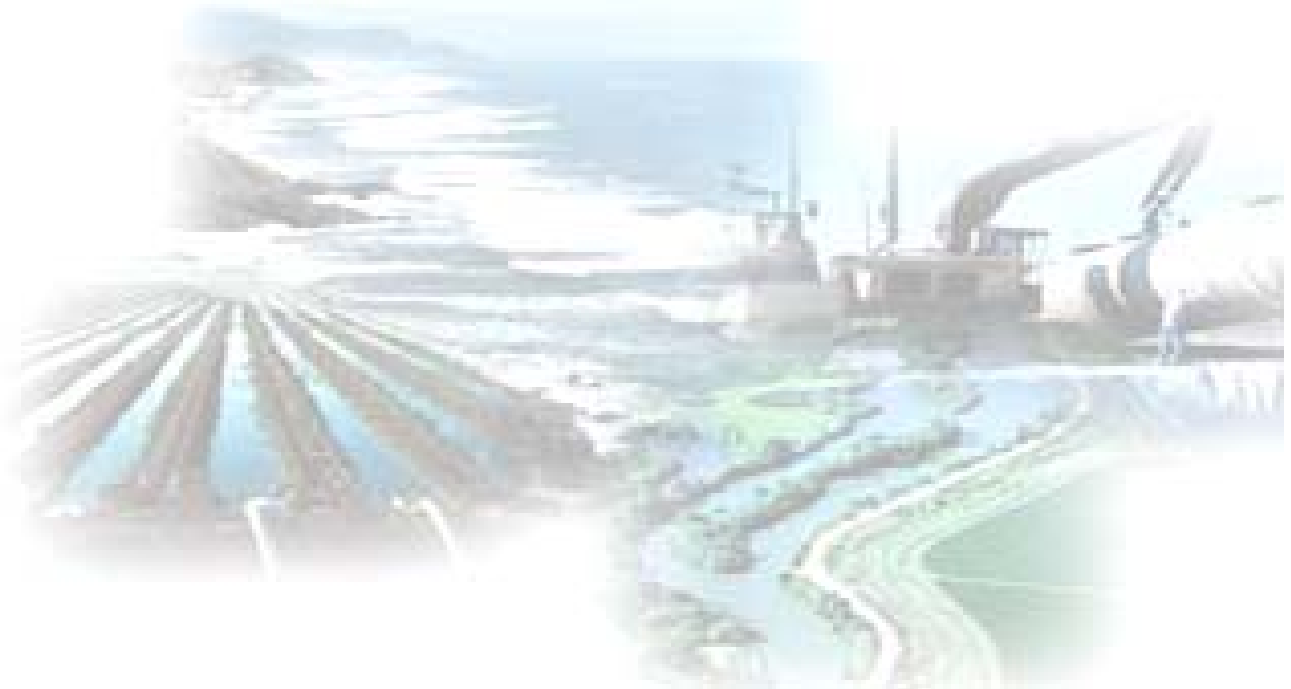


**MEETING NOTES OF THE  
WATER BOARDS STRATEGIC PLANNING  
STAKEHOLDER SUMMIT  
MARCH 12-13, 2007**



# STAKEHOLDER SUMMIT SUMMARY

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## **WELCOME AND OPENING REMARKS**

### **Opening Remarks**

**Linda Adams, Secretary, California Environmental Protection Agency**

Secretary Adams opened the Summit by stressing the importance of clean water for all beneficial uses in California and the role of Water Boards in developing solutions and clean water initiatives. The Water Boards are asking for help from stakeholders in identifying priority Water Board programs, developing measurable goals and outcomes, and providing appropriate consistency across regions – while retaining the flexibility to address local needs.

Ms. Adams commended the dedication of staff and members of the Water Boards in implementing initiatives, defining priority areas, and coordinating permits, enforcement, and data management. The Secretary remarked that the Strategic Plan Update would be worthwhile, and she is looking forward to the results of the Summit.

### **Overview of the Planning Process**

**Tam Doduc, Chair, State Water Resources Control Board**

Ms. Doduc emphasized that the Stakeholder Summit represents the first step of a very active and stakeholder-engaged process to update the Strategic Plan for California's Water Boards. The process will look at setting priorities, quantitative targets, implementation options, and accountability mechanisms. The final result will be a strategic plan that will be integrated into the programs of the State Water Resources Control Board (State Board) and the Regional Water Quality Control Boards (Regional Boards).

The Stakeholder and Staff Summits will be followed by regional workshops. All regional meeting dates will be posted and stakeholders are encouraged to help announce the workshops. The Boards welcome stakeholder participation at the regional sessions. This summer, the proposed Strategic Plan update will be presented to the Water Quality Coordinating Committee (WQCC) at a public meeting for consideration. The WQCC consists of all Water Board appointees and meets twice a year.

Ms. Doduc commended the dedication of Regional Board members and staff, and thanked everyone attending the Summit for participating in a late night workshop session, to be part of the discussion on water quality and water right strategies. She noted the importance of the strategic planning process to the Water Boards, as well as the personal importance that she places on the process.

## **Agenda Review**

**Lisa Beutler and Susan Dupre, Summit Facilitators, Center for Collaborative Policy**

Lisa Beutler presented stakeholders with the agenda they would be working with over the course of a day and a half. Summit participants referenced the workbook and agenda, which highlighted the basic sets of information to be developed during the Summit – including input on priorities and measuring success. The evening begins by working on the Water Boards' history and context. In talking about the past, discussions will focus on the rich history of the Boards and on lessons learned over time that will take the Boards into the future. The evening concludes with a conversation on Water Board principles and values.

The following day starts by talking about critical trends for the next 5 -10 years. Summit participants will also discuss how both stakeholders and Water Boards are currently addressing some of these trends, as well as describing preferred responses. The following discussion involves looking at current Water Board programs and then generating ideas on program priorities and approaches. The afternoon session begins with considering how to measure and define success. Finally, the participants will be addressing a WQCC question regarding variation across the Regional Boards. Some tension currently exists between the need for statewide policy consistency and the need for regional flexibility to address what happens on the ground in the regions. Both variation and consistency are necessary and stakeholders will share their perspectives on finding the right balance.

Input and feedback are being collected through the Summit and regional workshops. Both forums will use workbooks that allow participants to provide additional details or to share insights. The Water Boards are interested in hearing what others have to say. To collect that input, the majority of the Summit will be working in groups. On the first day, groups will consist of individuals representing different interests. On the second day, groups will consist of individuals sharing similar interests. Each group will work with a facilitator and share all ideas on paper. The materials will be used to write the draft Strategic Plan, as well as and Summit proceedings. Within each group, members will be responsible for recording, reporting back to the full group, and keeping time. If participants have additional information to share that can't be captured within the time allocations, they are encouraged to record their ideas in the workbooks and turn them in at the summit conclusion.

## **WATER BOARD HISTORY AND TIMELINE**

### **Overview**

Susan Dupre introduced the first discussion item, noting the best place to start a strategic planning process is with the past. Histories often provide critical lessons – some that might be preferable to forget, but need to be remembered. Summit participants will create a timeline showing key milestones, accomplishments, and other information that would help understand the history of the Water Boards. Over time, State and Regional Board roles and responsibilities have shifted; participants were encouraged to pay particular attention to external events that caused the Board to shift direction over time.

Tom Howard, the State Board's Chief Deputy Director, has worked with the State Board for 22 years and was asked to provide a brief summary of key historical highlights. In terms of old history, the Water Rights Board was created in 1913 and the Regional Boards were established in 1949 through the Dickey Water Pollution Act. The newer history begins in 1967, with the creation of the State Board and the 1969 Porter-Cologne Water Quality Control Act. In the late 1960s and 1970s, authority for the federal Clean Water Act is delegated to the nine Regional Boards and implementation occurs through the Basin Plans. The 1970s saw the establishment of the National Pollutant Discharge Elimination System (NPDES) and construction grants program.

In 1978, Decision 1485 was adopted and initiated modern regulation of the Delta. During the 1980s, the underground storage tank cleanup program was started, representing the largest monetary program of the Water Board. In 1984, the Board ordered a cleanup of Kesterson Reservoir and monitoring of agricultural drainage discharge. Since 1990, attention has shifted from point source to non-point source pollution. Various programs have been funded and defunded and waivers for agriculture and timber activities have been implemented. Focus has been on enforcement and the NPDES program has seen significant expansion.

For the future, augmentation of Russian River flows will be a key issue. Mr. Howard noted that the one constant for the Water Boards has been constant change. Organizations have to change to adapt and the strategic plan will guide what or how changes will occur. The Water Boards are hoping for some insight into that from Summit and regional workshop participants.

## **Key Milestones and Events**

### **Group Reports**

Working in small groups of mixed interests, Summit participants considered key milestones and events that have shaped the history of the Water Boards. As each group reported out, group members added items to a large timeline posted on the wall. The resulting Water Boards timelines is presented in the following pages.

## **Lessons Learned**

### **Overview**

In looking at the timeline and historical context, participants were asked to identify lessons that have been learned from the past. Specifically, groups were asked to select the top three critical lessons that the Water Boards should give special attention to and take forward into the future.

1840s-1890s	1900 - 1950	1950s	1960s
<p>1848 - Pueblo water rights; Treaty of Guadalupe Hidalgo</p> <p>1850 - Common Law Riparian Rights established</p> <p>1872 - Doctrine of Appropriative Rights established</p> <p>Balancing gold rush, navigation and agricultural needs</p> <p>1884 - Sawyer decision stopped hydraulic mining</p> <p>1886 - California Doctrine establishes that both riparian and appropriative water rights exist in a single stream</p>	<p>1901 - Pomeroy decision</p> <p>1902 - LADWP formed</p> <p>1905 - Creation of Salton Sea = flooding</p> <p>1906 - First canal to Imperial valley built</p> <p style="text-align: center;"><b>1913 Water Commission Act – Water Rights Commission</b></p> <p>1913-1914 Separation of groundwater and surface water regulation</p> <p>1923 - water appropriation by permit only</p> <p>1940 - All American Canal</p> <p>1940s - First California Water Treaty with Mexico (start of "4.4")</p> <p>1943 - California Water Code established</p> <p>post- 1945: "Better living through chemistry"</p> <p>1949 Dickey Water Pollution Act creates nine Regional Water Boards</p> <p>1956 - State Water Rights Board created in the same legislation that created the Department of Water Resources</p>	<p>7-state Colorado River Compact</p> <p>Central valley Project</p> <p>State Water Project</p> <p>1956 - California Legislature shuts down Bay Delta salmon fishery due to CVP impacts</p> <p>1959 - State Water Rights Board proclaims state policy that it is "not in public interest to maintain salmon fishery"</p>	<p>Environmental movement changes attitudes about water</p> <p>Population growth - driver for change</p> <p>1963 - State Water Pollution Control Board renamed "State Water Quality Control Board" with additional scope beyond sewage and industrial waste control</p> <p>1967 the "State Water Quality Control Board" and "State Water Rights Board" were merged and the "State Water Resources Control Board" came into being</p> <p>1968 - SWRCB Resolution 68-16 to maintain high quality waters (anti-degregation)</p> <p>Kerry Mulligan - Board chair 1966-1972</p> <p>1969 Porter-Cologne Water Quality Control Act</p> <p>1969 National Environmental Protection Act</p>

1970s	1980s	1990s	2000s
<p>1970 - EPA requires Ambient water quality standards</p> <p>California Environmental Quality Act (CEQA)</p> <p>1972 Federal Clean Water Act; swimmable, fishable waters; shifting from program- to watershed-based planning</p> <p>Win Adams, Chair 1972-76</p> <p>1973 - Federal Endangered Species Act</p> <p>1973-1974 Areas of Special Biological Significance (ASBS) established</p> <p>Basin Plans adopted</p> <p>1975- Beneficial water use determined</p> <p>1976-1977 Drought and subsequent emergency conservation measures</p> <p>John Bryson, Chair 1976-79</p> <p>1976 - Coastal Act; Forest Land Management and Policy Act</p> <p>1978 - Proposition 13</p> <p>D1485 - Bay Delta WQ Plan</p>	<p>Carla Bard, Chair 1979-82</p> <p>1981 - Forest Service BMPs gain EPA-SWRCB approval</p> <p>1982 - Peripheral canal defeat</p> <p>Carole Onorato, Chair 1982-1985</p> <p>1983 - Public Trust (Audubon)</p> <p>Underground storage tank program</p> <p>1984 subchapter on land discharges</p> <p>1985 - Adopted Kesterson order</p> <p>Shift from technical standards to water quality standards</p> <p>1986 Implemented toxic pits cleanup</p> <p>Raymond Stone, Chair 1985-86</p> <p>Don Maughan, Chair 1986-92</p> <p>1987- first groundwater strategy</p> <p>1988 - Legislature reverses salmon policy' draft Board order on Delta freshwater inflow deficit ignored</p> <p>1989 winter-run salmon ESA listed</p> <p>1987-1992 drought</p> <p>1989 - Non-point source strategy</p> <p>301 (h) waivers; CERCL funds; county groundwater ordinances;</p> <p>AB 1803 - well investigation;</p> <p>Bay-Delta organizations/programs</p>	<p>1990 - Section 319 (h) grant funding</p> <p>1990 - Stormwater regulations</p> <p>John Caffery, Chair 1992-1998</p> <p>Mono Lake (Inyo County v. LADWP) Subterranean streams</p> <p>Bay Protection Toxic Hot Spots</p> <p>Inland surface water, bays, estuaries</p> <p>Containment zones/groundwater cleanup</p> <p>Garapatta Decision</p> <p>Deer Creek Decision</p> <p>Watershed Management Initiative</p> <p>CZARA - Non-point policy</p> <p>Basin plans revised</p> <p>Decisions 1623, 1625, 1641</p> <p>Restoration Ecology</p> <p>SIP remanded</p> <p>CALFED</p> <p>EDW</p> <p>Biosolids regulations 40CFR503</p> <p>SF Bay and Bight monitoring programs</p> <p>legacy pollutants</p> <p>increasing privatization of water</p> <p>AB 982 - public advisory group</p> <p>beach water quality standards</p> <p>continued watershed management</p> <p>waste discharge requirements</p> <p>1997 -TMDL lawsuits</p> <p>James Stubchaer, Chair 1998-2000</p>	<p>Arthur Baggett, Chair 2000-2005</p> <p>Yuba decision</p> <p>TMDLs (Squaw Creek, Cache Creek)</p> <p>Quantified Settlement Agreement</p> <p>Shift from pollutants to pollution</p> <p>Stormwater/development requirements</p> <p>Hydromodification mgmt. plan</p> <p>SUSMP/C.3 - Bellflower</p> <p>Ag waiver sunsets</p> <p>reuse and recycled water</p> <p>perchlorate detection technology</p> <p>Phase II municipal stormwater permits</p> <p>NSP policy - permitting everything</p> <p>Funding - Prop 40, 50, 84</p> <p>L.A. River trash TMDL</p> <p>Mandatory Minimum Penalties</p> <p>GAMA - groundwater monitoring</p> <p>SWAMP - surface water monitoring</p> <p>Sax report - groundwater</p> <p>CalEPA EJ recommendations</p> <p>SB 221 - water for growth</p> <p>timber harvest plans/timber waivers</p> <p>court decisions (isolated waters; TOSCO; City of Burbank; San Diego and LA stormwater; water rights fees; Healdsburg; Paterno )</p> <p>Land use/TMDL approach - Tahoe</p> <p>Tam Doduc, Chair 2005-present</p>





## Group Reports

As groups reported back the key results of their discussions, they identified the following critical lessons and insights:

- Opportunities for strategic partnerships exist within and across other organizations. The scope of work is so extensive that no one agency can do it all. Partnerships are essential to leverage existing authorities and resources. Federal and state relationships are changing and agencies will need to work better together.
- Water rights have been pitted against water quality – this separation has created problems for planning and evaluation. There are no longer water rights adjudications. A permanent and adequate funding source is needed to create a water rights program that California needs and deserves.
- A historical lack of enforcement has led to a gradual drive for greater enforcement and consistency. Legislation and policy must be harmonized to support enforcement – there is a disconnect between the Clean Water Act and the Drinking Water Act.
- Responses have often been reactive in nature. An approach needs to transition responses from a reactive to proactive mode. Maintain the foresight to be proactive.
- The State Board needs to become more efficient and tactical in setting priorities and establishing long-term goals. These need to be consistent and clearly communicated.
- The diversity of water quality issues requires diversified response. Need to consider climatology and geology, and need to develop new strategies for addressing non-point sources.
- Integrated Regional Water Management Plans (IRWMPs) are a good model for integrating programs throughout watersheds. Watershed management approaches help reduce downstream impacts – it’s all connected.
- Science-based research should support science-based regulation – the Air Resources Board's approach to address research needs is a good example of this. Environmental values and monitoring results should drive regulation.
- Policies need to have flexibility so that the Boards can make modifications to address new information (adaptive management). Programs need to be reviewed and revised based on results and environmental conditions. Encourage innovative approaches.
- Population growth will be a key driver – more public education is needed. Provide information to legislators.
- The State Board provides a unique forum in listening to those who disagree and creating a fair judgment.

# PRINCIPLES AND VALUES

## Overview

Summit participants referenced their workbooks and reviewed the strategic planning guidelines issued by the Department of Finance. Participants also reviewed the Water Boards' Vision and Mission. As noted, unless organizational responsibilities shift significantly, a vision and mission endure over time. Organizational principles and values describe how an agency implements its vision and mission, in working to achieve desired conditions (long-term goals or outcomes). Groups were asked to discuss how the principles and values, as well as desired conditions, might be changed and why.

## Group Reports

### **Principles and Values**

- Add a new item: “Collaboration”
  - partnering with others to accomplish mission; internal and external leadership
  - exchange of expertise, solutions, and ideas brought into play
  - includes education and outreach (what Water Boards do and why)
- Add a new item: “Transparency/Accountability”
  - clear, consistent, and transparent accountability for actions and results
  - OK to acknowledge when wrong
- Protection:
  - include public trust resources and restoring water
  - link water supply and water quality
- Service: more common-sense decision-making; “can do” attitude
- Integrity:
  - include “sound science” into the description
  - consider making environmental justice its own principle
  - decision-making considers economic factors
- Leadership:
  - working with other agencies and Boards regarding impacts to water
  - continuing education of staff and Board members
  - serving as a catalyst to make things happen; be willing to take risks
- Professionalism:
  - consistency, efficiency, and efficacy
  - manner of responding to stakeholders
- Other comments:
  - review principles and values periodically for appropriateness; revise as needed to address new information or changing conditions
  - 5-year programs are based on some political cycle; adopt longer-term planning (e.g. 50 years) to consider long-term changes

## Desired Conditions

- Add a new item: “California recognizes the need for, and provides, broad-based funding for water programs.”
  - broad-based ownership provides stability and innovation
  - understand the relationship between water impacts, education, and innovation
  - gaining consensus that there’s a problem to be solved
- Desired Condition #1:
  - organizational conditions should be secondary to water resource conditions
  - timely approaches
  - program integration into watershed
  - increased technological capacity for effective file-sharing and spatial analyses
  - webcasts and expanded participation
- Desired Conditions #2, 3, and 4
  - add a condition that integrates these outcomes (still silo thinking) – water is water
  - keep hydrologic cycle in mind when making decisions
  - add concept of sustainability for ecosystems and water rights
  - interconnectivity of surface water and groundwater
  - fish are edible
  - need a nexus between water quality and water supply
  - what defines “fair and equitable” or “highest and best use”? market systems may not protect water resources
  - ISO 19000 socioeconomic and environmental benchmarks
- Desired Conditions #5
  - should be a two-way exchange
  - increase information, science, education, and consensus-building for individual and stakeholder processes

## Overarching Themes

Summit participants were asked what overarching themes emerged out of the group reports. The key themes included: collaboration, education, transparency, integrity, and “water is water.”

## CONCLUSION OF DAY 1

Lisa Beutler and Susan Dupre previewed the next day’s activities, which include working on trends and looking at priorities and performance measures for current programs. Two participants were asked to volunteer to recap the evening’s activities in the morning for newly arriving participants.

## DAY 2

### 1. ADDITIONAL DISCUSSION OF DAY 1 CONCEPTS

Before the second day was officially convened, participants were asked to expand some key concepts that emerged from the previous evening's discussion. Facilitators recorded additional ideas regarding leadership, collaboration, and the concept of "water is water."

- Additional discussion on leadership addressed the idea of integrating Water Board activities and priorities with other State departments and Boards. This would enhance opportunities to leverage staff and funding resources. Collaboration with federal agencies, Tribes, and other organization was also encouraged. Outreach to other entities supports proactive and innovative approaches and solutions, while creating a more comprehensive understanding of water programs in relation to other efforts.

Leadership also involves internal relationships, capacities, and philosophies. Better integration was encouraged between the leadership and board members for both the State and Regional Boards. Water Board leaders will need to work collaboratively with all partners to establish high-level objectives that may be issued across multiple state agencies. Water Board leaders also need to establish, articulate, and maintain Board priorities. These priorities should provide consistent guidance – revisions to priorities should be based on demonstrated reasons or evidence.

- The concept of collaboration also involves the building of relationships with others, as described for leadership. This includes better coordination and communication within and between Water Board divisions and regions, as well as with external organizations. This dialogue might be established on a regular schedule, perhaps through combined roundtable meetings. Water Board planning documents should be standardized, to the extent possible, with similarly structured sections and easy to read summaries. This should not discourage the use of existing processes, information, and formats developed by other regions. Collaboration would include comparing strategic plans, pending actions, hot topics, etc.

State and Regional Boards need to take the lead in working with local agencies on matters relating to science, research, and quality assurance. Technical teams should be identified up-front that would be consulted when issues arise – this would support buy-in for determining best approaches. The universe of stakeholders would work together to ask the right questions and get them answered. Better collaboration would allow public education regarding water programs to build on other outreach efforts.

- The idea that "water is water" emphasizes the interconnectedness of all water resources: surface water, groundwater, stormwater, desalinization, and water conservation, recycling, and reuse. This interconnectedness requires looking at the entire hydrologic cycle and entire watersheds (headwaters, river systems – including riparian and floodplain elements, and disconnected/non-federal waters). This connectivity must be:

- reflected in the Water Boards' long-term goals;
- used to combine and integrate water policy and programs relating to water supply, water rights, and water quality; and
- addressed in protecting public trust resources, including fisheries.

This philosophy would result in a watershed approach being adopted both on-the-ground and institutionally. Suggestions for addressing the larger, interrelated system included references to the North Coast water rights process (AB 2121), determining energy calculations for water use (AB 32), and adopting aggressive Best Management Practices (BMPs) for water conservation. Specific targets for two efforts were mentioned: a 1 MAF (million acre feet) reuse schedule and timeline – 50% reuse by 2025 and 100% reuse by 2040; and that coastal municipal water supply by 2020 would consist of 50% desalination using renewable energy.

## **2. RECAP OF PREVIOUS EVENING**

Linda Sheehan, California Coastkeeper Alliance, and Jeanette Hayhurst, City of Barstow, provided a recap of the previous evening's activities. A highlight was provided on the timeline of historical events. Several key lessons that surfaced in reviewing that history included: trends in water policy accompany political cycles and droughts; huge opportunity exists for developing strategic partnerships; historical lack of enforcement; need for upstream watershed management; approaches are often reactive, not proactive; need for the Board to strengthen priorities and communication, as well as provide consistent – yet adaptive – direction; and the lack of adequate permanent funding.

The discussion on principles, values, and desired conditions resulted in a number of recurring and overarching themes:

- Protection activities need to encompass all water resources. All aspects of the water cycle and hydrologic systems are connected. Programs and policies need to look at impacts as a whole and assure that problems are not exported to other parts of the globe.
- Leadership and vision can leverage internal and external resources, through strategic partnerships, to accomplish the Water Boards mission. Both knowledge and authority need to be leveraged to that watershed management can be fully implemented.
- Principles of accountability and transparency require better communication and involvement with the regulated community and the larger public in developing potential solutions. Often, it is difficult to know how decisions are made and whether enforcement actions are being taken. Better information should be available regarding water quality throughout the state.

# CRITICAL TRENDS AND ISSUES

## Overview

Summit participants were asked to help create a picture of the larger world in which the Water Boards operate. This involves capturing the broadest possible socio-economic and technical context for the work of the State and Regional Boards. As a group brainstorming session, participants identified key trends that impact that Water Boards and need to be considered when planning for the future. These trends were graphically recorded through the use of a mind-map.

The trends needed to describe increasing or decreasing patterns – trends would not describe solutions or conditions. As participants provided a trend, they were also asked to give an example or brief description of the trend. As conditions vary across regions, it was possible to have one trend be valid in one area of the state and the opposite trend be true for another area of the state. Participants did not need to agree on the trends that were posted.

The relationship between trends is an important consideration. Those who provided a trend were asked to explain where the trend belonged – did it represent a new category or was it an element of an existing category of trends? Connections between different trends or categories of trends were also noted. The resulting mind-map (Appendix A) captured the complexity of the setting for the work of the Water Boards.

## Group Discussion

During the brainstorming session, a number of key trends were identified as critical in planning for the future:

- Increased water demand and decreased water supply will increase interest in developing local and new sources of water supply. Decreased water supply will result from factors such as reduced snowpack (associated with global warming) and deterioration of water storage in existing dams and facilities (from sedimentation). Decreased supplies will also impact water availability for natural systems. Greater emphasis will be placed on the relationship between water quality and supply. Greater attention will also be given to water transfers and reoperation of water supply projects.
- Environmental stressors will continue to impact water resources. Water quality will be affected by a variety of factors: emerging contaminants, such as endocrine disruptors and pharmaceuticals; aerial deposition; by-products from energy generation; and sediment contamination. Over-appropriated rivers, introduced species, and reduced capacity for waste storage will adversely affect ecosystems and riparian habitat. Global warming will have consequences for sea-level rise, larger flood events, erratic weather patterns (impacting food production), and different patterns of water flowing from different places and different times than is common today.

- Changing political realities will include greater use of partnerships; greater awareness and involvement of the public, regulated community, Tribes, and other stakeholders; highly fragmented water governance structures, which affect water resource management; and greater use of litigation to address differences. Political realities also include less acceptance of risk and greater expectations placed on the Water Boards.
- Changing demographics – such as increasing population, changing population composition (aging, ethnicity, disparity between rich and poor), and location of population growth (move inland and away from urban centers) – will impact water usage, access to safe water supplies, and infrastructure requirements.
- Increased costs for projects will underscore the need to pay for protection of water quality and water resources. Lack of funding for wastewater infrastructure improvements will result in costs to public health. Constraints on local agencies to raise funds through rates or taxes will hamper necessary improvements and maintenance. Greater regulatory and permitting costs will affect the feasibility of projects considered by the regulated community. The costs of energy and in moving water supplies will also increase.
- Rapidly changing technology will increase the ability to measure contamination to parts per quadrillion, thereby detecting emerging contaminants at concentrations that were previously undetectable. Technological breakthroughs may support desalination and water recycling strategies, as well as other innovative approaches. Better modeling and data access may contribute to developing the analytical tools to support integrated resource management planning.
- Integrated water resource planning will require comprehensive understanding of all aspects of water resource management. This includes better integration of marine science, to better understand ocean water dynamics and issues, as well as social sciences, to better understand environmental justice impacts and issues. Addressing multiple water resource issues will need to consider a wide range of factors: FERC hydro-licensing renewals; flood control; in-stream flows; and relationships between chemistry, biology, and hydro-modification in natural systems.
- Water quality issues will be more closely linked to water supply – attempting to better match quality with intended use. Source water supplies will not be able to satisfy drinking water standards and as the background levels approach maximum regulatory levels, the ability of natural systems to assimilate contaminants (including nitrates and salinity) will decrease. Overdrafting of groundwater and decreased groundwater quality will increase tension over groundwater regulation. Water quality monitoring will guide efforts that focus on pollution prevention, including better integration with land uses and land use planning. Greater use of recycled water will need to address public concerns regarding reuse, as well as removal and disposal of wastewater by-products.

# CURRENT AND DESIRED RESPONSES TO TRENDS

## Overview

Summit participants were asked to work in small groups to analyze the current and desired (or preferred) responses to current trends. Groups were comprised of individuals with like interests: environmental interests; agricultural and timber interests; water treatment facilities; industry; academia, education, and local government; state agencies; State and Regional Boards; and federal agencies. Each group was responsible for selecting two or three trends and describing the current responses, from both stakeholders and the Water Boards, and then outlining a preferred response.

## Group Reports

The groups addressed a broad range of trends in their analyses:

- increased global warming impacts
- increased demand/hardening of uses
- water transfer and supply relationships and environmental impacts
- population growth and land use planning implications
- population growth – changing demographics, increase in wastewater
- reduced options for ultimate disposal of wastes (brine, biosolids)
- need for infrastructure improvements
- effects of contamination on beneficial uses
- increased complexity of water quality (salinity, emerging contaminants, detection technology, economic feasibility, increased public awareness)
- need for more consistent, science-based decisions
- lack of implementation, enforcement, and compliance
- increased regulation and increase in associated compliance costs
- need to complete/update Basin Plans
- state leadership needed for a watershed management approach
- integrated approach for managing water quality protection

In considering current responses to managing these trends and conditions, the groups looked at both stakeholder and Water Board responses. The range of responses varied from defensive to collaborative, from isolated to more comprehensive, from traditional to emerging approaches, and from on-the-ground efforts to planning. Preferred responses would be characterized by innovative, comprehensive, integrated, and collaborative approaches.



- Currently, stakeholder responses involve a wide array of options. This includes litigation; legislation; compliance measures; increased investment in technology, mitigation, monitoring, and reporting; and protection of own interests through economic-based decision-making. Other responses include greater involvement in regional planning; efforts to conserve water and protect water quality; education and outreach (to public and legislature); support for open space; and support for better science.
- Within the Boards, legislative direction, funding constraints, and declining staff levels have resulted in an expanded scope of work with fewer resources. This has created a “bunker mentality” that stifles collaborative partnerships and innovative approaches. Current Board responses include increased regulation; focus on fees, and penalties; and fragmented enforcement and monitoring. Other responses include efforts such as the California Integrated Water Quality System and policies and support for recycled water, low impact development, landscape conservation, and Smart Growth issues.
- Preferred responses, by both stakeholders and the Water Boards, would focus on: better use of sound science in decision-making; full cost/benefit analyses; greater education on and awareness of issues; promotion of reuse; integrated, comprehensive, and collaborative approaches; greater involvement in education and outreach to the public and legislature; incentives for source control; and implementation of floodplain policies.

Preferred responses, by the Water Board, include: greater coordination between Regional Boards; investment in Basin Plan updates; changes in ex-parte approach; better efficiency and accountability for costly programs; better communication with public; better monitoring and availability data; expedited permitting processes; consistent inspections and enforcement; integration of water use, water rights, and federal statutes into Basin Plans and Total Maximum Daily Loads (TMDLs); and expanding staff expertise.

- Currently, funding for water resource protection is supplied through general funds, bond funds, and fees. Preferred responses to provide adequate funding for water resource programs would involve: Prop 218 reform to allow rate increases; assessment of impact fees; better leverage of regional and partner funding; stormwater and multi-objective funding; and broad-based user fees from property taxes, water supply, dischargers, bottled water).

### **Overarching Themes**

Summit participants reported overarching themes as including: better science, adequate funding, coordinated regulation, partnership, basin planning, innovation, education, and depoliticized decision-making.

# CURRENT PROGRAMS: PRIORITIES AND APPROACHES

## Overview

During a working lunch session, groups were asked to: 1) identify priorities for current statewide programs; 2) describe recommended approaches for managing these priorities; and 3) explain why the recommended approaches are the most effective way to manage the priorities.

## Group Work

Groups did not report out their discussions on this item. However, group work was recorded on flip charts that were used to create the following summary.

A number of programmatic priorities were shared across groups. For example, four of the nine groups identified Basin Planning as a priority; three groups identified TMDLs, Water Rights, and Water Recycling/Reuse as programmatic priorities; and two groups reported Stormwater as a priority. Other programs or activities mentioned as a priority area are:

- biosolids
- non-point sources
- monitoring
- full implementation of Porter-Cologne
- implementation of the public trust doctrine
- reasonable use/California construction

The following summaries provide a recap of recommended approaches for the shared programmatic priorities.

- Basin Planning approaches would use collaboration and leveraged partnerships (such as the California Water Plan and Santa Ana Watershed Protection Authority models) to coordinate regional information. Basin plans would be revised with current information, to identify appropriate beneficial uses and both numeric and narrative water quality objectives; the resulting basin plan standards would be applied in permits. Other approaches include a streamlined amendment process, supporting legislation for broad-based funding, encouragement of innovation and risk-taking, better use of science, and better public outreach.

The program would result in the adoption of statewide objectives (e.g. public health objectives); triennial review of all plans and policies; and refinement of beneficial uses. Deviations between standards applied to permits (generally more stringent) and those contained in basin plans would be reconciled. Other results include cross-program analysis, incorporation of land use into Basin Plans, and integration of Basin Plans into Bulletin 160 and IRWMPs.

- TMDL approaches would focus on all sources of contamination and adopt a watershed approach for implementation of solutions. Analyses would consider cost/benefit assessments (to determine net benefit) and the role of offsets. Clear performance measures and adaptive management strategies would guide compliance to improve source control and voluntary compliance.

The TMDL program would develop BMPs, improve strategies for monitoring and reducing non-point source loads, and expedite restoration permits. Other results include a continued focus on geographic priorities; development of monitoring programs that address TMDL effectiveness, cost effectiveness of monitoring, and assessment of beneficial uses (beyond monitoring of pollutants).

- Water Rights approaches would improve workflows on new applications – through better use of watershed-scale programmatic Environmental Impact Reports and water availability analyses that support site-specific permit analysis (e.g. Russian River, stock ponds). Approaches to reduce the current backlog might use third-party outsourcing, with appeals handled by administrative law judges or special hearing officers.

The program would result in better training for staff and an expedited permitting process that integrates requirements associated with the California Environmental Quality Act (CEQA), Endangered Species Act (ESA), and public trust doctrine. The funding issue would be resolved through the use of non-user fees.

- Water Recycling/Reuse approaches would address salinity issues: research on salinity disposal, permitting of brine lines; a mass balance for salinity; and support for statewide source control (e.g. water softeners, etc.). Disincentives should be in place for irrigating with potable water, with incentives created for purple pipes (including legislation requiring purple pipes in new development). Attitudes regarding water reuse are critical.

The program would result in a statewide policy and general permit, with site-specific permitting to determine whether appropriate for use and to consider full net benefit. Improved and consistent use of science would follow EPA and ELAP guidelines and demonstration projects should be supported and encouraged. Funding sources would include use of Prop 50 and Prop 84 funds and a mil tax on imported water.

- Stormwater approaches would shift from addressing runoff to focusing on infiltration and recharge. The program would develop more quantifiable measures and look at integrated resource benefits. A cost balance approach should include an economic analysis/balance, full accounting of costs and benefits, and a feasibility assessment.

In taking a comprehensive approach to stormwater, a consistent statewide policy should be developed. The program should support research and design-appropriate technology, as well as bio-engineering strategies.

- An integrated, watershed approach to water resource assessment, management, and planning would encompass: return flows; closed systems (multi-user systems approach); groundwater recharge; in-stream flows; recognition of hydrologic modification (e.g. how creek channelization modifies beneficial uses); and integration of large areas of federally-owned lands.

An integrated, watershed approach would provide a consolidated and coordinated framework to increase efficient use of resources across the range of Water Board programs. This approach would need to be defined by drawing upon other models, examples, and structures (including the Watershed Management Initiative) and by identifying opportunities to integrate other state, federal and local agencies and programs.

Another programmatic focus is creation of a research division that would oversee scientific data management and analysis. A strong research component would advance good science through third-party peer review, with the reviewing party selected or agreed upon by the Board and stakeholders. Solid research would look at both study design and study review, with results incorporated into appropriate decisions and policies. In support of this, monitoring should be designed and based to meet specified objectives/uses (management questions).

The work groups also identified new programmatic areas, designed to address issues such as consumer products, anadromous fisheries protection, energy and distribution costs for water supply, and agricultural subsurface drainage.

## **PERFORMANCE MEASURES**

### **Overview**

Continuing to work in small groups, the Summit participants were asked to identify performance measures for each priority area. They were also asked to explain why the proposed measures were most effective for monitoring success.

### **Group Reports**

Before reporting out, one group observed that developing performance measures was challenging and requires that baseline data be available. Also, metrics require thoughtful consideration of what it means to develop measurements. Building on the work of the previous agenda item, the common programmatic priorities were again Basin Planning, TMDLs, Water Rights, Water Recycling/Reuse, Stormwater, and an Integrated, Watershed Approach. The measurements and rationale for the measures are summarized as follows:

## Basin Planning

- difficult to measure outcomes; outputs are easier to measure
- triennial updates (superficial?); top 5 Basin Plan items in triennial update; amendments and updated priorities every three years
- revised plan within 5 years; removal of obsolete elements; percentage standards revised
- reduction in salinity at a specific location
- percentage of surface water area that is swimmable (challenge of how to do)
- establish policies to ensure existing permits are consistent with Basin Plans
- integrate Water Boards' strategic plan into Basin Plans
- number of innovative pilot projects tested in region
- funding leveraged from other sources to do Basin Plans; approximately \$200 million in next water bond for comprehensive basin plan update; incentives for regions with updated plans
- funding to environmental projects from enforcement action and compliance projects
- Basin Plan does not hold up major regulatory activities (qualitative measure)
- a minimum of one (1) watershed included in basin plan per year

These metrics are effective in terms of supporting timely issuance of permits, stakeholder satisfaction, and ability to meet water quality objectives. These measures also support consistency, equity, compliance with the law. Porter-Cologne expresses a balance of values generally accepted – however, permits do not reflect that.

## TMDLs

- number of water bodies de-listed; delisting is success – interim success measures
- decrease in appeals and remands
- for water bodies with CTR, TMDLs will be completed by 2010
- measure pollutant – track over time; pick location, parameters; trend line monitoring for key listed pollutants
- progress towards beneficial use attainment; improved water conditions; and further research on specifics
- make monitoring results accessible on web; transparent
- verification from others; awards from Governor/EPA recognition; stakeholder surveys
- establish a performance evaluation team – their job is to measure; demonstrates the importance of the work
- assessment measures established in current strategic plan – what data was gathered?
- number of enforcement actions/compliance rates
- number of TMDLs approved by State Board; how many are amended/modified (measure for a regional board)
- category change in integrated reporting; integrated measures at watershed scale for priority areas

These metrics provide a means to track improvements through quantifiable, consistent and reportable measurements. Some metrics provide a watershed focus and connect with EPA's "Measure W." The discussion on delisted water bodies as an indicator of success raised questions about delistings that are due to errors in the original sampling results or are based on revised standards – in these cases, delisting may not represent improved conditions. Monitoring and verification are important to confirming improvements to resources and beneficial uses.

### Water Rights

- eliminate Russian River backlog within 5 years  
conduct water availability analysis within 18 months  
develop a programmatic Environmental Impact Report (EIR) within 3 years
- identify human and financial resource needs; e.g. time to hire, funding for alternative scenarios
- a contract process that would award contract within 6 months
- in FY '07-'08, have a stable funding source for the Water Rights Division (85%)
- water rights backlog/number of permits issued; establish "baseline"
- time it takes to process an application; defined timelines; reduce processing time by X%, annually; increase funding/staff by X%, annually
- does a permit demonstrate an integrated planning approach?

These recommended metrics would help address the current backlog of permits. The water availability analysis and programmatic EIR would provide the information needed to process many of the remaining small applications. Creating a process and timeline for moving through the applications would deter delays and address the existing backlog. This process and timeline would require a realistic assessment of needed resources, which would promote transparency and awareness. Stable, broad-based funding would correct current reliance upon user fee funding, eliminate liability in current pending lawsuit, free up staff currently doing fee administration, bring in legislative involvement, and encourage partnerships.

### Water Recycling/Reuse

- MAF by date and region; absolute acre-feet; meet state goals for reuse; 1 MAF in 10 years (need baseline, targets); 50% reuse by 2025, 100% reuse by 2050
- 30 – 40% of funds from Props 84 and 50 dedicated for reuse
- no net negative impacts (measure and report)
- creation of a statewide general permit for reuse
- monitor and report on Prop funding spent on reuse projects
- recycled water policy
- percent increase of new development with purple pipes
- public opinion polls show support
- statewide technology transfer/clearinghouse coordinated across regions

These measurements are effective in terms of cost savings; are inexpensive and quantitative; build on existing tracking systems; are responsive in tracking an existing water supply resource; and help overcome obstacles to broader use.

### Stormwater

- number of watersheds with integrated stormwater and other runoff permits/waiver
- percentage of up-to-date permits with quantifiable limits
- stakeholders clearly understand and implement desired outcomes (including CalTrans and counties)
- number of new developments not contributing to stormwater
- establish a threshold of public benefit (e.g. public health, cancer risk reduction, recreation)
- assigning a cost for pollutant removal that could be evaluated across waters and sources of pollution

The proposed measurements encourage stakeholder collaboration on broad-based and non-redundant monitoring. This promotes a consistent playing field – if people can agree on the metrics, they have a better chance on agreeing on the solution (control strategies). Focusing on the cost effectiveness of achieving water quality goals would help balance costs and determine if control strategies have reasonable costs per unit of pollution.

### Integrated Watershed Approach

- percentage of watersheds assessed
- area covered by integrated plans
- areas of groundwater overdraft; percentage of protected groundwater recharge areas
- percentage of watersheds meeting water quality standards
- amount of recycled water and stormwater discharged/reused
- number of general plans with water element
- area of farmland converted/protected
- decreased permitting time; decreased back-log
- number of cross-cutting Best Control Practices
- number of permits in other media (to protect water quality)
- number of consolidated permits
- number of watershed-based permits
- AB 2121 (increased water rights coordination and decreased backlog)
- broader expertise at water boards; specialist exchange; new job classifications

These metrics support a broader and more comprehensive assessment of water resources, as well as planning and management strategies.

# STATEWIDE CONSISTENCY and REGIONAL VARIATION

## Overview

The development of stable performance measures would help promote consistency across permits, programs, and regions. The balancing of statewide consistency with regional variation involves three main components: scientific issues, procedural matters, and basin planning. The Water Boards have received requests for more transparency and consistency in decision-making, and the Summit participants were asked to discuss where statewide consistency is preferred, and where flexibility and variation to address regional need is preferred.

## Group Reports

Many of the group discussions focused on the appropriateness of consistency and variation in different settings. There was general support for consistency of guiding principles. Overarching, statewide guiding policy should be established by the State Board, which the Regional Boards would then implement and adapt. A team approach to developing policy would involve staff from the State and Regional Water Boards. Technical staff should also be able to communicate on policy issues. This is especially important for issues such as determining uniform standard methods and setting water quality measurements. The use of permits to set policy was discouraged.

The State Board should set human health objectives and minimum criteria, and provide guidance on criteria for other beneficial uses. The State Board should also assure that all programs are being implemented in all regions and be more active in setting policy where appropriate. For example, a consistent basis is needed when new standards are developed. Understanding the scope of a particular problem would inform the development of Board programs and basin plans. Ongoing training for staff and others should be provided on statewide guidance and policy.

Examples of regional variation include designation of beneficial uses, definition of background conditions, and strictness of standards. Regions also vary in terms of the permit process and standards for anti-degradation. This creates uncertainty for what dischargers will be accountable for. A discharger's jurisdiction may extend across multiple regions, each with different reporting and permit requirements. In this case, one Regional Board should be designated as the permitting authority and one consistent set of standards developed for the permittee.

Consistency in issuing permits and TMDLs could be enhanced by developing a clearinghouse on the State Board's website regarding TMDL and permit criteria. Each program manager would need to assure this information is current. Stakeholders should work with the Regional Boards to identify issues or criteria that need State Board involvement. Several groups emphasized that variation by the Regional Boards should be supported by some type of justification. Regional differences should be based on data and science, as available, looking at conditions and costs. Effectiveness monitoring would also help assess the impacts of inconsistency.



Other strategies for looking at inconsistencies/variation would be built on the existing task forces and roundtables to facilitate programmatic consistency. These can be used in a more rigorous way, including an annual summit of roundtables or a Regional Boards attorney roundtable. Uniform measures and guidance for public involvement was also encouraged. Public outreach should encourage exchange of meaningful information. Staff should be cross-trained to better engage stakeholders and the public.

Enhanced communication between the State Board and the Regional Boards would also enhance consistency. The level of risk should be compared against the level of risk management to improve decision-making. This might also entail separating assessment and management functions. Reducing restrictive ex-parte rules, as other boards have done, would also support better-informed decisions. The implications of permit writing should be examined for improved consistency. The possibility of a statewide audit of Regional Board processes was suggested.

Overall, there was discussion about the need to review the balance between consistency and flexibility. For example, Regional Boards should encourage development of pilot projects to promote innovation when no undue hardships are placed on a discharger. Regional Boards should be given authority for collaborative agreements, to build on existing expertise. The Regional Boards need flexibility in staffing to address needs, this is especially true for self-funded programs. Several groups emphasized the need to adequately compensate Regional Board members.

## **NEXT STEPS: REGIONAL WORKSHOPS**

### **Overview**

The facilitators recapped the upcoming events to obtain information for updating the Strategic Plan, including a Staff Summit and three-hour public workshops in each of the regions. Proceedings from the Stakeholder Summit will be posted on the web and the insights will be incorporated into the regional workshops. The Strategic Plan Update will be submitted to the WCCC during the summer, with more detailed implementation being developed by the end of the year.

Summit participants were asked to identify the three most important things from the Summit sessions that should be discussed in the regional workshops.

### **Group Reports**

The Water Boards were encouraged to invite IRWMP representatives to the regional workshops. The groups identified several aspects to include in the regional workshops: posting the mind map results for regional review (perhaps the top 10 trends); and addressing the issues on consistency, lessons learned, and better integration of Water Boards programs.

## CONCLUDING REMARKS AND ADJOURN

Chair Tam Doduc extended her thanks to the Summit participants for their involvement and input. She also thanked those who helped bring the Summit to fruition: the design team (Francine Diamond, Tom Howard, Catherine Kuhlman, Bobbie Larsen, Michael Thomas, Linda Sheehan, Nancy Wright); the Office of Research Planning and Performance support from Jeff Barnickol and Zori Lozano-Friedrich; Esteban Almanza; the table facilitators; and the Center for Collaborative Policy (CSUS).

The Chair asked stakeholders to work collaboratively with the Water Boards and to stay involved with the regional workshops. She thanked participants for their efforts in making clean, safe, available water a reality and expressed her hopes for continuing to work together in the future.

# WATER BOARDS 2007 STRATEGIC PLAN UPDATE

## LIST OF MARCH STAKEHOLDER SUMMIT ATTENDEES

Varouj Abkian , City of Los Angeles/Deputy Mayor's Office  
Mark Adelson, Santa Ana Regional Water Board  
Bob Anderson, North Coast Regional Water Board  
Elaine Archibald, California Urban Water Agencies  
Aubrey Baure, US Air Force Western Regional Environmental Office and Pacific Northwest DoD Regional Environmental Coordinator  
Elaine Berghausen, The Gualco Group, Inc.  
Jon Bishop, Los Angeles Regional Water Board  
Elizabeth Borowiec, USEPA, Region 9  
Clay Brandow, California Dept. of Forestry and Fire Protection  
Geoff Brosseau, California Storm Water Quality Association  
John Brown, Former State Water Board Member  
Kevin Buchan, Western States Petroleum Association  
Gary Carlton, Kennedy/Jenks Consultants  
Mike Chapel, U.S. Forest Service  
Krista Clark, Association of California Water Agencies  
Vicky Conway, Los Angeles County Sanitation Districts  
John Corbett, North Coast Regional Water Board  
Tacy Currey, California Assoc. of Resource Conservation Districts  
Dawi Dakhil, International Boundary and Water Commission, United States Section  
Francine Diamond, Los Angeles Regional Water Board  
Tam Doduc, Chair, State Water Board  
Jared Ficker, California Strategies  
Erin Field, Western Growers  
Laurel Firestone, Community Water Center  
Mary Jane Foley, Southern California Alliance of Publicly Owned Treatment Works  
Tony Francois, California Farm Bureau Federation  
Randal Friedman, US Navy  
Zeke Grader, Pacific Coast Federation of Fishermen's Associations  
Jill Gravender, Environment Now  
Mark Grey, Bldg. Industry Association of So Cal  
Jack H. Gregg, Ph.D, California Coastal Commission  
Kamyar Guivetchi, P.E., California Dept. of Water Resources, Statewide Water Planning  
Kate Hart, Central Valley Regional Water Board  
Jeanette Hayhurst, City of Barstow  
Staci Heaton, Regional Council of Rural Counties  
John Herrick, South Delta Water Agency  
John Hewitt, Farm Bureau  
Rainer Hoenicke, San Francisco Estuary Institute  
Amy Horne, Lahontan Regional Water Board  
Charlie Hoppin, State Water Board  
Tom Howard, State Water Board  
Michael Jackson, Sports Fishing Assoc.  
Anjali I. Jaiswal, Natural Resources Defense Council  
Craig Johns, California Resource Strategies  
Luana Kiger, Natural Resources Conservation Service California Office  
Camron King, Calif Association of Wine Grape Growers  
Chris Knopp, US Forest Service  
Catherine Kuhlman, North Coast Regional Water Board  
Karl Longley, Central Valley Regional Water Board  
Bob Lucas , Lucas Advocates, CCEEB  
Mary Ann Lutz, Los Angeles Regional Water Board  
Sandra Meraz, Central Valley Regional Water Board  
Rosalie Mule, California Integrated Waste Management Board  
Valerie Nera, California Chamber of Commerce  
Kevin O'Brien, Assoc. of California Water Agencies  
Robert Perdue, Colorado River Regional Water Board  
Ken Petruzzelli, O'Laughlin & Paris, LLP  
William Phillips, Monterey Water Resources Agency  
Michele Pla, Bay Area Clean Water Agencies  
Randy Poole, Sonoma County Water Agency  
Christopher Raymer, Representing Sen. Abel Maldonado  
Maria Rea, USEPA, Region 9  
Tom Reeves, City of Monterey  
Mark Rentz, CA Department of Pesticide Regulation  
Dorothy Rice, State Water Board  
John Rossi, Western Municipal Water District  
Darlene Ruiz, Hunter – Ruiz  
Linda Sheehan, California Coastkeeper Alliance  
Frances Spivy-Weber, State Water Board  
Rita Sudman, Water Education Foundation  
Warren Telefson, Central Valley Clean Water Assoc.  
Al Wanger, California Coastal Commission  
Barbara Washburn, CA Office of Environmental Health Hazard Assessment  
Chuck Weir, California Water Environment Association  
Gary Wolff, State Water Board  
Nancy Wright, Colorado River Regional Water Board  
David Young, City of Rancho Cordova  
Jesse Yow, Lawrence Livermore National Laboratory, Environmental Restoration Division Leader