

A path to streamlining California's food safety and water quality regulatory requirements

Regulatory Alignment Study

Summary of Approach and Recommendations



[View the full report](#)

The *Regulatory Alignment Study* explored ways to improve transparency, efficiency, effectiveness, and equity in California's food safety and water quality regulatory requirements without compromising the high standards that protect public health and the environment.

Through hundreds of conversations with producers, agency staff, and other interested parties, Crowe gathered on-the-ground insights and identified specific opportunities for improvement.

The resulting 18 recommendations outlined in this document preserve California's strong protections while enhancing how regulations are implemented by making standards clearer, more consistent, and better coordinated across agencies and program areas.



BACKGROUND

California agriculture is both a pillar of the economy and a vital steward of its natural resources. With nearly \$60 billion in annual sales, California farms produce roughly half of the nation's fruits and vegetables, about 20 percent of its dairy milk, and lead the nation in wine production, all while supporting thousands of jobs across diverse landscapes and communities.

Today, California's producers navigate a landscape of rapid change. Climate volatility, shifting market demands, rising input costs, and evolving regulations are converging – posing new challenges, especially for small and mid-sized farms.

Recognizing these challenges and the importance of a resilient, sustainable food system, in 2022 the State of California funded a Regulatory Alignment Study to identify opportunities to make the State's food safety and water quality regulatory program areas more responsive to the challenges of a changing world.

STUDY GOALS

Producers

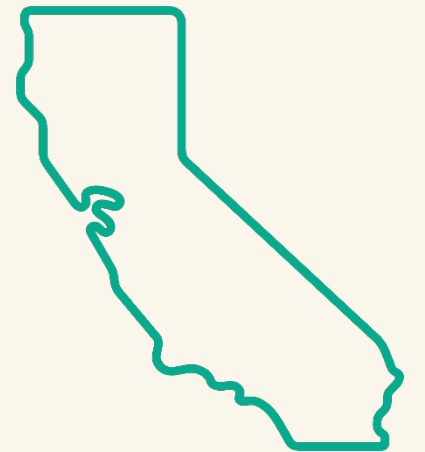
Empower the agricultural community through clearer and more streamlined food safety and water quality regulatory requirements

State Agencies

Support the State of California's data collection and information sharing efforts

The Public

Strengthen environmental and public health outcomes.



By aligning requirements across agencies and program areas, California can reduce complexity, and improve consistency and coordination across producers, agency staff, and the public.

WHY REGULATORY ALIGNMENT IS NEEDED

California's food safety and water quality protections can present complexity for many producers, especially those managing smaller, diversified, or family-run operations.


Navigating multiple permits, agencies, reporting timelines, and digital platforms can be a significant undertaking, especially when layered with market uncertainty, rising input costs, climate-related impacts, and other emerging pressures.


Regulatory alignment makes it possible to:


- Clarify roles, requirements, and timelines across programs
- Reduce duplication in data collection and reporting where feasible
- Improve communication and feedback loops between agencies and producers
- Coordinate use of systems, portals, and reporting formats
- Expand support for producers of all sizes and operation types.


PROGRAM SCOPE

This Study focused on regulatory alignment across four key program areas that involve significant touchpoints with California's producers. These program areas were selected due to their broad reach, evolving requirements, and the opportunity for enhanced coordination:

 **Produce Safety Program (PSP)** – Administered by CDFA, implements the federal Produce Safety Rule (PSR) under the Food Safety Modernization Act (FSMA) through education, outreach, and inspections of approximately 20,000 produce farms.

 **Irrigated Lands Regulatory Program (ILRP)** – Administered by the State Water Resources Control Board and nine Regional Water Quality Control Boards (collectively Water Boards), regulates water discharges from approximately 6.5 million acres (7.5 million estimated acres eligible for enrollment) of irrigated farmland through general regional Waste Discharge Requirements (WDRs) or conditional waivers of WDRs.

 **Confined Animal Facilities (CAF) Program** – Overseen by the Water Boards, regulates manure and wastewater discharges from roughly 1,900 CAFs through general regional WDRs or conditional waivers of WDRs.

 **Winery Order¹** – Adopted by the State Water Board in 2021 and implemented by the Regional Water Boards, is a statewide general WDR permit that sets tiered compliance requirements and is available for about 2,100 wineries that discharge winery waste (process water and/or process solids) to land.

^[1] The Winery Order is one permit within a multitude of state, regional, and individual permits regulating waste discharges to land and administered by the Water Boards' WDR Program. The recommendations detailed in the report aim to support those wineries eligible for Winery Order coverage and are not intended for all wineries statewide.

Through hundreds of conversations, Crowe gathered on-the-ground insights for identifying regulatory alignment opportunities.

WHAT WE HEARD

In hundreds of conversations gathered through listening sessions and workshops, both producers and agency staff articulated a similar vision: making regulatory processes more coordinated, transparent, and accessible for producers, agencies, and the public.

ENGAGEMENT BY THE NUMBERS

30
Interviews
with subject
matter
experts

Helped Crowe map food safety and water quality regulatory requirements, including reporting and compliance processes.

8
Public
workshops

Communicated feedback on proposed regulatory pathways described in the Concept Paper.

70+
Listening
sessions

Provided experiences with the State's food safety and water quality regulatory programs and requirements.

29
Submissions of
written
feedback

Communicated feedback on proposed regulatory pathways and draft recommendations.

40+
Interviews
with agency
staff

Provided essential insights into program implementation, processes, and technology.

20
Interviews with
agricultural
technology
experts

Informed the feasibility of incorporating specific technologies into the final recommendations.



Real-world experiences with food and water quality requirements highlighted opportunities and informed many of the recommendations.

EXAMPLES FROM THE FIELD

Producers of different sizes, crops, and regions shared their experiences with food safety and water quality regulations.



Mid-size leafy greens grower,
Salinas Valley

This grower undergoes annual third-party audits through the Leafy Greens Marketing Agreement (LGMA), which aligns closely with the PSR. Despite this, they received a PSR inspection from CDFA.

"It felt redundant and frustrating. We have already demonstrated compliance through LGMA."



Small-scale, multi-crop grower,
Central Valley

This farmer grows over 40 specialty crops on 10 acres and participates in both the State Organic Program (SOP) and ILRP. Although they track fertilizer use for organic certification, ILRP requires per-crop nitrogen application and yield data to be reported in the INMP.

"I spend more time guessing and formatting than actually managing nutrients."



Large dairy operator,
Central Valley

This operator submits an Annual Report with groundwater monitoring data and waste management updates, currently by email as a Portable Document Format (PDF), to the Regional Water Board.

"It takes hours to compile and submit the same information every year and I don't know if anyone actually looks at it. There's no confirmation or feedback."



Small family-run winery,
Sonoma County

This winery learned it may need to enroll in the Winery Order but was unclear on how to proceed. Even after hiring a consultant, they submitted an incomplete report, resulting in delays.

"We tried to follow the instructions, but every time we thought we had the right information, we were told something else was missing. It felt like we were always one step behind, and it delayed our enrollment."

These 18 recommendations lay out a path for modernizing regulatory processes and systems and building stronger alignment across agencies.

Foundational Opportunities

Short-term, lower-complexity solutions that build momentum and cross-program consistency.






Developmental Opportunities

Medium-complexity solutions that enhance data sharing, reporting, and coordination across systems and agencies.





Transformational Opportunities

Long-term solutions that support technology modernization, such as unified reporting approaches and integrated data systems.







Foundational Opportunities

-  **Recommendation 1**
Establish a Small Farm Regulatory Support Team at CDFA
-  **Recommendation 2**
Expand Coordinated Outreach and Education through Agency Staff and Partners
-  **Recommendation 3**
Develop a Technical Assistance Request Tool that Links to the PSP Portal
-  **Recommendation 4**
Empower Representative Monitoring Programs to Voluntarily Support Annual CAF Program Reporting
-  **Recommendation 5**
Support Ongoing Efforts to Become an Authorized Local Agency Oversight Program

Developmental Opportunities

-  **Recommendation 6**
Develop a Department-Wide CDFA Farm Inventory
-  **Recommendation 7**
Work with FDA, USDA, and Industry to Determine how Producers' Audit Certificates can Inform PSP Risk-Based Inspection Prioritization
-  **Recommendation 8**
Support Industry Efforts to Establish Water Boards-Accepted Sustainability Programs
-  **Recommendation 9**
Implement Electronic Reporting for the CAF Program
-  **Recommendation 10**
Simplify the Irrigation and Nitrogen Management Plan for Small, Diversified Farms Where Applicable
-  **Recommendation 11**
Invest in GeoTracker System Enhancements for Agricultural Programs
-  **Recommendation 12**
Develop Agricultural Water Quality Progress Dashboards

Transformational Opportunities

-  **Recommendation 13**
Establish a California Agricultural Data Exchange Framework
-  **Recommendation 14**
Develop a Map to Help Track Agricultural Cross-Program Participation and Oversight
-  **Recommendation 15**
Enhance Agricultural Permit Navigation with a Digital Decision Support Tool
-  **Recommendation 16**
Modernize CDFA Program Platforms to Align with PSP Portal Architecture
-  **Recommendation 17**
Validate and Recognize Qualified Third-Party Food Safety Audits to Inform PSP Oversight
-  **Recommendation 18**
Centralize Nitrogen Data to Advance Groundwater Protection

Data Governance: A Core Enabler Across All Recommendations

Strong data governance ensures information is accurate, secure, and actionable to support transparency, protect proprietary data, and make smarter, streamlined regulation possible for producers, agencies, and the public.



Inter-Agency



Produce Safety Program (PSP)



Cross Water Quality Program



Irrigated Lands Regulatory Program (ILRP)



Confined Animal Facilities (CAF) Program



Winery Order

Food safety and water quality requirements can be more responsive to the challenges of a changing world.

LOOKING FORWARD

Regulatory alignment is not a one-time study, but an ongoing process rooted in continuous improvement and a central question: *How can we implement smarter requirements that are more transparent, efficient, effective, and equitable?*

The 18 recommendations in the report provide solutions to streamline California's food safety and water quality regulatory processes while upholding the State's environmental and public health protections.

While some of these solutions can be implemented now, many will need sustained attention, interagency alignment, and additional investments.

Sustaining momentum will require resources, committed leadership, and cross-sector collaboration. It also depends on a shared understanding of what regulatory alignment means and how important the benefits are to the agricultural community, agency staff, and the public.

[View the full report.](#)

This report provides final recommendations and implementation steps for CDFA, CalEPA, and the Water Boards. Crowe did not evaluate whether the food safety and water quality regulations and requirements in scope of the Study should be changed. Instead, Crowe focused on how these regulations are implemented, and how administrative processes and systems could be aligned to better support producers and state agencies alike.

