



Underground Storage Tank Cleanup Program Update

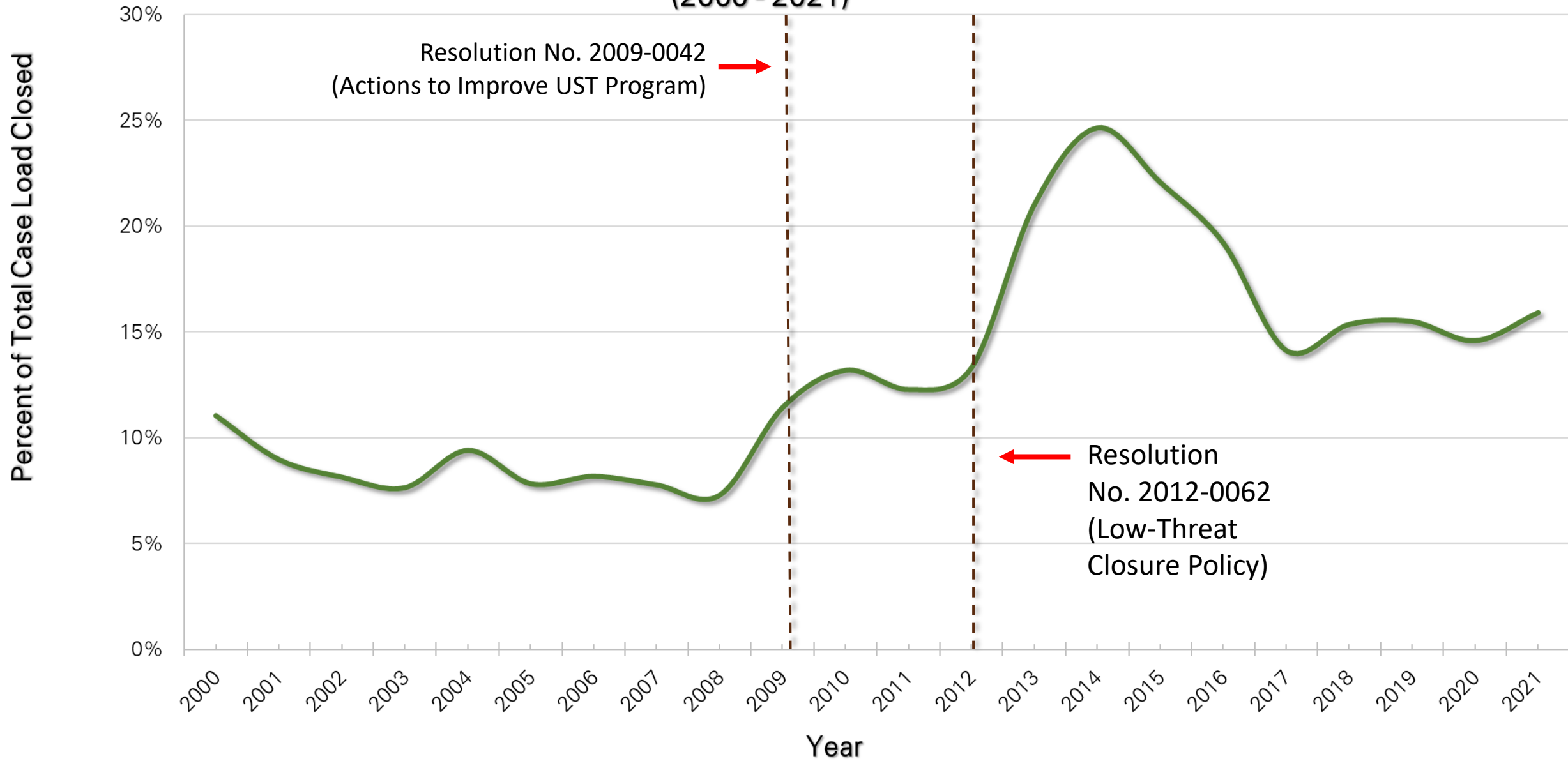
Matthew Cohen, PG

Program Overview

- Nearly 41,000 cases closed (95% of all cases)
 - 347 closed 2021 calendar year
 - Average case age at closure is 18 years
- Approximately 1,848 cases left
 - Lead Agencies
 - 1,476 Regional Water Board
 - 372 Local Oversight
 - Funding
 - 1,072 active Cleanup Fund
 - 775 cases with no Cleanup claim
- Number of new cases is decreasing

Closure Rate

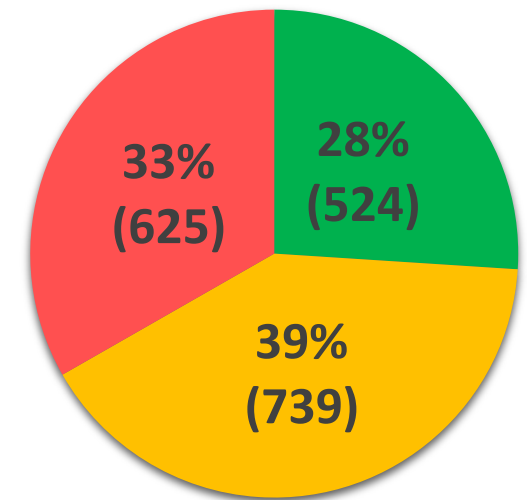
(2000 - 2021)



CURRENT PORTFOLIO

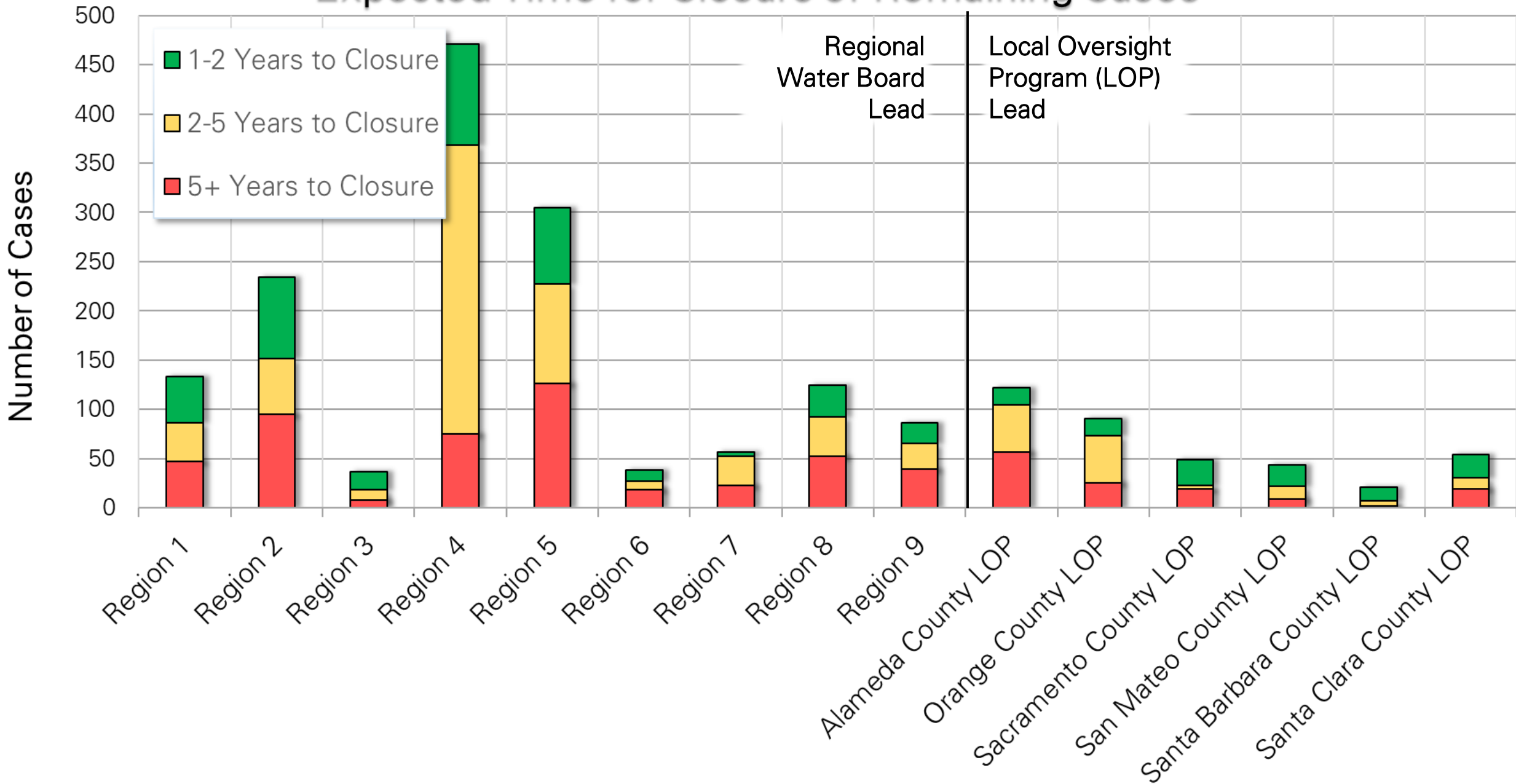
- 625 Potentially stalled cases
 - Unresponsive or unwilling responsible parties (RP)
 - Complex site conditions
 - Ineligible for Cleanup Fund
- Stalled cases = more staff resources
- Need new business processes and tools for stalled cases

Expected Time for Closure of Remaining Cases



■ 1-2 years ■ 2-5 years ■ 5+ years

Expected Time for Closure of Remaining Cases





WHAT IS A STALLED CASE?

Cleanup and investigation activities are not progressing the case toward closure as expected.

Why are there stalled cases?

- Human nature is to focus on the easy cases
- Low-Threat Closure Policy
- Over 95 percent of all cases Closed
- Stalled cases = more time and money

Stalled Case initiative

Who

- Regional Board and LOP Staff
- State Water Board Staff
- U.S. EPA Staff
- U.S. EPA Contractor (In-Kind)

Red = Strike Team

How

- Identify stalled cases
- Quarterly meetings
- Collaborative group discussions
- Find creative solutions
- Develop individual case strategies
- Strike Team assistance implementing strategies



What does the Stalled case Strike team do??

- Identify and locate responsible parties
- Help draft enforceable directives and violations
- Assist with funding applications
- Complete limited-scope investigations (grant funds)
- Anything else?

Stalled case initiative - Results

- Directives:
 - 104 enforceable, 86 Informal
- Enforcement:
 - 41 NOVs or Draft ACLs
- Funding:
 - 98 funding secured,
 - 45 additional applications pending
- Fieldwork:
 - 84 sites with new fieldwork,
 - 34 with workplan in place
- Closure:
 - 120 cases closed,
 - 48 in progress



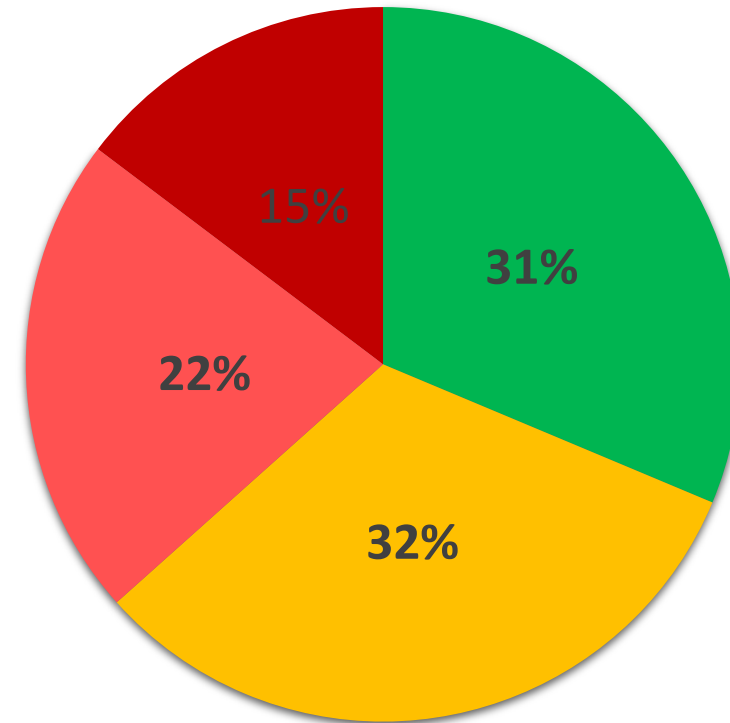
A photograph of a bright yellow flag lying on a green golf course. The flag is partially folded and appears to be resting on the grass. The background is a blurred green field.

Enforcement Team

- Dedicated UST Cleanup attorney
- OE Staff
- EPA funded contractor support
- Meeting with RBs to identify Priorities
- Training staff to tee-up for enforcement
- Active case engagement

Path to Closure Plans

- Resolution 2012-0062 required path to closure plans
- Quality plans help program planning
- Guide RPs/consultants
- Easy GeoTracker form
- Path to closure plan improvement needed
- Path to closure meetings (state board facilitated)
- OE training (November 2018)



- Appears Thorough
- Closure Date Exceeded
- Lacks Sufficient Information
- No and/or Incomplete PTCP



Future Challenges

- Removal of Single-Wall Systems
 - Deadline is December 31, 2025
 - 3,166 features from 1,286 facilities
 - Expect up to 500 new cases
- Cleanup Fund Sunset 2025
 - Funding for Cleanup is uncertain
 - Final Assurance unclear

Program Future

- Future of the Underground Storage Tank Program with diminishing caseload
 - Plan for the eventual transition of open cases and resources to the Site Cleanup Program
 - Apply the successes of the UST Program to the Site Cleanup Program



A photograph of a construction site. In the foreground, several large red pipes are laid out in a trench. The pipes have yellow bands around them and some have the text 'MODERN WELDING CO OF IOWA, INC BURLINGTON, IOWA' printed on them. In the background, a yellow truck with a crane is parked on a dirt area. The truck has 'KRAMER CRANE' and '31624-2410' written on it. There are other construction materials and equipment visible in the background.

Questions?

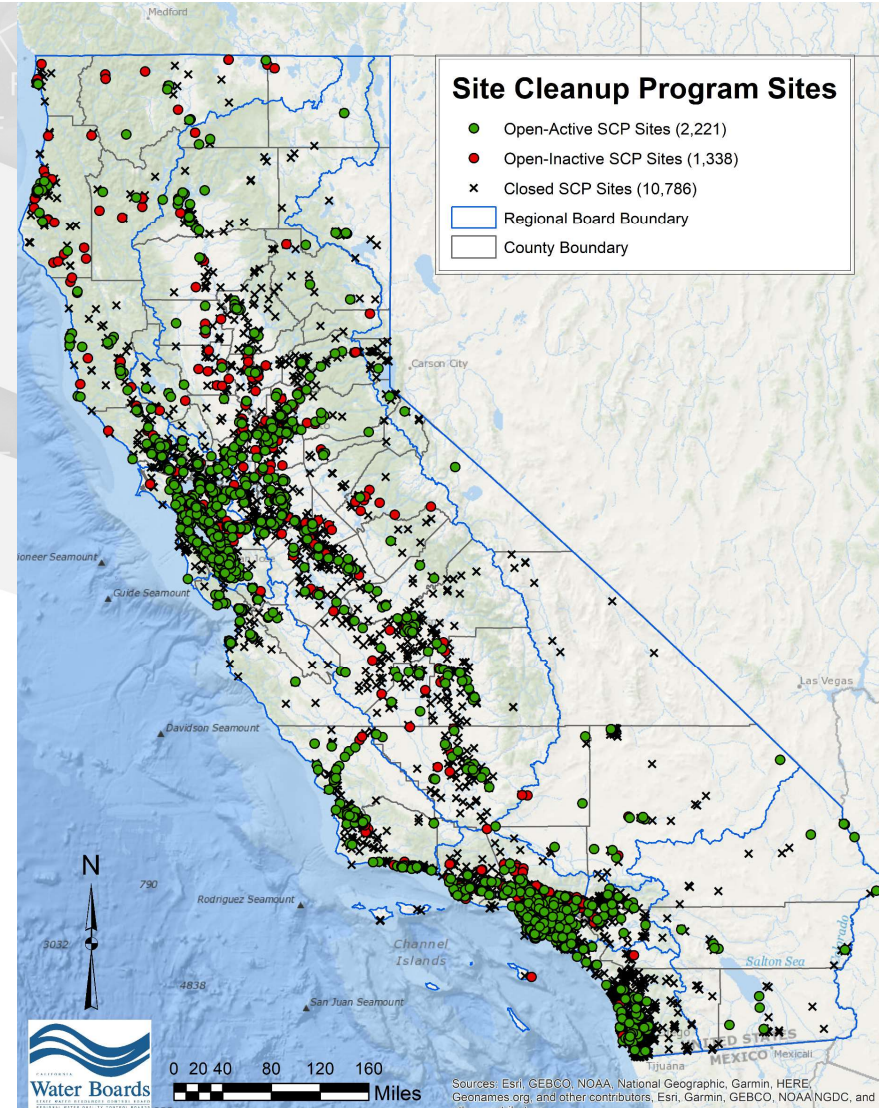
Site Cleanup Program Overview

March 2022 CUPA Conference
Cheryl Prowell, DWQ

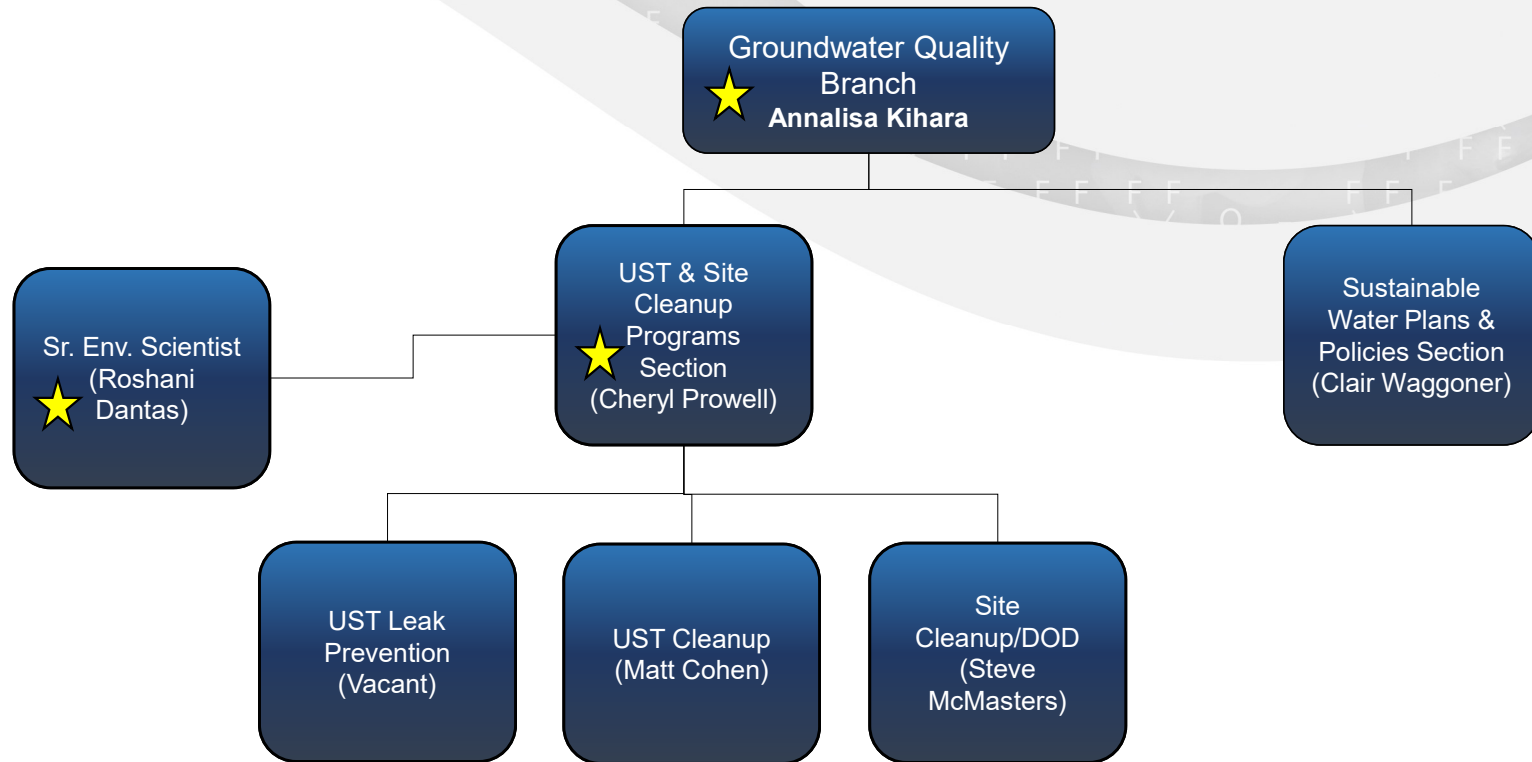


Topics

- Status of the cleanup program
- Environmental Justice
- PFAS
- Vapor Intrusion

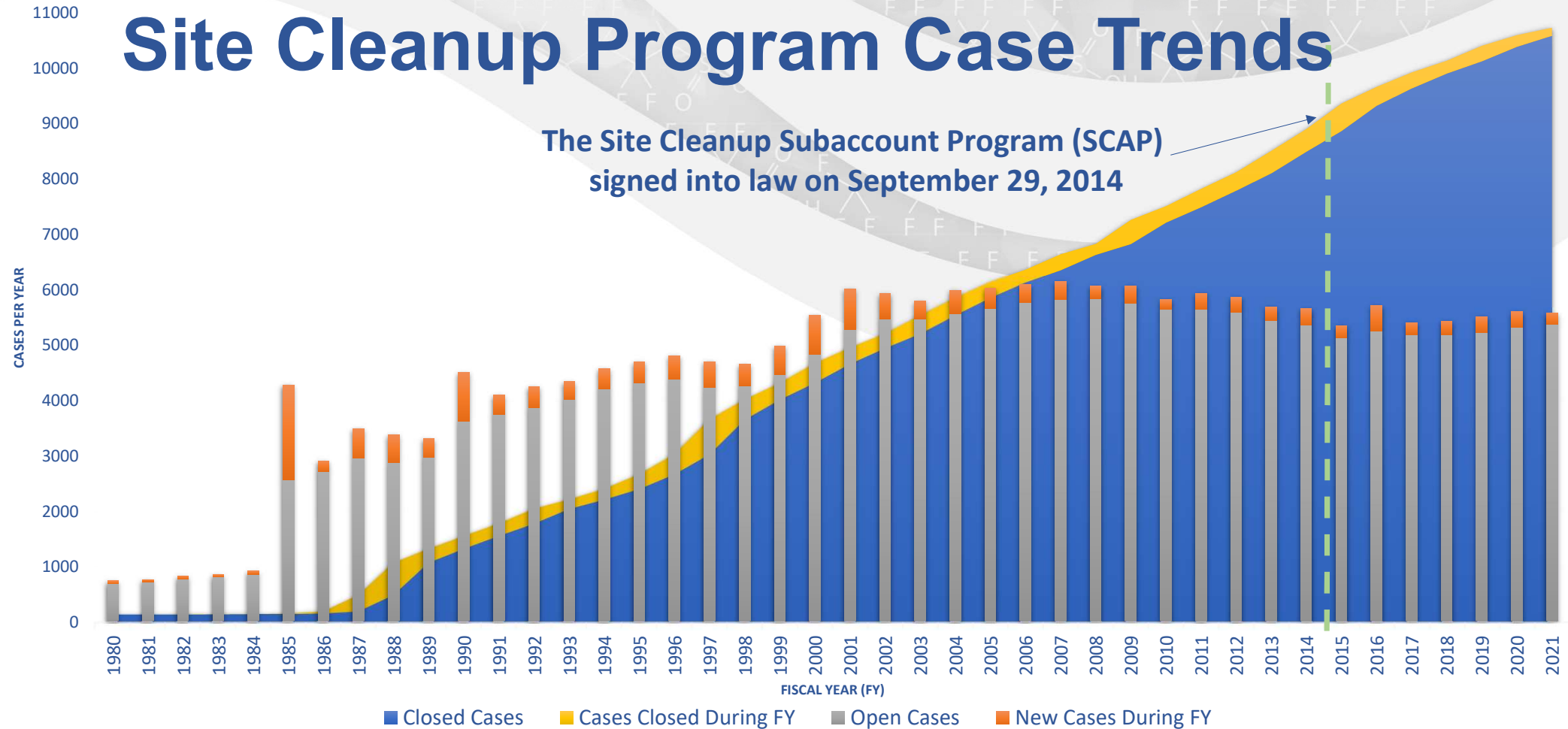


Organization Updates – State Board DWQ

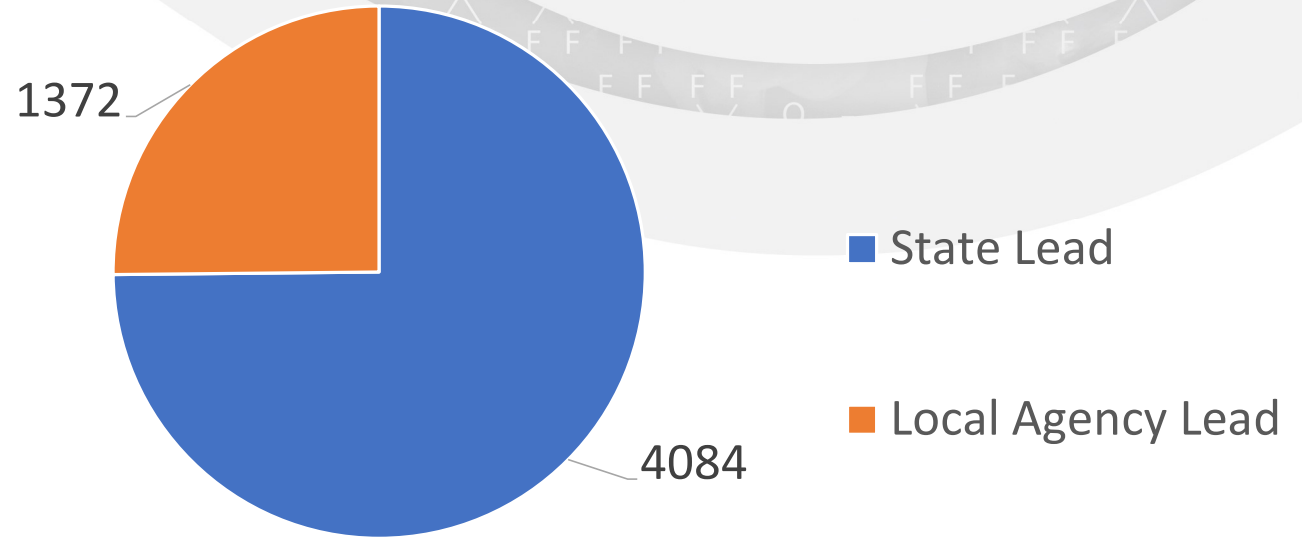


Site Cleanup Program Case Trends

The Site Cleanup Subaccount Program (SCAP) signed into law on September 29, 2014



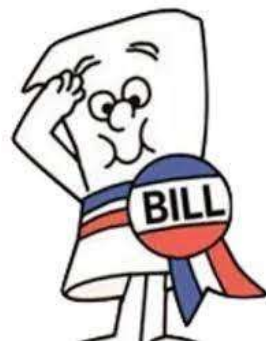
Open Cleanup Cases in GeoTracker



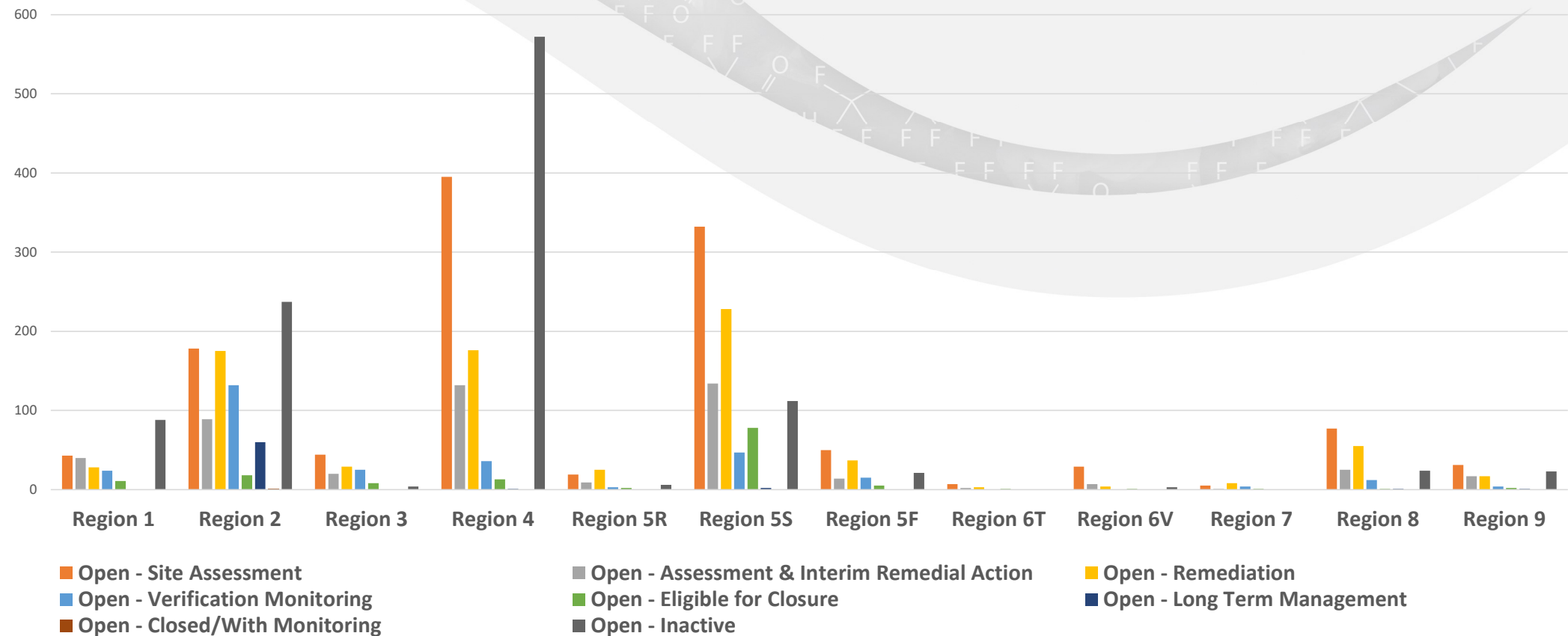
Data as of 1/3/2022

Assembly Bill 304

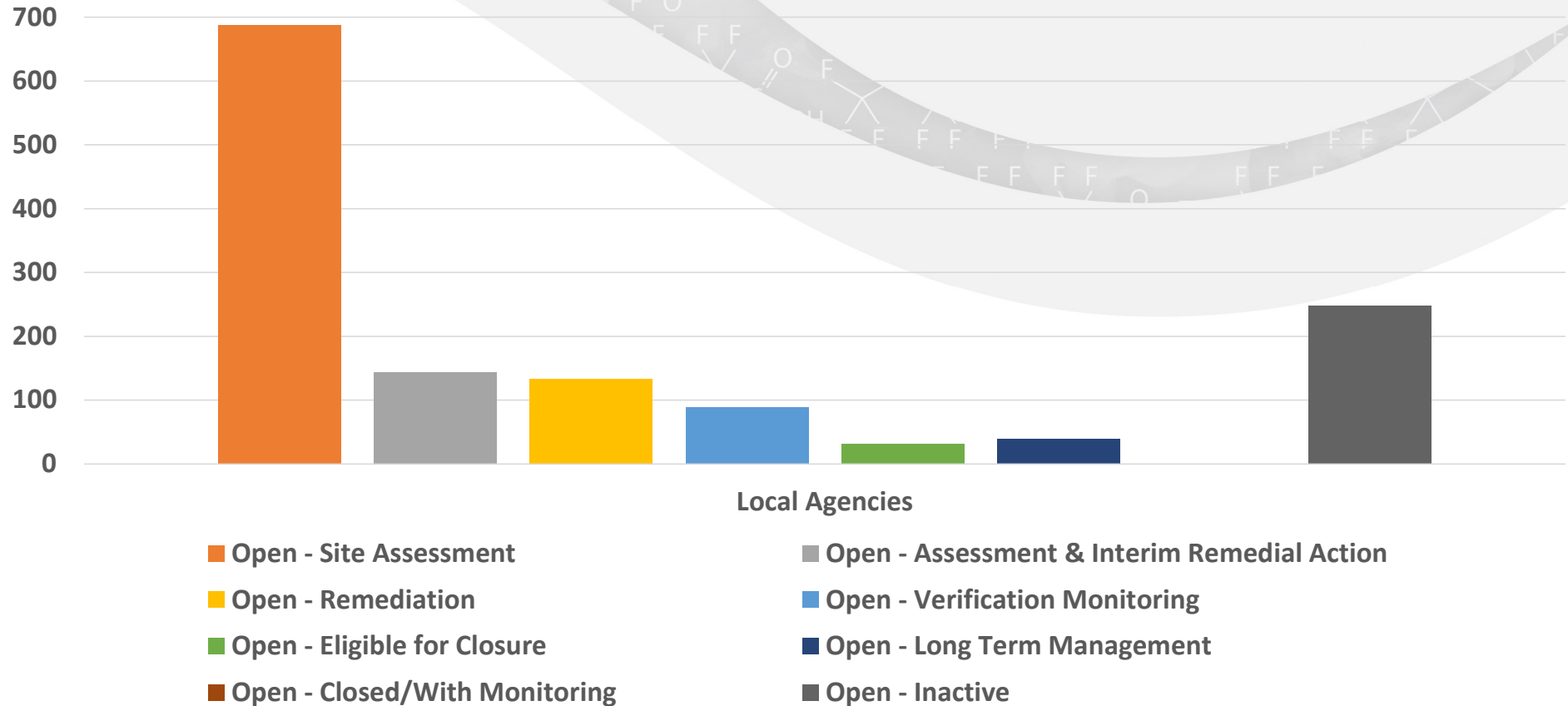
- Updates requirements for voluntary programs by local agencies under Public Health Officer authority
 - Use of GeoTracker
 - Expanded notification to DTSC/Regional Boards when new cases are opened
 - Self-certification of staff expertise
 - Programs will follow Water Code and Health and Safety code
- New Quarterly Roundtable for Voluntary Cleanup Programs



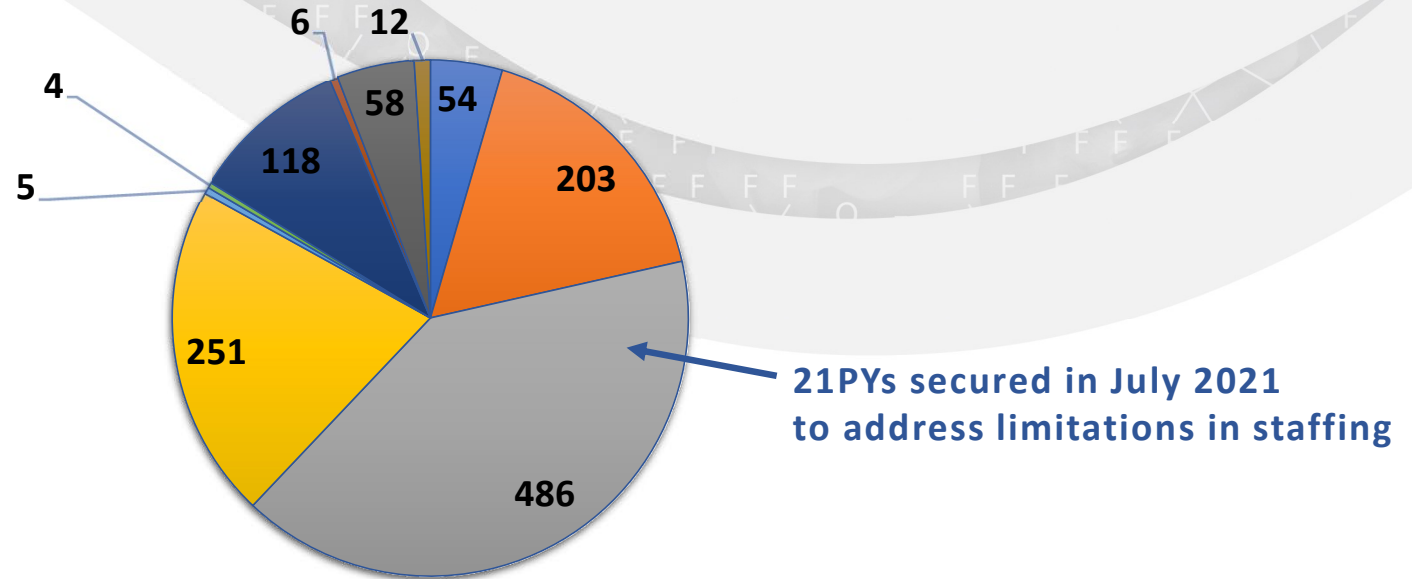
SCP Open Cases – Water Board



SCP Open Cases – Local Agencies



SCP Inactive Characteristics

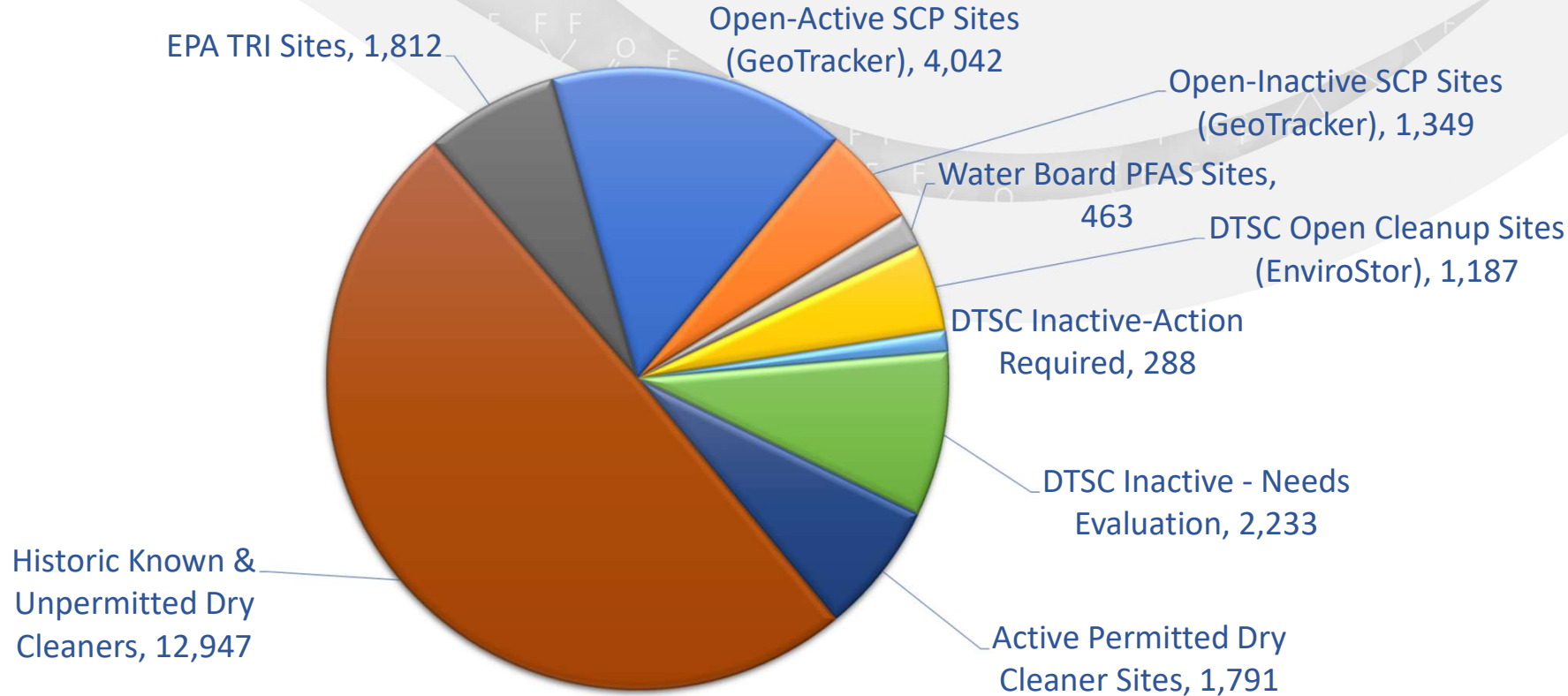


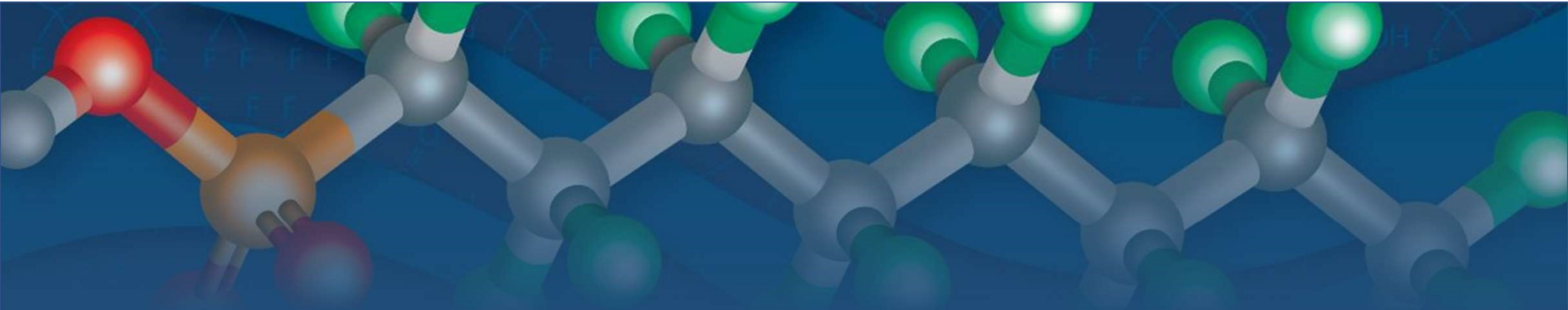
- Inadequate RP Funding
- No RP Identified
- Other
- Regional Plume

- No Agency Funding Available
- Onsite / Offsite Access - Legal
- Problematic Site Conditions

- No Agency Staff Available**
- Onsite / Offsite Access - Physical
- Recalcitrant RP

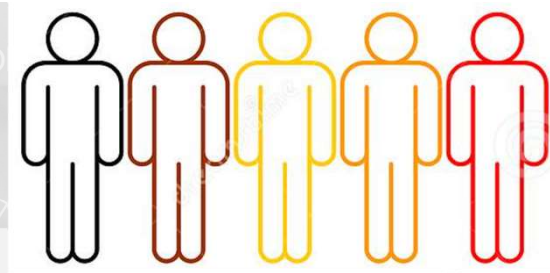
Contaminated Properties in California





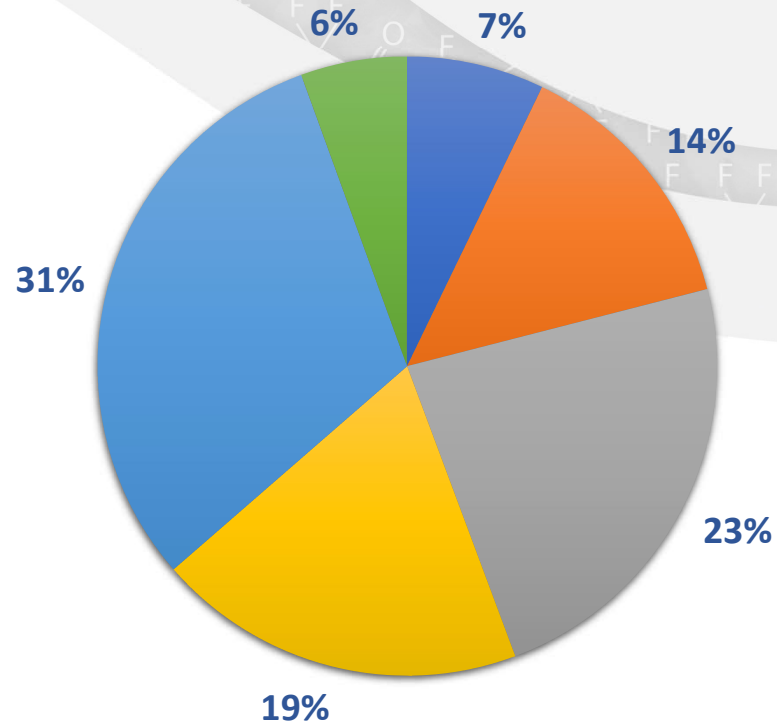
Environmental Justice

Environmental Justice



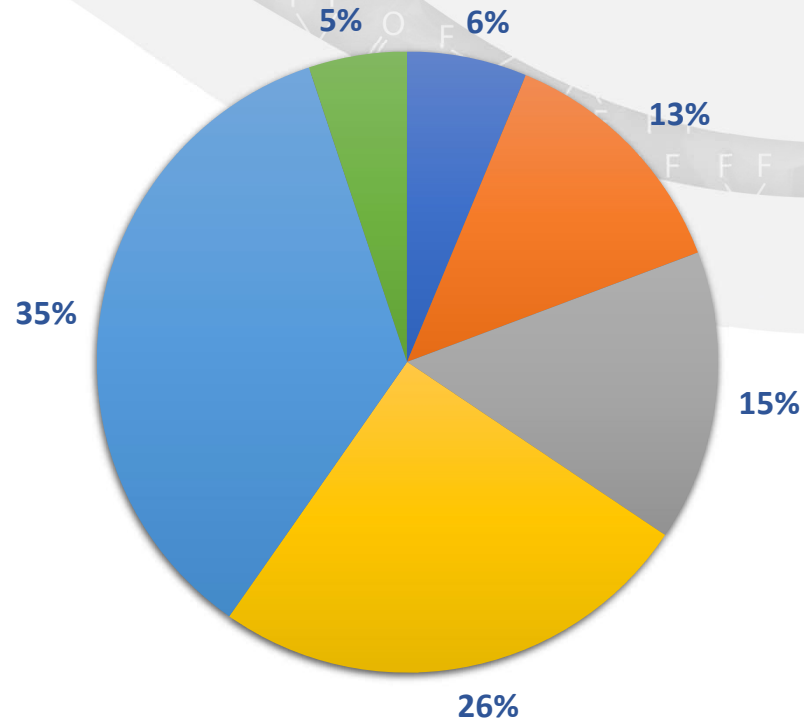
- **November 2021 - Resolution No. 2021-0050 Condemning Racism, Xenophobia, Bigotry and Racial Injustice and Strengthening Commitment to Racial Equity, Diversity, Inclusion, Access, and Anti-Racism**
 - Commits to making racial equity, diversity, inclusion, and environmental justice central to our work as we implement our mission so that the **access the State Water Board creates, and outcomes we influence, are not determined by a person's race and the benefits are shared equitably by all people.**
 - Staff shall **advance a framework of transparency, accountability, and continuous improvement** for our racial equity work by establishing metrics and using quantitative and qualitative data collection methods to measure and evaluate the Water Boards' progress toward: implementing those metrics; **equitizing our systems, practices, and policies;** and **diversifying the Water Boards' workforce.**

Open Cleanup Cases by CalEnviroScreen Score

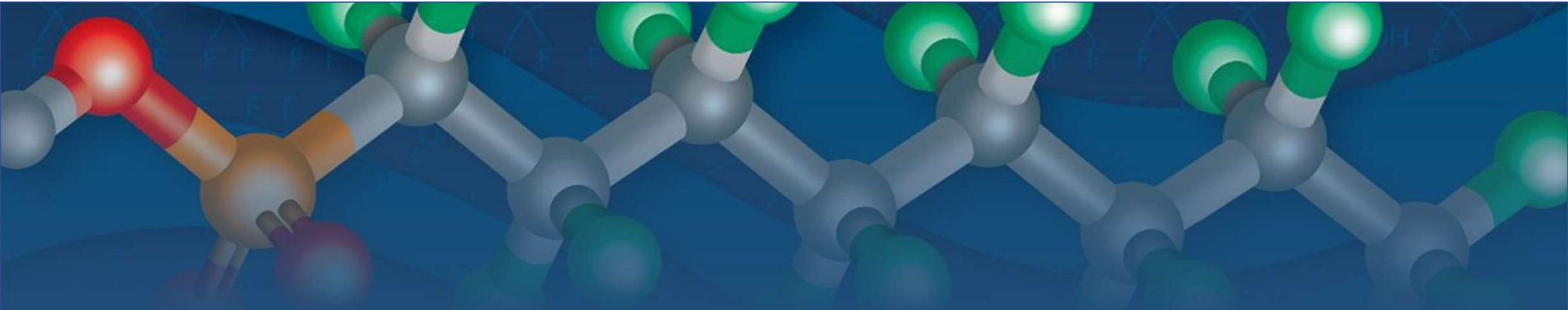


■ 0-20% ■ 21-40% ■ 41-60% ■ 61-80% ■ 81-100% ■ n/a

Inactive Cases by CalEnviroScreen Score



■ 0-20% ■ 21-40% ■ 41-60% ■ 61-80% ■ 81-100% ■ n/a

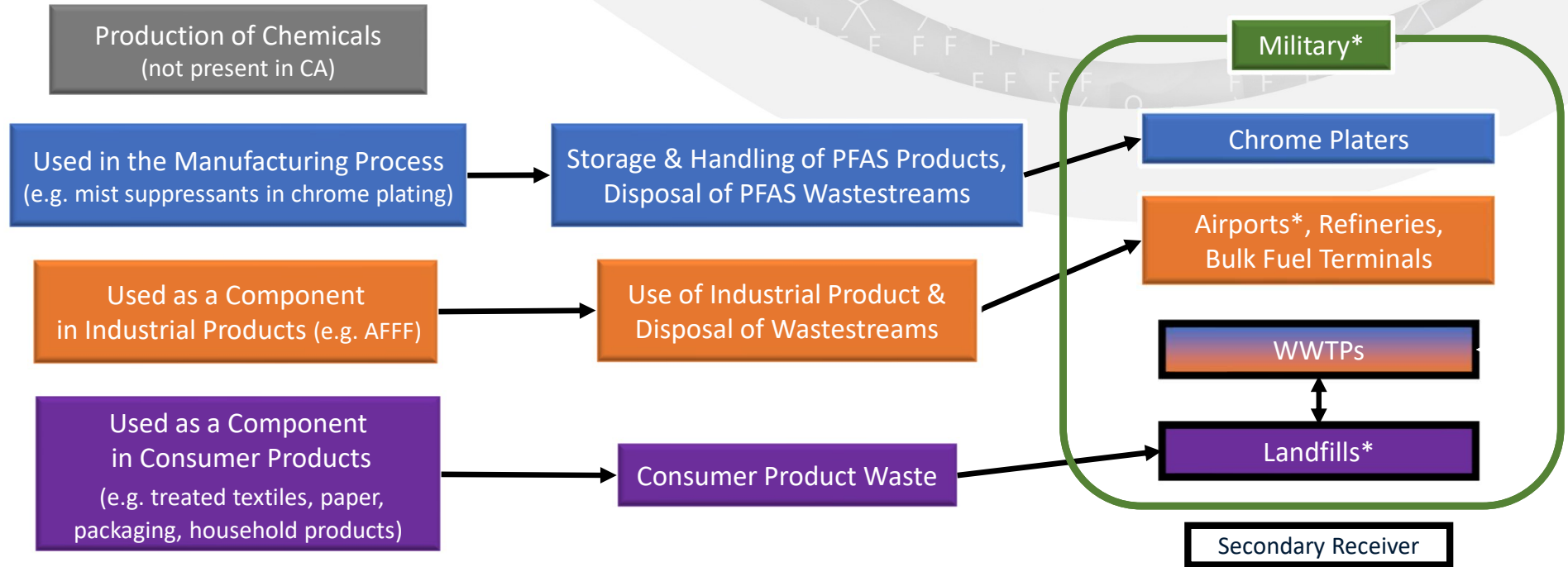


PFAS

Currently Water Board Focuses on PFAS Sources

POTENTIAL USE CATEGORIES

AFFECTED INDUSTRIES



*Ongoing drinking water well testing for PFAS

State-wide Industry Investigative Orders has provided vital information but there are gaps

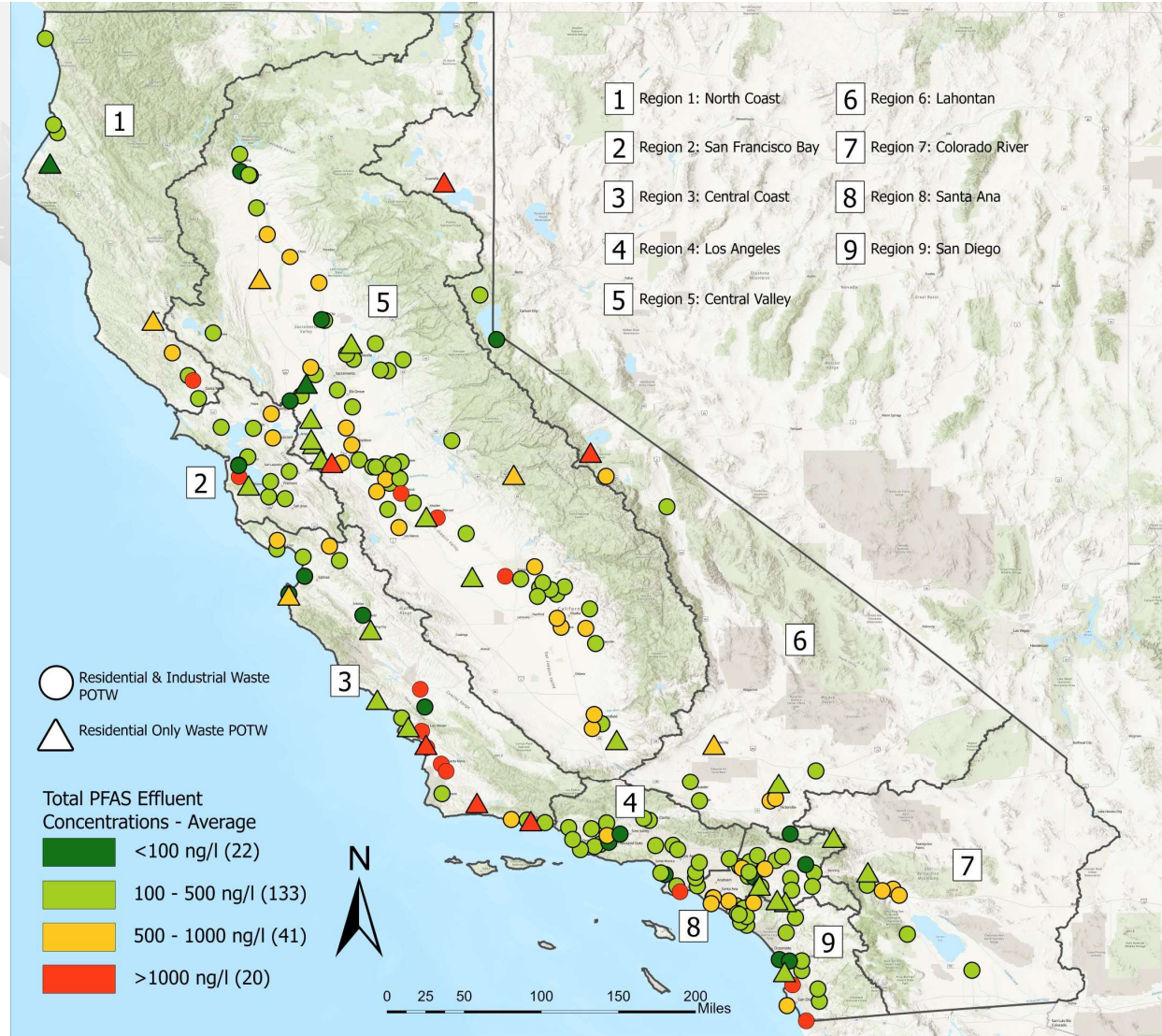
Media	Chrome Platers	Airports	Landfills	POTWs	Bulk Fuel Terminals/ Refineries
Soil				* Includes biosolids	
Groundwater					
Stormwater					
Surface Water/ Sediment					
Wastewater			* Includes leachate		

To be assessed	Not Detected to Low Concentrations (<100 ppt)	Moderate Concentrations (100 ppt to 5,000 ppt)	Significant Concentrations (>5,000 ppt)
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All matrices were analyzed using the DoD QSM with 25 to 38 analytes.

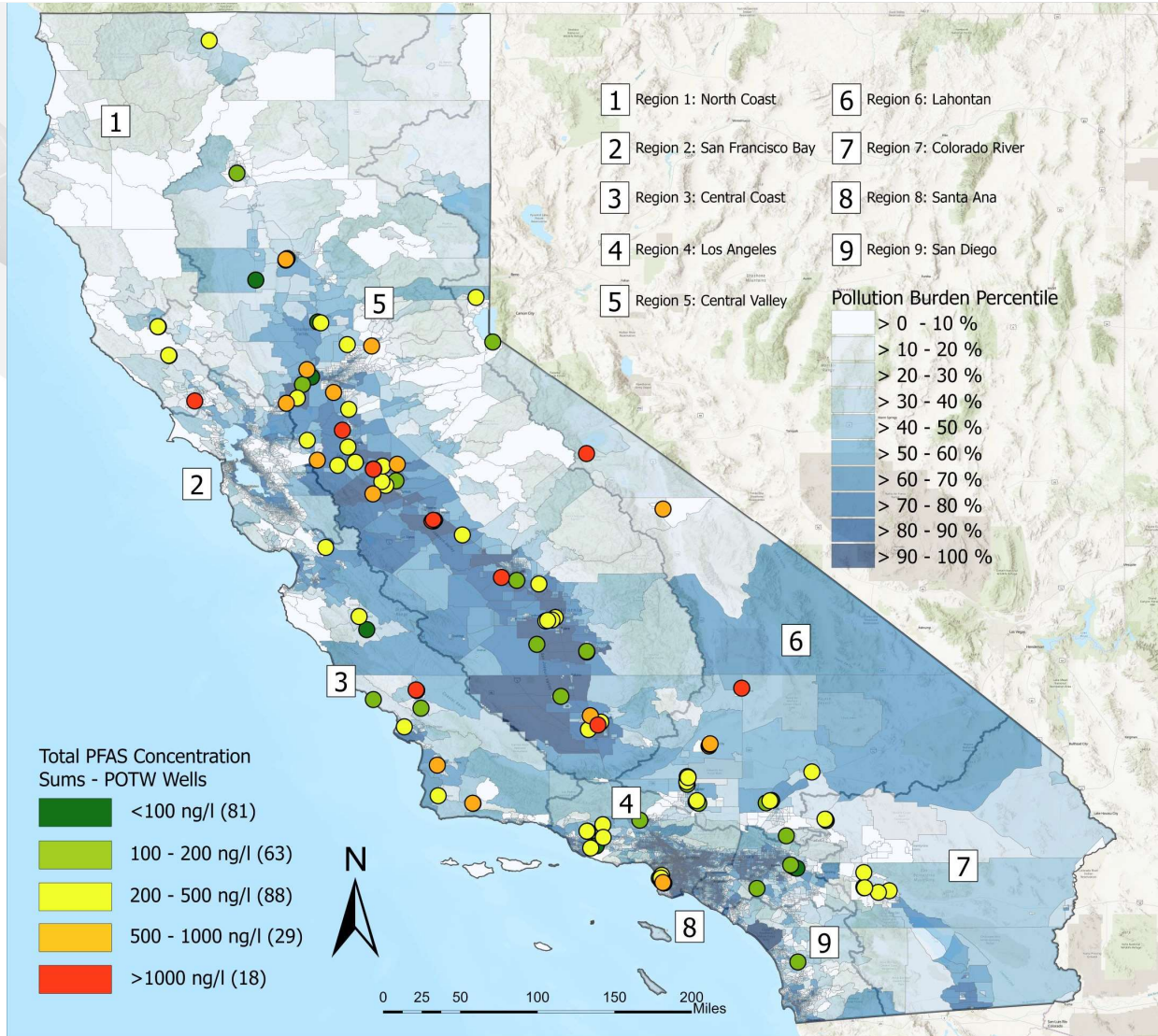
PFAS is Ubiquitous in Wastewater

Data downloaded in February 2022
Samples analyzed using the DoD QSM (38 analytes)



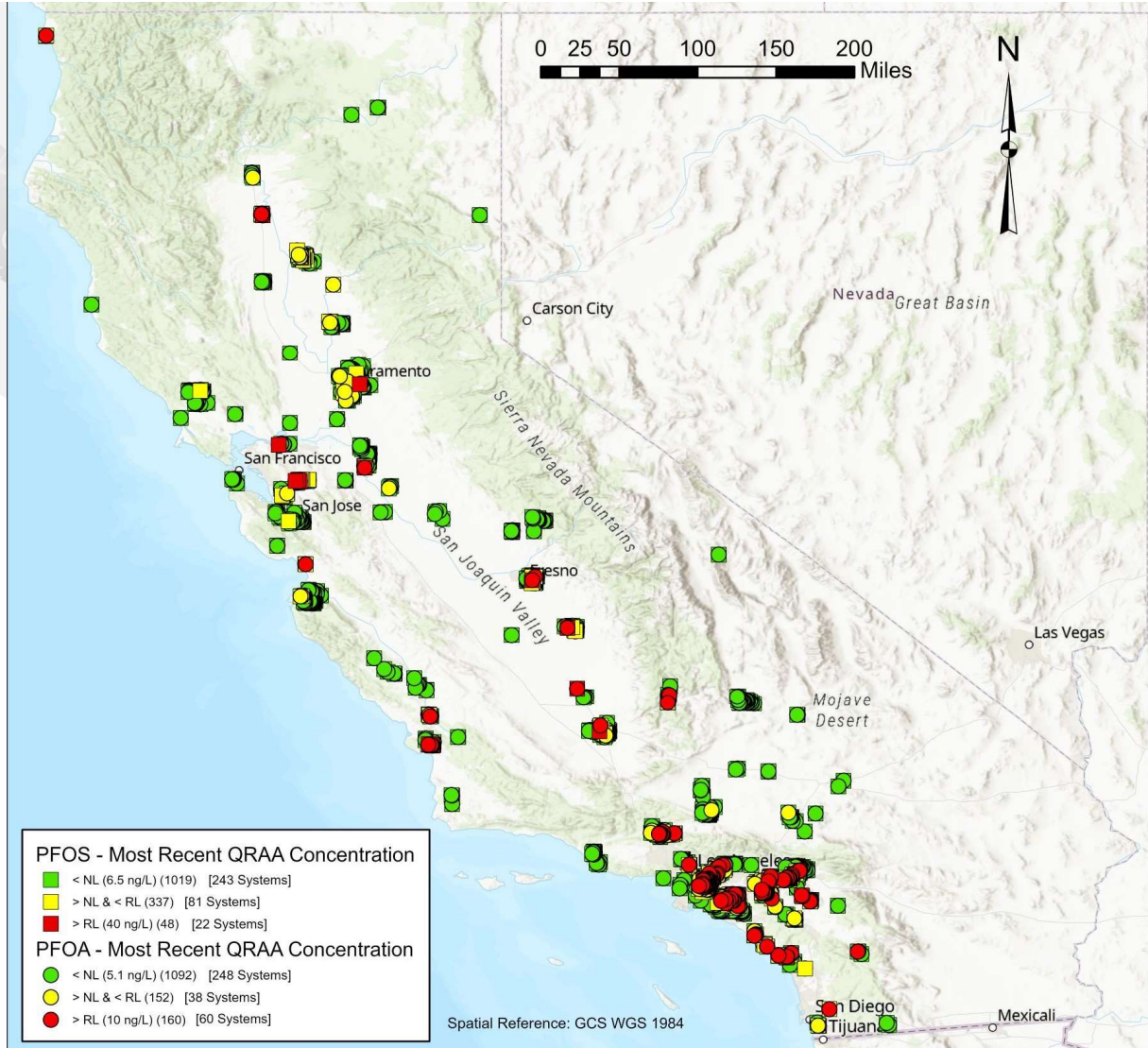
PFAS is also in Groundwater

Data downloaded in February 2022
 Samples analyzed using the DoD QSM (38 analytes)
 Pollution Burden Percentiles from CalEnviroScreen V4.0



PFOA and PFOS exceed the Drinking Water Response Level in some areas

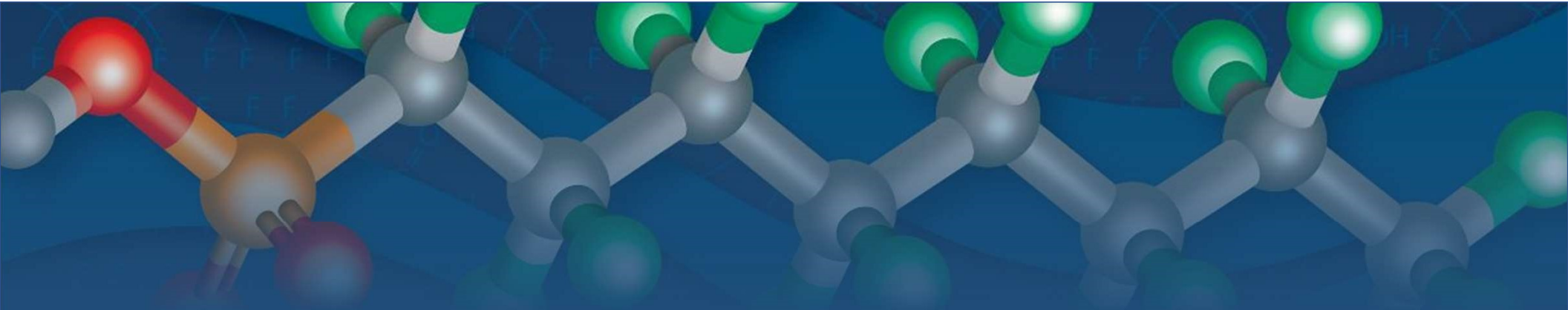
Data downloaded in February 2022 – raw water results
 NL = Notification Level; QRAA = Quarterly Running Annual Average
 RL = Response Level
 PFOA and PFOS analyzed using EPA Method 537.1
 PFOA: = NL = 5.1 ng/L, RL = 10 ng/L □ PFOS: NL = 6.5 ng/L, RL = 40 ng/L



State Water Board PFAS Information Item

For More info about PFAS:

- Informational item at State Board meeting
April 5, 2022 9:30 AM
- https://www.waterboards.ca.gov/board_info/agendas/2022/apr/04_05_2022_agenda_links.pdf



Vapor Intrusion

Vapor Intrusion

- **Final Draft Supplemental Vapor Intrusion Guidance** – Pending final review/approval. Possible release spring 2022.
- **Water Board is moving to policy** – Update to State Board Resolution No. 92-49 in process. CEQA scoping meetings to be held April 28.
- **Link to CEQA Scoping Meeting Information:**
https://www.waterboards.ca.gov/water_issues/programs/site_clean_up_program/vapor_intrusion/

How to use guidance?

- Menu of tools – not requirements or regulations
- Represents current science
- Good technical approach
- Describes factors to consider in site specific decisions
- Provides options and describes when other approaches may be appropriate
- Not a prescriptive cookbook

Need Policy for enforceable minimum requirements



State Board Resolution 92-49 Update – Tentative Schedule

April 29, 2022
– Public CEQA
Scoping

**December
2022** –
Release draft
amendment

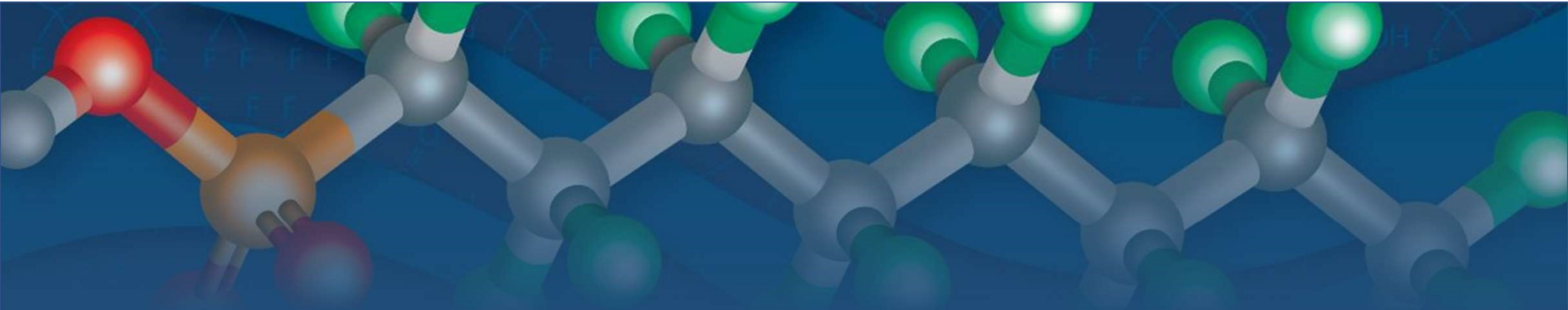
Spring 2024 –
Anticipated
adoption

**Spring/
summer 2022**
– Stakeholder
outreach and
drafting

2023 –
Public review
and board
consideration

Conclusions

- SCP successful at cleanup and closure of over 10,000 sites
- SCP is fairly stagnant in open cases & closure rates
- More cases than any agency can do alone. AB304 helps us document and support the work that local agencies do.
- Data from PFAS is coming in, and indicating that there are elevated concentrations in multiple media, especially near airports and landfills
- Final Draft Vapor Intrusion Guidance is anticipated. State Board Resolution No. 92-49 is being updated to make key elements Policy.



Questions