

# California Water Boards Drought Response





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# California Water Boards

-  **Protect Water Quality**
-  **Regulate Drinking Water**
-  **Administer Water Rights**
-  **Provide Financial Assistance**



# 2022 Drought Impacts



**1450+**  
household water  
shortages



**70**  
HAB  
advisories



**10,000+**  
Fish killed  
in SF Bay



**14,300**  
Agricultural  
jobs lost



**64%**  
Wells at  
historic lows








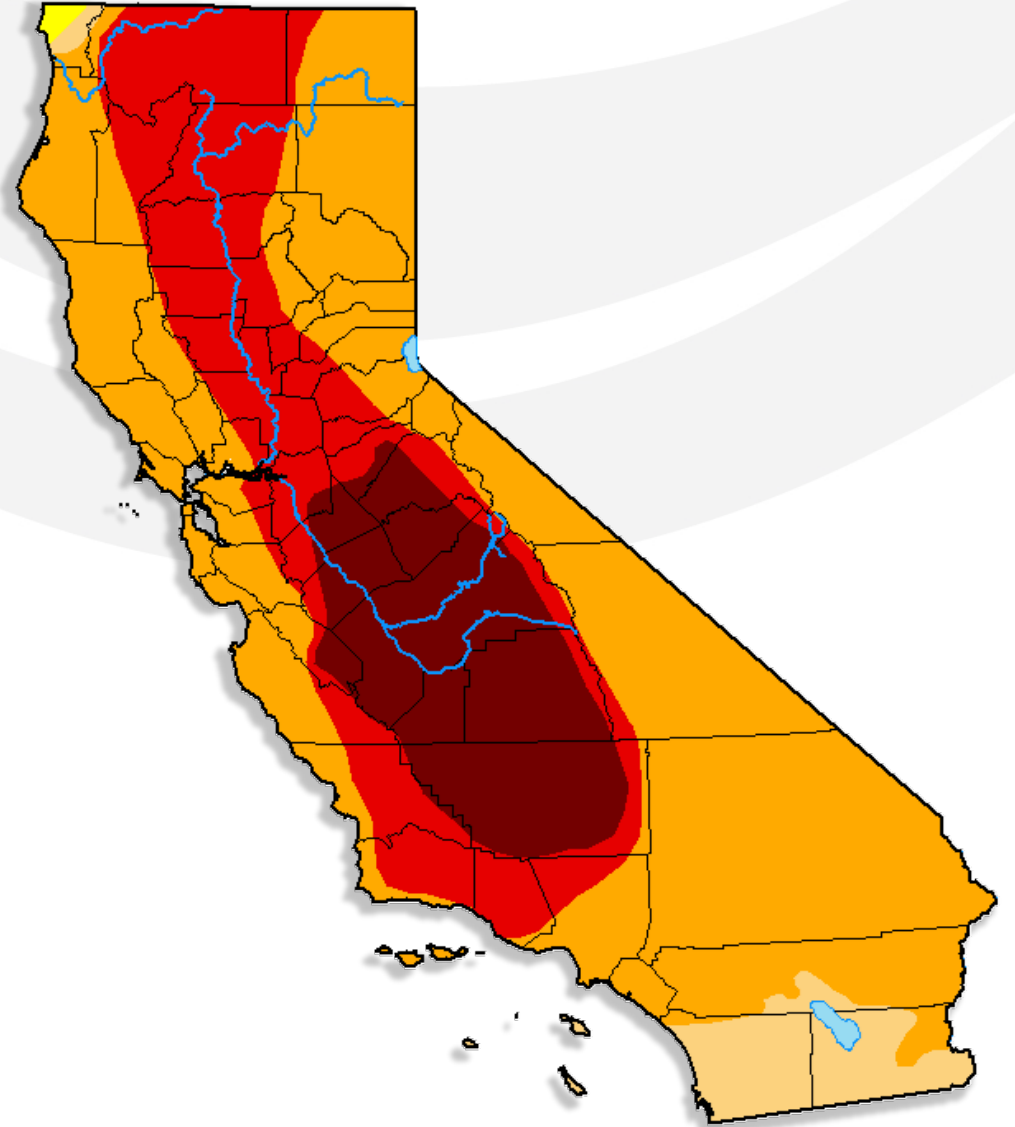
**\$1.3+ billion**  
Loss to  
agriculture



**5%**  
State water project  
contracts met

# Water Boards Drought Actions

-  **Drinking Water Assistance**
-  **Financial Assistance**
-  **Water Conservation**
-  **Emergency Curtailments**
-  **Groundwater Recharge**





# Drinking Water Assistance

## Safe & Affordable Funding for Equity & Resilience (SAFER) Drinking Water Program

Focus on small disadvantaged communities & low-income households

- Interim & emergency water supplies
- Technical assistance & planning
- Some construction & operations & maintenance
- System consolidation

\$700 million for small disadvantaged community projects since 2019



# Drinking Water Success Story

**Self-Help Enterprises helps 3,400 households in the San Joaquin Valley**

**Has your well gone dry?  
Have you lost access to  
water in your home?**

We can help you  
by installing a large  
water storage tank  
on your property  
and connecting it to  
your home.



Serves Kern, Kings, Tulare, Fresno,  
Madera, Merced, Mariposa, San  
Joaquin & Stanislaus Counties

- Regional Bottled Water
- Household Solutions
- Dry Well Tanks & Hauling
- Regional Well  
Replacement/Repair

\$115M awarded- \$83M remaining



# Financial Assistance

**\$3.3 billion to boost drought resilience and increase water supplies in FY 21/22)**

Types of projects:

- Drinking water infrastructure
- Drinking water consolidation
- Emergency and interim drinking water supplies
- Technical assistance

Multiple sources depending on need:

Visit [bit.ly/water\\_grants\\_loans](https://bit.ly/water_grants_loans)





# Water Conservation

## Fastest, cheapest & easiest way to stretch water supplies

- Voluntary 15% conservation (2021)
- Wasteful use prohibitions & demand reduction (2022)
- Urban retail suppliers:
  - Water loss performance standards (2023)
    - Monitor and reduce leaks
    - Save 88,000 AFY
  - Water use objectives (2024)
    - Choose your own adventure





# Emergency Curtailments

Implement priority system while protecting fish, wildlife, & human health & safety.

- **Restricts in order of priority:**
  - “*First in Time, First in Right!*”
- **10,000+ rights curtailed:**
  - First for many old water rights
- **Tied to emergency order and regulations:**
  - Cannot do this in non-drought years
- **Lots of enforcement**





# Groundwater Recharge

**CA goal to expand groundwater recharge  
by at least 500,000 AFY by 2030**

- Types of recharge: natural, incidental, managed
- Managed typically requires a permit
  - 7 permits approved & 190,000 AF authorized
- 340+ managed projects proposed
  - Unclear how many rely on the same water
- Process takes time
  - Need to start early



# Data Challenges

Example: Data Quality Issues in 2019 Sacramento River Self-Reported Diversions

Nearly 4,000 reporters  
(>5,000 AFY)

Reported :	29,688,143 AF
<u>Corrected:</u>	<u>4,063,238 AF</u>
Difference:	25,604,905 AF

**86% reduction!**

# Improvements

- UPWARD- Updating Water Rights Data for CA
  - Replace antiquated data system
  - Digitize millions of paper documents
  - Establish data standards
- Drought Planning
- Supply and Demand Assessment Tools
- Telemetry Research
- Increased Enforcement



# Collaboration & Engagement

## Advisory Groups

- SAFER
- Recycled Water
- Cooling Water Intake
- UPWARD

## Workshops & Listening Sessions

- Water Rights Drought Effort Review
- Drinking Water Affordability
- Emergency Curtailments
- Water Use Efficiency
- Racial Equity

## Interagency Workgroups & Taskforces

- Emergency Response (drought, fire, other)
- Water Quality Monitoring Council
- Recycled & Storm water
- Project-specific groups

## Local Knowledge & Solutions

- Russian River Voluntary Water Sharing Program
- Scott/Shasta Local Cooperative Agreements
- Many project-specific activities

# California's Water Cycle

