions & impacts
- Monitor rates of subsidence, groundwater usage, and irrigation use

Forecasting & Monitoring



Recovery

- Multi-benefit recharge programs
- Expand Groundwater Recharge and Flood Management
- Technical Assistance for Temporary Rights for Ground Water Recharge

Recovery



Response

- Temporary Flood Diversion Equipment and Recharge Enhancement
- Support the development of recharge basins

Response



State Water Board – Drinking Water

Mitigation & Preparation

- Development of drought plan templates & requirement to submit (SB 200)
- Review of Electronic Annual Report and SAFER Clearinghouse Data
- Sanitary Surveys — regulatory oversight
- Funding for resiliency projects

Forecasting & Monitoring

- Electronic Annual Report
- SAFER Clearinghouse – Drought Reporting (SB 200 requirements)
- Machine Learning based predictive model
- **Risk Assessment – Water shortage vulnerability –Quality considerations**
- **Aquifer Risk Map**

- SAFER
- Funding for resiliency projects
- **Consolidations and Administrators – limited appication**
- Drought Orders
- SAFER program for Failing and “at-risk” systems

Recovery

- Emergency Response coordination — District staff, LPA
- Emergency Funding — 15 counties have Water Board funded programs
- Regulatory oversight — Issuance of citations, orders
- **Emergency funding for DW – need to check**

Response

State Water Board – Water Rights

Mitigation & Preparation

- Water supply demand analysis – regulatory support
- Development of communication channels and partnerships
- Engagement with partner agencies

Forecasting & Monitoring

- Database modernization – UPWARD
- Water unavailability visualizations
- Compliance with water measurement and reporting

- **Issuance of groundwater recharge permits - adjacent**
- Track curtailment compliance
- Coordination with DFA and DDW

- Issuance of Emergency Regulations
- Elevation of community needs
- Enforcement of violation of curtailment orders
- Approval of temporary urgency change petitions
- Investigation of complaints

Recovery

Response

State Water Board – Other Programs

Mitigation & Preparation

- Water use efficiency standards
- Conservation
- Water Board role in SGMA
- Flow objectives – Regional Boards

Forecasting & Monitoring

- Water usage reporting – urban water suppliers
- SWAMP
- **GAMA – GIS data of DW**
- SGMA modeling
- **CV Salts program for GW quality**

- Coordination between water board divisions and regions

- Reduction in water waste
- Emergency conservation
- Intra- and Inter-agency coordination (DWR, CalOES etc)

Recovery

Response

CDFW Drought Related Efforts

Mitigation & Preparation

- Developed and received over \$300 million in FY 21 and 22 under Water Resilience and Drought Packages
 - Worked with DWR, SWRCB, DFA, CNRA to develop budget packages
 - Utilized lessons learned from last 2012-2016 drought
 - Hired 80 new LT positions
- Established internal Drought Response Team

Forecasting & Monitoring

- Utilized existing long-term aquatic and terrestrial species monitoring programs
 - Increased stressor monitoring on vulnerable species and areas
- Fish health and disease monitoring and treatment (e.g. *C.Shasta* and Ithiamine deficiency)
- Real-time water operations and decision-making w/DWR
 - CVP/SWP Temporary Urgency Change Petition
- Provided regular updates to the SWRCB
 - Technical guidance on variance requests, curtailments, etc.

- Many species are still suffering the effects of drought
 - Recovery will take a while and requires sustained effort
- What more needs to be done?
 - Continued collaboration with agency partners and stakeholders
 - Long-term drought funding
 - Secured water for the environment
 - Additional habitat restoration and connectivity

Recovery

- Fisheries and Hatcheries
 - Conducted 91 rescues in 52 waters; 29,089 fish, 22 species
 - Reintroduction of winter-run Chinook into McCloud River
 - Increased juvenile Central Valley Chinook salmon production by ~6 million fish
 - Trucked 36.5 million CV juvenile Chinook salmon to bays for release
 - \$16M on hatchery infrastructure improvements and equipment upgrades
- Wildlife and Lands
 - Translocations and captive rearing of amphibians, reptiles, etc.
 - Guzzler refill for Bighorn Sheep and other wildlife
 - Increased injured care and human/wildlife conflict response
 - \$24M on water conveyance and habitat projects on state lands (1 million acres)
- \$150M on fish passage, flow enhancement, and habitat improvement projects w/ agency partners and stakeholders

Response

California Governor's Office of Emergency Services - Cal OES

Mitigation & Preparation

- Cal OES participates on the Cal EPA led Drought Response Briefings.
- **Cal OES coordinates with local jurisdictions via Cal OES Operations, sharing DWR and SWRQB mitigation and preparation programs and information, as well as FEMA Hazard Mitigation program information.**
- **Updated Emergency Drinking Water Procurement & Distribution Planning Guidance**
- Begun development of a climate change and emergency management course

Forecasting & Monitoring

- Cal OES maintains situational awareness of local jurisdiction drought status via Cal OES Regional Operations.
- Cal OES Maintains state level situational awareness from participation on the Cal EPA led Drought Response Briefing.
- Regular participation in CalEPA coordination meetings
- Winter Storms Advance Planning unit considered the broader context including drought

- Monitor and analyze drought emergency proclamations; to include requests for State, Federal and CDAA assistance.
- Coordinate with local jurisdictions on identifying drought emergency impacts
- Tracking local jurisdiction requests for state assistance and associated costs related directly to drought impacts
- Evaluate local need for assistance and draft recommendations based on guidance from active executive orders and state of emergency

Recovery

- **Developed a Drought Dashboard for tracking mission tasks**
- **Cal OES coordinated with the DWR, the SWRCB, and other agencies on advance planning effort addressing statewide water issues.**
- **Cal OES Logistics coordinated with the DGS, DWR, and SWRCB to anticipate surge needs for emergency water procurement/delivery.**
- **Provided support and coordination to state lead drought response agencies. (ability to mission task state agencies)**

Response

California Governor's Office of Planning and Research

Mitigation & Preparation

- **Providing decision support tools, climate services, and guidance documents** aimed at helping local planners and diverse communities address climate change, land use, and housing issues.
 - Adaptation clearinghouse
 - Adaptation Planning Guide
 - General Planning Guidelines
- **Providing Technical Assistance** to communities in need:
 - Cooperative Technical Partners (CTP) Program

Adaptation
Planning



CALIFORNIA'S FIFTH
CLIMATE CHANGE
ASSESSMENT

Forecasting & Monitoring

- **Presenting California with the best available science to inform policy, planning and action on climate change**
 - **California's Fifth Climate Change Assessment** uses the best available science to project the impacts and risks of climate change in California at statewide and regional scales.
 - Projections and scenarios data, analytics and visualizations in **Cal-Adapt**.
 - **The Vulnerable Communities Platform**

Research,
Data &
Analytics

- **Ensuring Communication, Partnership, and Education** set a foundation for community-led policy
 - **Save Our Water Campaign** to make water conservation a year-around effort.
 - **Integrated Climate Adaptation and Resiliency Program (ICARP)**

Technical
Assistance,
Communication
& Education

Recovery

Funding
Programs that
support local
action



CALIFORNIA
STRATEGIC
GROWTH
COUNCIL

Investing in communities to build resilience

- SGC Community Resilience Centers Grant Program
- SGC Regional Climate Collaboratives Grant Program
- SGC Affordable Housing and Sustainable Communities Grant Program
- SGC Transformative Climate Communities Grant Program
- SGC Community Resilience Centers
- ICARP Adaptation Planning Grants Program
- ICARP Regional Resilience Grant Program
- ICARP Extreme Heat Grant Program
- OPR Regional Early Action Planning Grant Program
- OPR Federal Grant Program

Response



CNRA and CalEPA—Oversight and Support of Departments, Boards, Commissions

Mitigation & Preparation

- Policy
- Budget
- Human resources
- Legislative affairs
- Tribal affairs
- Equity
- Communications
- Legal affairs
- Interagency coordination
- Governor's office interaction

Forecasting & Monitoring

- Policy
- Budget
- Human resources
- Legislative affairs
- Tribal affairs
- Equity
- Communications
- Legal affairs
- Interagency coordination
- Governor's office interaction

- Policy
- Budget
- Human resources
- Legislative affairs
- Tribal affairs
- Equity
- Communications
- Legal affairs
- Interagency coordination
- Governor's office interaction

Recovery

- Policy
- Budget
- Human resources
- Legislative affairs
- Tribal affairs
- Equity
- Communications
- Legal affairs
- Interagency coordination
- Governor's office interaction

Response

