



Permitting for Environmental Results (PER)

NPDES Profile: California and Indian Country

PROGRAM RESPONSIBILITY

State of California: NPDES authority for base program, federal facilities, general permitting, pretreatment

EPA Region 9: NPDES authority for biosolids

EPA Region 9: NPDES authority for all facilities in Indian Country

Program Integrity Profile

This profile characterizes key components of the National Pollutant Discharge Elimination System (NPDES) program, including program administration and implementation, environmental outcomes, enforcement, and compliance. EPA considers profiles to be an initial screen of NPDES permitting, water quality, enforcement, and compliance programs based on self evaluations by the States and a review of national data. EPA will use the profiles to identify program strengths and opportunities for enhancements. For more information, please contact James Maugham, State Water Resources Control Board, at (916) 341-5522 or Eugene Bromley, EPA Region 9, at (415) 972-3510.

Section I. Program Administration

1. Resources and Overall Program Management

The State of California:

The State of California received authorization for the base NPDES program authorization on May 14, 1973; for regulation of federal facilities on May 5, 1978; and for the pretreatment program and general permits on September 22, 1989. In 2003, EPA Region 9 and California's State Water Resources Control Board (SWRCB) entered into a 5-year memorandum of agreement (MOA) for the implementation of the NPDES permit and other Clean Water Act (CWA) water quality programs in the State.

Table 1: NPDES Universe in California

	Major Facilities	Minor Facilities w/Individual Permits	Minor Facilities w/General Permits	SIUs (including CIUs)	CAFOs
No. of Sources	220	557 ^a	1,259	3,844	1,575
% of National Universe	3.3%	1.3%	3.2%	17.0%	8.5%

SIUs = significant industrial users; CIUs = categorical industrial users; CAFOs = concentrated animal feeding operations.

^a Pretreatment Compliance System (PCS), June 29, 2004.

The SWRCB and nine semi-autonomous Regional Water Quality Control Boards (RWQCBs) administer the NPDES program. Each of the boards is overseen by a decision-making body of political appointees who serve 4-year terms. The SWRCB has up to five full-time salaried board members, while each of the RWQCBs has up to nine board members who are compensated for the days they attend board meetings. The RWQCB members represent various sectors; for example, municipal and county government, industry, agriculture, and water districts. A quorum of a majority of board members is necessary for making decisions, issuing NPDES permits and taking enforcement actions. The boards are part of the California Environmental Protection Agency.

The SWRCB oversees the NPDES program in the State. It controls the program budget and resources, and is responsible for developing statewide policy, guidance, and coordination. The SWRCB also serves as the appellate body for administrative appeals of NPDES permits and other programs under its jurisdiction.

The RWQCBs make regional policy and implement the NPDES program. The geographic boundaries of the RWQCBs are based on watersheds. The RWQCBs are semi-autonomous, and have varied physical and biological characteristics due to geographical differences. Furthermore, decisions are made by appointed boards. For these reasons, the implementation and capacity of the NPDES programs vary between Regions. Each RWQCB develops its own Basin Plan, which includes the water quality standards and implementation procedures for the various programs. These plans complement to the statewide water quality criteria and implementation procedures adopted by the SWRCB.

Nearly all NPDES permits are issued by the RWQCBs; exceptions include statewide permits such as the statewide Caltrans stormwater permit. There are 220 major facilities with permits issued in the State, 557 minor facilities with individual State-issued permits, and 1,259 minor facilities covered by non-stormwater general permits.¹

The resources for the NPDES program in fiscal year (FY) 2004 provide for 112.9 person years, which includes staffing for permits, stormwater, pretreatment, compliance, and enforcement. The total funding is \$16.9 million; the funding comes from fees (\$6.8 million) and federal (\$5.5 million) and in-kind contract support (\$4.6 million). In-kind contract support is provided for the permit, stormwater, pretreatment, compliance and enforcement, and TMDL programs.

Training programs are in place for all staff. In addition to general training, the following specialized training is provided:

- Training for inspectors consists of experienced staff training newer staff, intensive class training available through a variety of sources (courses on wastewater treatment and laboratory procedures, EPA training, and the like), written division procedures in a number of areas, and manuals (mostly EPA manuals) covering various topics. The staff develops specific training plans to address job-related needs (in accordance with section procedures) and personal goals.

¹ The National Data Sources column in the Management Report, measure #2, shows 558 minor facilities with individual State-issued permits because the list of EPA-issued permits submitted for use in compiling the backlog report omitted a permit, which was then counted as a State-issued permit.

- Permit writers receive training in all aspects of the NPDES permit program, including the regulatory framework of the NPDES program, permitting process, application process, technology-based effluent limits, water quality-based effluent limits (WQBELs), special conditions, and the administrative process. A training plan is in place with three objectives: (1) baseline needs of the permit writing section, (2) unit-specific or employee-specific needs, and (3) job-related personal goals.
- All staff responsible for developing water quality-based permit conditions (including those for whole effluent toxicity (WET)) are trained in the reasonable potential determination process set forth in the Great Lakes Initiative and California's water quality objectives. All staff responsible for conducting acute or chronic toxicity tests on industrial/municipal effluents receive training. This staff training program includes a careful review of all standard operating procedures that relate to WET testing and regulation.

Although all staff receive the training described above, the State's recent budgetary problems have resulted in inconsistency regarding the quality and quantity of the training available for the RWQCBs. The State is investigating ways to improve the consistency of training for the nine RWQCBs.

EPA Region 9:

The Region has assigned about two full-time equivalent staff members to oversee California's NPDES program and to write NPDES permits for federal facilities and facilities located in Indian Country. Staff also provide technical assistance to the State, conduct compliance monitoring, and take appropriate enforcement actions.

Region 9 staff receive training through standard EPA training opportunities, such as the NPDES Permit Writers' Training Course, the Water Quality Standards Academy, training at EPA Headquarters.

In addition to providing oversight and assisting the state in administering the NPDES program, Region 9 retains the authority to administer the biosolids program. Region 9 also administers the following permits:

- Six individual major permits for publicly owned treatment works (POTWs) four of which are currently exempt from secondary treatment requirements under waivers allowed by CWA section 301(h) and two of which discharge to federal waters²
- Four individual major permits for offshore oil and gas facilities
- Six individual minor permits (four offshore oil and gas permits and two permits issued to Tribes)³

² The National Data Sources column for measure #7 of the Management Report shows five POTWs covered by individual EPA-issued permits because the permit for the San Francisco facility was shown as State-issued in PCS at the time the data were downloaded on June 14, 2004.

³ The National Data Sources column for measure #2 of the Management Report shows five minor facilities covered by EPA-issued individual permits because one of the EPA-issued permits was omitted from the list submitted for use in drafting the backlog report.

- One general permit for offshore oil and gas facilities, covering 14 platforms (all minor facilities)⁴
- Two general stormwater permits (one for construction activities and the other for industrial facilities in Indian Country)
- One Phase II individual stormwater permit for the Agua Caliente Tribe

2. State Program Assistance

EPA Region 9:

The Region works closely with its State counterparts at all levels. The Region and the SWRCB work together to develop annual work plans for all CWA grants, including the water quality program, permits, compliance and enforcement, water quality standards, monitoring, and TMDLs. The work plan integrates contractor in-kind services and establishes schedules and the permits and TMDLs that will be worked on or completed during the State's fiscal year.

In 2003 the Region and the State entered into an MOA that sets forth a strategy for implementing all of the water quality programs and for coordinating between both agencies. The MOA is premised on the finite resources that both the Region and the State have for operating these programs. The strategy establishes priorities for each of the surface water quality program areas covered by the MOA. The MOA covers the five State fiscal years from 2003 to 2008.

State and EPA Region 9 senior management meet monthly to ensure that priorities are being met and issues resolved. In addition, Region staff are assigned to act as liaisons with the RWQCBs. Staff are in regular contact with their counterparts to provide assistance and oversight to monitor implementation of work plans.

Biosolids requirements are generally included in State permits. The Region works with its State counterparts to ensure that permits issued by the State include biosolids requirements consistent with federal regulations. The Region ensures compliance and enforcement of biosolids requirements. The State does not intend to pursue authorization to implement the biosolids program unless EPA provides funding; such funding is not available at present.

3. EPA Activities in Indian Country

EPA Region 9:

The Region administers two individual permits issued to Tribes for minor wastewater treatment facilities serving casinos in Indian Country. EPA Region 9 informally consults with the Tribes on all aspects of permits during their drafting, including sharing drafts and seeking input from the Tribes. The

⁴ The EPA-issued general permit for offshore oil and gas facilities is the source of several discrepancies with the National Data Sources column of the Management Report. For measure #3, the National Data Sources column shows 0 minor facilities covered by EPA-issued general permits because the offshore oil and gas general permit was not entered into ePIFT at the time of the data were downloaded in March 2004. For measure #1, the National Data Sources column shows 11 major individual permits instead of 10 because the offshore oil and gas general permit was included on the list of EPA-issued permits submitted for use in drafting the backlog report. For measure #6, the National Data Sources column shows 11 industrial facilities covered by individual EPA-issued permits because the offshore oil and gas general permit does not have the letter "G" in the permit number and was therefore counted as an individual permit in the download of data from PCS.

Region also coordinates with and seeks to address the concerns of other interested parties, including the RWQCB in which Indian Country is located. The Region also conducts any consultations required under the Endangered Species Act with the U.S. Fish and Wildlife Service and the National Oceanic and Atmospheric Administration's National Marine Fisheries Service (NOAA Fisheries) that may be necessary pursuant to EPA's issuance of a permit.

The Region has issued general NPDES permits for stormwater discharges from construction activities and industrial facilities covering Indian Country in the State of California. The Region coordinated with the Tribes during the issuance of these permits. The Region also recently issued an individual Phase II municipal separate stormsewer system (MS4) permit for the Agua Caliente Tribe. Although Phase II MS4s are usually covered by general permits, the Region has only a small number of Phase II MS4s under its jurisdiction and therefore decided to issue individual permits for the MS4s.

The Region has a very active program to coordinate activities with all 108 federally recognized Tribes in California. Through the Regional Tribal Operations Committee, the Region has conducted NPDES permit and stormwater training for Tribes. During the development and implementation of the Phase II stormwater program, the Region conducted outreach activities to inform the Tribes of the obligations of the construction and MS4 programs. As a result of these outreach efforts, the Region is able to work with Tribes on individual issues as the need arises. Most of these efforts have been to work with Tribes on addressing wastewater issues in a manner that avoids the need for an NPDES permit.

4. Legal Authorities

EPA is conducting a comprehensive review of the State's legal authorities. This review has not yet been completed. As a result, EPA is reserving this section of the profile; when the legal reviews are complete, EPA will update profiles to include the results of the reviews.

On February 23, 2000, the Natural Resources Defense Council submitted a petition for withdrawal of California's NPDES program, alleging inadequacies in the stormwater program for the Los Angeles region.

5. Public Participation

An evaluation of the State's legal authorities regarding public participation will be included in the legal authority review. As noted above, the legal authority review section of this profile is reserved pending completion of the legal authority review.

The State of California:

The State's public participation policy encourages public participation in, and knowledge of, the State's decision-making process. The Porter-Cologne Water Quality Control Act (California Water Code, Division 7. Water Quality) provides the framework for public participation under State statute and administrative rules.

The SWRCB and RWQCBs implement the public participation process as required by federal and State law. In California this process provides the opportunity to be heard at a public hearing before the SWRCB and RWQCBs. In practice virtually every water quality action for which there is a dissenting voice or controversy is reviewed in a public workshop, meeting, or formal hearing in front of the

SWRCB and RWQCB. Over the past few years, a vast majority of the permits issued were subject to this rigorous public participation process. Meaningful public involvement is provided in the following key elements:

Public Notice: All proposed NPDES permits and compliance actions receive legal public notice by publication in daily or weekly newspapers circulated in the geographic area of the proposed discharge, and are available on the Internet.

As part of the public notice process, the SWRCB and RWQCBs maintain and use a mailing list of interested parties who have requested copies of the proposed NPDES permits, fact sheets, or public notice documents. The parties who receive direct mailings include municipal, State, and federal agencies; public interest groups; concerned citizens; property owners adjacent to the treatment and discharge site; and anyone else who requests them.

SWRCB and RWQCB Web Sites: The Web sites include many important features designed to increase interested parties' access to California's services. The SWRCB's Web site <http://www.swrcb.ca.gov> provides links to the RWQCBs' Web Sites. Key features of the SWRCB's include organizational contacts, information and news, environmental grants and loans, laws and rules, online services, environmental permits, and program information. Regarding NPDES permits, the SWRCB Web site lists active NPDES permits, general NPDES permits, permits on public notice, and enforcement actions. The public notice section includes the public notice, fact sheet, draft permit, and proposed administrative enforcement actions, including proposed penalty actions. Several RWQCBs make meeting agendas, and draft and final permits available to the public through their Web sites. In addition, all permits and fact sheets issued in the State since November 2003 can be accessed at EPA's Web site. Instructions for accessing these documents are available at <http://www.epa.gov/npdes/permitdocuments>.

The SWRCB's Web site also provides information to the public concerning notices of intent (NOIs) that have been submitted requesting coverage under the statewide industrial, construction, and small MS4 general stormwater permits. NOI information is generally not available on the SWRCB or RWQCB websites for other general permits; the NOI information may be obtained, however, by contacting the SWRCB or the appropriate RWQCB.

Public Comments: Opportunities for public participation in the NPDES permitting process and administrative enforcement action process are provided in accordance with State law and regulations as well as federal regulations. All draft permits proposed for issuance or denial are subject to public comment for a period of at least 30 days following legal public notice of the proposed action. Any person may provide comments in response to the proposed permit actions. The procedures require that staff provide a briefing memorandum (also called staff report) for the permit decision-maker; the briefing memorandum includes a summary of all significant comments received during the public comment period. Significant comments are comments that address substantial and relevant issues, indicate a high degree of public controversy, or address issues bearing on the staff decision to propose issuance or denial of the permit. The briefing memoranda are part of the permit file and are available to the public. The same information is provided for enforcement actions.

Public Meetings: All permits are the subject of a public meeting before adoption. Public hearings are formal proceedings for taking testimony for the record. The hearing is recorded and a responsiveness summary is prepared for the record.

EPA Region 9:

EPA follows federal requirements for ensuring sufficient public participation in the NPDES permitting process. When Region 9 and the State jointly issue a permit, the Region and the State ensure that both federal and State requirements are met.

The Region follows the Requirements for Notices of Proposed Action found at 40 Code of Federal Regulations (CFR) 124.10, which require publication in the daily newspaper circulated in the geographic area of the proposed discharge; the more significant notices of proposed action are also made available on the Internet. As part of the public notice process, the Region maintains and uses a mailing list of interested parties who have requested individual notices of proposed determinations in the past. Parties receiving direct mailings are municipal, state, and federal agencies; public interest groups; concerned citizens; and any other interested party. Depending on the size of the mailing list, the direct mailing may include the permit and fact sheet, or just the notice of proposed determination with information concerning how to obtain additional documents if desired.

During the public participation process, draft NPDES permits proposed for issuance are made available for public comment for a period of at least 30 days following legal public notice of the proposed action. Any person may comment to EPA in writing in response to the proposed permit action. The Region reviews the comments and responds in accordance with 40 CFR 124.17. Responses are retained in individual permit files as part of the public record. The Region prepares a new draft permit with a revised fact sheet, or a final permit is issued with changes explained, if any information submitted during the public comment period raises substantial new questions about the draft permit. The Region reopens the comment period (limited to new findings) and the proposed permitting action is again made available for public comment if the permit is altered significantly in response to comments.

During the public comment period, any interested party may request a public hearing, although this seldom occurs. The Region decides whether to hold a public hearing on the basis of a review of the issues raised and the amount of public interest. Often public hearings are held because public interest is expected to be high.

Members of the public may also appeal a final permitting decision if they have provided comments and raised their concerns in a timely manner. The Environmental Appeals Board hears individual permit appeals and issues a decision based on the administrative record and testimony provided at the hearing.

Where the State or Tribe has approved water quality standards, the Region obtains State or Tribal review and water quality certification under CWA section 401 for EPA-issued permits.

Many of the draft and final permits and fact sheets issued by the Region independently of the State are made available on EPA Region 9's Web site. These are permits for facilities in Indian Country or in federal waters. The permits issued by the Region for POTWs are generally issued jointly with the State. For those permits, the Region usually allows the State to take the lead and follows the State's public participation process.

6. Permit Issuance Management Strategy

The State of California:

The SWRCB and the RWQCBs have been working to eliminate the backlog of expired major and minor permits. In part, this backlog is due to the promulgation of the California Toxics Rule (CTR) and the associated State Implementation Policy (SIP) for implementing the CTR. One factor contributing to the backlog was that the SIP required a reasonable potential analysis be performed on 3 years of data for all priority pollutants for both major and minor facilities, which initially slowed the permit reissuance process. The State developed a number of tools and provided training to expedite permit reissuance and to ensure that up-to-date environmental protection provisions are in place for all discharges to California's surface waters. The key features of the strategy included increased efficiency and streamlining in permit issuance. Despite these efforts, a substantial permit backlog exists.

Due to recent budget cuts and hiring freezes, the State has not been able to use all of the core regulatory federal funding available from EPA to fund staff positions. To ensure progress toward reduction of the permit backlog, Region 9 and the State are directing the funds State could not use into an EPA contract. This contract provides staffing support to assist the State in timely permit reissuance. Contractor assistance has been provided to each of the nine RWQCBs to complement the work of RWQCB staff. In addition to permit reissuance, the contract support provides access to technical expertise that the State might not possess to efficiently respond to technical challenges that could otherwise delay permit issuance.

Historically, there has been considerable variation in permits among the RWQCBs, reflecting the uniqueness of each Basin Plan. For example, different RWQCBs use different permit formats. Also, some RWQCBs have compliance schedule provisions in their Basin Plans; others do not. The SWRCB has initiated efforts to standardize permits issued by the RWQCBs, and expects that this will help reduce the backlog.

Table 2: Percentage of Facilities Covered by Current Permits in California
(State-Issued Permits)

	2000	Nat'l Avg.	2001	Nat'l Avg.	2002	Nat'l Avg.	2003	Nat'l Avg.
Major Facilities	66%	74%	73.1%	76%	79.3%	83%	84.1%	84%
Minor Facilities Covered by Individual Permits	67%	69%	61%	73%	50.2%	79%	52.0%	81%
Minor Facilities Covered by Individual or Non-stormwater General Permits	N/A	N/A	N/A	N/A	83.8%	85%	84.4%	86%

Source: PCS, 12/31/00; 12/31/01; 12/31/02; 12/31/03. (The values in the National Data Sources column of the Management Report, measures #19 and #20, are PCS data as of 6/30/04.)

EPA Region 9:

The Region has not needed a strategy to manage the permit backlog because of the small number of permits it issues in California. On September 22, 2004, the Region issued a general permit to replace all nine existing offshore oil and gas permits, including the one general permit. The effective date of the new general permit for offshore oil and gas facilities is December 1, 2004. The Region also expects to reissue the permits for Los Angeles City/Hyperion and Orange County in 2004. Both facilities discharge into federal waters.⁵

Table 3: Percentage of Facilities Covered by Current Permits in California
(EPA-Issued Permits)

	No. of Permits	2000	Nat'l Avg.	2001	Nat'l Avg.	2002	Nat'l Avg.	2003	Nat'l Avg.
Major Permits	6 POTWs, 4 individual and 1 general offshore oil and gas	45%	74%	37.6%	76%	27.3%	83%	27.3%	84%
Minor Facilities	4 offshore oil and gas, 2 Tribal ^a	20%	69%	20%	73%	20%	79%	40.0%	81%

Source: PCS, 12/31/00; 12/31/01; 12/31/02; 12/31/03. (The values in the National Data Sources column of the Management Report, measures #19 and #20, are PCS data as of 6/30/04.)

^aOne permit was issued to a Tribe in 2003 for the first time.

7. Data Management

The State of California:

The data management system currently used by the State to manage NPDES permit data is the System for Water Information Management (SWIM) database. The State uses SWIM in its current version to manage information about NPDES permits, the applications on which they are based, and the facilities that they cover. The State is in the process of including SWIM data in the California Integrated Water Quality System (CIWQS) to track inspections, enforcement activities, schedules of compliance, and permit violations. Data transfers are sent to EPA from the California SWIM database system. Transactions received from SWIM are in the Permit Compliance System (PCS) batch format and include facility data, permit event data, and inspection and enforcement data. The Region performs quality assurance (QA) on the file. At present, an EPA contractor inputs discharge monitoring report (DMR) data and all permit effluent limits into PCS.

The State focuses on facility data, permit event data, and inspection and enforcement data in its transfers of data from SWIM to PCS. The pipe schedule, limits, and measurement data are not provided because the State data systems do not maintain these data. The State tracks and manages information on sanitary

⁵ The National Data Sources, EPA Activity, column in the Management Report shows that 0% of minor facilities are covered by current individual or general permits. This is because the five individual permits included on the list of EPA-issued permits used in drafting the backlog report were expired at the time of the data were downloaded. The permit omitted from the list (see section I.1 and measure #2) is current, one of the permits has since been reissued, and the general permit covering 14 oil and gas platforms has been reissued.

sewer overflows (SSOs) and combined sewer overflows (CSOs), stormwater, concentrated animal feeding operations (CAFOs), pretreatment, and biosolids in SWIM.

The State will not be a user of ICIS-NPDES (Integrated Compliance Information System - NPDES, which is the modernized PCS), currently under development. The State has recently initiated the CIWQS project, which will integrate several existing stand-alone data management systems and add the capability for electronic submission of self-monitoring reports, including the EPA DMR. The benefits of developing such a system include providing consistency throughout the NPDES permitting process; making the permit development, issuance, and compliance processes more efficient; and allowing easier integration with other water quality protection activities such as watershed analyses, watershed-based permitting, and the development of total maximum daily loads (TMDLs). This integrated system will automate a number of existing manual processes; eliminate duplicative functions among several systems; ensure a high level of data quality, security, and redundancy; and, most important, provide the water quality data and information necessary for the State to meet its obligations to enter California's NPDES records into PCS and to accomplish its mission of protecting water quality.

All the required data elements of the Water Enforcement National Database (WENDB) have not yet been entered into the State database, but the State is working on this. Region 9 has been managing the California data in PCS for decades. PCS contains data for California from the following sources: California's SWIM database, which provides the monthly file updates to PCS in batch format for facility, permit tracking, inspection, and enforcement data to Region 9; Region 9 enters all permit limit and measurement data. The data that SWIM supports are maintained by the State as complete and accurate. As noted above, SWIM does not support all WENDB data elements; Region 9 supports all pipe schedule, limits, and measurement data for California in PCS.

The State has developed and is implementing procedures to ensure that the data in its data management system are complete and accurate.

The following enhancements are planned for supporting the NPDES program:

- On July 1, 2004, California contracted for information technology support of PCS data.
- An EPA 2003 Network Challenge Work Plan and grant was in place as of June 2004.
- California (with contractor support) is developing the CIWQS to support water data, including WENDB data, through uploads to PCS, and to allow discharge reports to be submitted electronically. The system will support the uploading of all major and minor NPDES permit data to PCS through required data formats. CIWQS will integrate several State systems data including SWIM data and WENDB compliance data.
- The final CIWQS design/EPA review is scheduled for October 1, 2004.
- California will assume all State PCS maintenance responsibility on January 1, 2005.
- In 2005 California will develop a data interface node for data transfers between State systems and EPA data systems.

- Until enhancements are implemented, Region 9 will continue its oversight and support to both the contractor and the State with limit and measurement data entry, including the start of data entry for minor facility limits and measurements.

The automated quarterly noncompliance report (QNCR) will be made available after accurate permit limits and timely measurement data are maintained in PCS for two consecutive quarters. This is based on the above-mentioned changes in California's data management.

Currently, the data in SWIM are placed on the SWRCB's Web site in a flat table format. Anyone can download this file. The file is updated every 2 weeks.

Latitude and longitude are collected from the permit applications submitted by the discharger. The latitude/longitude information is included in the permit, no further verification is provided.

To help ensure the quality of the data reported on DMRs, the SWRCB intends to implement an NPDES compliance program in calendar year 2005 that will incorporate personnel at the SWRCB, the RWQCBs, and an EPA contractor. SWRCB, RWQCB, and contractor personnel will conduct routine non-sampling inspections at all major NPDES facilities and at 20% of the minor NPDES facilities in California during each State fiscal year. SWRCB and RWQCB personnel will determine which of those facility inspections will include sampling. Sampling inspections will be carried out by either SWRCB or RWQCB personnel. California has a laboratory accreditation program through the Department of Health Services.

EPA Region 9:

EPA Region 9 maintains the PCS major discharger information to reflect current requirements for permits issued to federal facilities and Tribes. This has resulted in timeliness, accuracy, and completeness of permit data and facility reporting in the PCS database. The consistency of NPDES program performance for inspections and enforcement activities is reflected in the national database.

PCS data are loaded monthly into the IDEA system, which is one of several other systems—including Integrated Compliance Information System (ICIS), Online Targeting Information System (OTIS), and Enforcement and Compliance History Online (ECHO)—used by the Region to manage compliance issues and provide data to management for a more useful presentation of the PCS data reporting.

The Region does not maintain any other system for tracking special categories of permittees. The exception is biosolids quality data, which are maintained on a PC-based system. This system has been maintained over the past few years.

Section II. Program Implementation

1. Permit Quality

The State of California:

All permits issued by the State receive public reviews, multiple peer reviews, expert reviews, and unit supervisor reviews prior to issuance by the decision-maker. A checklist is also used. This process has been in effect for several years and has been successful in ensuring high-quality permits.

In addition, Region 9 conducts permit reviews of a select subset of draft and final permits each year. The Region is provided copies of the permit application, public notice, fact sheet, draft permit, and supporting documents so that it can conduct a concurrent review.

The Region has a standard checklist for permits, which each permit writer reviews to ensure that all required and standard permit items are addressed. In addition, the permit and fact sheet are routed through a permits team leader, who further reviews the permit for consistency, accuracy, and clarity, particularly in the rationale for various effluent limits and other permit conditions that are included in the permit.

The Region's concurrent permit reviews are carried out selectively based on the Region's past experience, including past program reviews, issues related to a particular permit, a State request for assistance, and requests by third parties. Thus, the Region's concurrent review of permits varies among the SWRCB/RWQCB.

The Region reviews about 40-50% of the major permits issued across the State and selects permits for review on the basis of their complexity or importance, the particular issues raised by the permit, particular issues or problems related to the RWQCBs, and requests for assistance from permit writers or third parties (e.g., environmental groups, citizen groups, or elected officials). The review often focuses on specific issues, but when problems are encountered, the entire permit is reviewed. The Region attempts to involvement to permits that have significant issues to be determined, issues that tend to have impacts on the broader program and policy. Generally, the Region's comment letters and threat of objection are sufficient to correct any shortcomings identified. However, in 1999, the Region first objected to and then took over the issuance of two MS4 permits that did not contain a requirement to comply with water quality standards, a requirement the SWRCB/RWQCB did not want to impose. After the permits were issued, the RWQCB resumed authority over those permits.

One of the strengths of the State program is the State's incorporation of WQBELs in NPDES permits. This is a result of guidance provided in the SIP, which was adopted by the SWRCB in March 2000 in conjunction with EPA's promulgation of the CTR in May 2000. It has led to increased consistency and quality of permits issued, although it resulted in delays in permit issuance as the State's permit writers learned to use the procedures and dischargers adjusted to this approach for determining permit limits. The SIP, which is based on EPA's *Technical Support Document for Water Quality-based Toxics Control*, provides detailed guidance for implementing the CTR, which has assisted in the development of appropriate WQBELs in NPDES permits. The SIP includes detailed guidance for determining when a

WQBEL is required and for the calculation of the limit. The SIP may be found on the SWRCB's Web site at <http://www.swrcb.ca.gov/iswp/docs/final.pdf>.

California has developed a WET program that is implemented through the NPDES permit program. Permits issued by the State generally include, as appropriate, toxicity monitoring and effluent limitations for acute toxicity or chronic toxicity or both. The State faces a significant issue concerning how to set toxicity limitations for effluent-dependent waters where there is no capacity for dilution. End-of-pipe limits for chronic toxicity could create compliance problems, especially if the observed toxicity is low or caused by a transient discharge.

A current weakness in the State's program is the inconsistent implementation of WET requirements throughout the State. This is one of the issues to be addressed in the current review and update of the SIP.

EPA Region 9:

All Regional permit writers are provided training through the national NPDES Permit Writers' Training Course, and participate in workshops for permit writers to ensure that they keep abreast of recent issues of concern and EPA policies. The Region reviews the permits it issues on an ad hoc basis to check for quality. However, the Region does not have a formalized practice of performing permit quality reviews; it relies on the reviews performed by senior permit writers or the Office Chief before public notice and during the permit finalization stage.

The Region includes WET provisions in all the NPDES permits it writes in California. Also included in the permits it issues in California are, as appropriate, toxicity monitoring and effluent limitations for acute toxicity or chronic toxicity or both. The significant issue faced is setting toxicity limitations for effluent-dependent waters where there is no capacity for dilution. End-of-pipe limits for chronic toxicity could create compliance problems, especially where toxicity levels are low and the toxicity is caused by a transient discharge. The Region is planning to update the toxicity guidance for EPA Regions 9 and 10 to address these issues.

2. Pretreatment

The State of California:

California received authorization to administer the pretreatment program on September 22, 1989. The State's nine RWQCBs primarily implement the pretreatment program. California requires approved pretreatment programs to be implemented by POTWs with design flows of more than 5 MGD and, when a need is identified, by POTWs with design flows equal to or less than 5 MGD. Currently, 92 POTWs in the State have approved pretreatment programs; 4 other POTWs are developing a program. The State does not directly issue permits to significant industrial users (SIUs).

The State's pretreatment program showcase is the San Francisco Bay RWQCB program. The RWQCB has historically performed superbly with excellent management support and experienced staff who are dedicated solely to pretreatment; a large number of complex local programs; a shallow, sensitive receiving water in San Francisco Bay; and intense public interest in toxic pollutants. Through its very dedicated and timely pretreatment efforts; the San Francisco Bay RWQCB has significantly contributed to the development and implementation of several national award-winning POTW pretreatment programs and served as a catalyst for many innovative environmental programs.

Region 9 has recommended that RWQCBs centralize their pretreatment work with dedicated staff working only or primarily on pretreatment. This approach results in an efficient RWQCB program. Some RWQCBs have adopted this approach and it works well, but others have not and pretreatment implementation continues to lag.

Audits are conducted once every 5 years for most POTWs. In addition, RWQCB staff members try to perform annual pretreatment compliance inspections of all programs. Historically, the annual statewide rate of audits and inspections of approved pretreatment programs is 80%, and Region 9 regards this as a reasonable effort for field audits and inspections. This rate is substantially higher at the RWQCBs that have dedicated staff working only or primarily on pretreatment, and lower at the RWQCBs where staff perform pretreatment work in addition to other duties such as writing NPDES permits. RWQCBs send pretreatment compliance inspection and audit reports to the approved POTW pretreatment programs (control authority). A formal enforcement action is taken for those programs found to be in significance noncompliance. There is no formal procedure for annual report review. If a report is incomplete or is late, follow-up phone calls are made or letters are sent. Issues identified in the annual report are addressed during the next inspection, unless they are determined to be serious enough to demand immediate attention.

Unfortunately, the State's budget cuts affect other pretreatment program actions, such as reviewing program modifications, reviewing annual reports, enforcement, and offering compliance assistance. In some cases, RWQCBs are reassigning long-time pretreatment staff out of the program to meet State-mandated enforcement requirements and other priorities. Contractor-performed field audits and inspections will replace the RWQCB staff work, but the range of other program actions will be reduced or significantly slowed. For example, follow-up to audits and inspections will occur only during subsequent annual audits or inspections.

Pretreatment audits and inspections indicate that nearly all identified SIUs have permits. Exceptions occur when a categorical industrial user (CIU) has been improperly classified by a control authority, and for SIUs in POTWs without approved pretreatment programs, as discussed in the following paragraph regarding Region 9's enforcement program. In addition, a recent audit indicates that the County Sanitation Districts of Los Angeles County have improperly relied on "temporary" permits for SIUs in lieu of reissuing permits on a 5-year cycle. The Sanitation Districts are the second largest POTWs in the country and SIU permitting is a significant workload. The State and Region are requiring the Districts to correct this problem. The Districts are hopeful that the rulemaking for pretreatment streamlining that EPA is now completing will provide regulatory relief in the form of general permits or other means. According to PCS data as of June 14, 2004, 99.8% of identified SIUs have permits or other control mechanisms.

Several areas of the State are growing very rapidly and industries are moving to such areas for new business opportunities or in search of lower business costs compared with the established population centers. The State has not paid enough attention to this movement of industry. In a few cases, the RWQCBs have required municipalities to develop new pretreatment programs. Such actions are appropriate and commendable. However, these programs are sometimes a late response to serious, acute environmental problems at municipal treatment plants caused by inadequately controlled industrial wastewater discharges. Currently, Region 9's pretreatment enforcement program is searching for inadequately controlled industries in the Central Valley and finding a sufficient number of violators to support a significant enforcement initiative.

EPA Region 9:

The Region has no direct pretreatment activities in the State of California. The Region has responsibility for POTWs that discharge to federal waters or are under CWA section 301(h) waivers. These POTWs operate pretreatment programs because of their size or as a condition of the section 301(h) waiver. However, the permits for these POTWs are jointly issued by the Region and the State and the State is given lead responsibility to monitor permit compliance, including oversight of the pretreatment programs operated by these POTWs.

3. Concentrated Animal Feeding Operations

The State of California:

Region 9 estimates that there are 1,575 CAFOs in California. The majority of the CAFOs in California are in two RWQCB jurisdictions, with approximately 75% in the Central Valley RWQCB and 20% in the Santa Ana RWQCB (which includes the Chino Basin). Three RWQCBs (North Coast, Lahontan, and San Diego) each have 3 to 12 CAFOs and have resource constraints that hinder their ability to identify all the CAFOs in their jurisdiction. Two of these RWQCBs have asked for EPA contractor assistance to help with this effort.

The inventory information ranges from very good to some uncertainty, depending on the RWQCB that conducted the survey. The Santa Ana and Colorado River Basin RWQCBs have good inventories of their CAFOs. However, the Central Valley RWQCB has not issued permits to all its CAFOs and therefore does not receive updated information in annual reports from the CAFOs.

The State does not need to revise its regulations to implement the new federal CAFO regulations. Of the State's CAFOs, approximately 330 are currently under State permits or NPDES facility permits. However, none of the current permits require nutrient management plans (NMPs) that meet current CAFO rule requirements. The Santa Ana RWQCB covers its CAFOs under an NPDES general permit that is to be revised in 2004 to incorporate new requirements in the CAFO rule. Other RWQCBs are developing NPDES permits that will require CAFO operators to develop NMPs.

Many of the RWQCBs are waiting for the Central Valley RWQCB to issue its general permit for dairies so they can use it as a template for their permits. The Central Valley RWQCB is expected to adopt its draft permit early in 2005. The NPDES permit will likely require that a professional soil scientist, professional agronomist, professional crop scientist, or crop advisor certified by the American Society of Agronomy prepare the NMPs.

The State does not have technical standards in place at this time. The SWRCB has deferred to the nine RWQCBs the responsibility for establishing technical standards. There is more concern about groundwater pollution than surface water discharges and an effort is being made to develop technical standards that are protective of groundwater. Currently, much of the effort to develop technical standards for the State is focused on a stakeholder effort led by the Natural Resources Conservation Services (NRCS) to develop Comprehensive Nutrient Management Plans (CNMPs) guidance. The stakeholders include State agencies, EPA, NRCS, and the University of California Cooperative Extension. Once the CNMP guidance is promulgated, it can be used to draft NMPs. The NMPs will be nitrogen-based, although there may be a few specific cases where the NMP will be phosphorus-based. The NRCS hopes to pilot the guidance at about 20 facilities during 2004. It appears that the NRCS

guidance may not be available soon enough to serve as a technical guidance for permits in some RWQCBs.

Given the fact that the Central Valley and Santa Ana RWQCBs plan to adopt or revise their CAFO general permits in late 2004 or early 2005 and the other RWQCBs will follow their lead, the State is on track to issue permits in a timely manner; however, full implementation of the NMPs may be difficult to achieve by the December 2006 deadline.

Oversight of NMPs will vary depending on the RWQCB, but in general, because of severe staffing limitations, there will be very limited efforts, if any, to evaluate the effectiveness of NMPs. CAFOs will be required to inform the appropriate RWQCB when they have prepared and implemented an NMP. Limited inspections will be used to verify that NMPs are fully implemented. The RWQCBs will continue to conduct inspections of surface waters to assess the presence of animal waste constituents. In areas more vulnerable to groundwater contamination, groundwater monitoring may also be used to measure NMP effectiveness. If such contaminants from a CAFO are found, existing enforcement programs could be used to bring about corrective actions and impose penalties.

Staffing limitations will also affect the ability to conduct routine inspections of CAFOs. During the first year of implementation of the new permitting program for CAFOs, staff will spend most of their time processing permits. After the permits are issued and record-keeping procedures implemented, staff will be able to start inspections of CAFOs and other animal feeding operations. With approximately 3,000 animal feeding operations (including CAFOs) in California and fewer than 20 field staff, it is likely that facilities will be inspected only once every 3 years.

In a follow-up to an inspection, an RWQCB will typically send a notice of violation letter to a facility if RWQCB staff identify deficiencies in the waste management system. In the Central Valley, a Dairy Task Force is also used in some instances when an inspector finds evidence of a waste discharge. The Task Force is composed of inspectors and attorneys to facilitate quick action against dischargers.

EPA Region 9:

There are no CAFOs in Indian Country in California; therefore, the Region has no direct activities related to CAFOs in California.

4. Stormwater

The State of California:

Overall, California has 32 stormwater permits in place, 28 of which are Phase I MS4 permits, which cover about 300 co-permittees. The permits cover a specific watershed, except for Caltrans permit, which has a statewide coverage. Of the 28 Phase I MS4 permits, 10 have expired or will expire during State fiscal year 2004-2005. Included in these is the Caltrans statewide permit. Staff are working on the reissuance of this permit, but it is not known when it will be reissued.

Separate statewide general stormwater permits have been issued for Phase I industrial facilities and construction sites. The construction general permit was modified in December 2002 to cover Phase II construction sites. The construction permit expired in August 2004, and the State is working to reissue

the permit.⁶ The industrial general permit has also lapsed; it expired in April 2002 and reissuance may occur in fall 2004. A no-exposure certification is not yet available and will not be available until the industrial general permit is reissued. The State's industrial permit covers about 9,210 facilities and the construction permit covers about 12,930 construction sites (8,690 of which are large construction sites and 4,240 are small construction sites). The State issued a small MS4 general permit in April 2003. In addition, a separate general permit was issued for small (1–5 acres) linear construction projects in June 2003.

Construction and industrial NOI data are tracked electronically; the NOI data are also available to the public on the SWRCB's Web site. The database includes only basic information such as the name and address of the permittee and the facility, project size for construction, and billing information. Basic NOI data are also tracked electronically for the small MS4 general permit; the tracked data include the name and address of the MS4, whether the stormwater management plan (SWMP) has been approved by the State, and whether any public hearings have been scheduled. When the SWMP has been approved by the State, a link is provided to the SWMP for review by interested parties, in response to the Ninth Circuit decision on the Phase II regulations in January 2003. SWMPs from 178 traditional small MS4s have been received and are now being reviewed by RWQCB staff.

Among the strengths of the California program is high-quality, third-generation MS4 permits that include detailed best management practice (BMP) requirements that enhance enforceability and help define the maximum extent possible (MEP). California is ahead of most states in responding to the Ninth Circuit decision on the Phase II regulations. The State also has the benefit of an organization called the California Stormwater Quality Association, which has been very effective in facilitating the implementation of the program in the State. Problem areas in the State program include a large number of MS4 permit appeals and litigation, which divert time and resources away from implementation and environmental results. MS4s often complain that EPA has not adequately defined MEP and that State permits go beyond what could reasonably be considered MEP. Tension is growing over the pressure to include post-TMDL numeric limits in MS4 permits in lieu of BMPs.

EPA Region 9:

The Region has issued permits for all Phase I storm water discharges in Indian Country. These permits include the construction general permit and a multisector general permit for discharges from industrial facilities.

There is one small Phase II MS4 in Indian Country in California (Agua Caliente Reservation). The Region recently issued an individual Phase II MS4 permit for this reservation. Phase II construction sites are covered by the recently reissued construction general permit.

5. Combined Sewer Overflows/Sanitary Sewer Overflows

The State of California:

Combined Sewer Overflows: Two cities in California have CSOs—San Francisco and Sacramento. San Francisco has two separate CSO permits covering different portions of the city. Only Sacramento was required to develop a long-term control plan (LTCP); San Francisco was not required to develop an

⁶ The National Data Sources column in the Management Report, measure #31, is based on data as of July 1, 2004, and shows the Phase II construction permit as current.

LTCP because of planning efforts that preceded the CSO policy. The LTCP for Sacramento has been approved and is being implemented. Both CSO communities have implemented the nine minimum controls. The communities use CSO control technologies that include measures such as sewer separation, storage, and treatment. Monitoring of discharges is required for both CSO communities.

The permits conform to the 1994 CSO Control Policy as required by the Wet Weather Water Quality Act of 2000. When permits are reissued, the Region reviews the permits to ensure compliance with the CSO Control Policy.

No efforts are under way to revise water quality standards as the CSO communities implement the LTCPs; permittees have not requested such revisions. San Francisco recently conducted a recreational water use study near the CSO discharges along the Pacific Ocean shoreline. The study found that the beaches are rarely used during wet-weather conditions and that existing water quality standards appear appropriate. The City continues to monitor recreational water uses.

NPDES permits for CSO discharges include a number of provisions to inform the public of CSOs. The San Francisco permit requires that the permittee post warning signs along the beach when CSOs occur. A recorded hotline and a Web site also provide updated water quality information daily. In addition, water quality monitoring is required for indicator bacteria. When bacteria levels fall below specified criteria, the beach postings may be removed. The Sacramento permit requires similar procedures to alert the public to CSOs.

CSO discharges have decreased in volume and frequency for both San Francisco and Sacramento since CSO controls were implemented. The reductions for San Francisco have ranged from 80%–90% compared with the 1970s prior to implementation of the program. Sacramento has had only one CSO since 1997; the near elimination of CSO discharges in Sacramento is a result of increases in system storage capacity implemented in the mid-1990s. In the 3-year period prior to 1997, there were 10 CSO discharges.

Sanitary Sewer Overflows: State law requires reporting of 1,000-gallon SSOs to the Office of Emergency Services, RWQCBs, and County Health Agencies. Some RWQCBs have imposed more extensive SSO reporting requirements through waste discharge requirements (similar to NPDES permits). Some County Health Agencies require reporting of all SSOs.

Some RWQCBs maintain detailed and complete databases of spills. The SWRCB currently maintains a rudimentary statewide SSO database. The SSO data in the SWRCB database are limited to large volume spills and the database suffers from incomplete data entry. The California Office of Emergency Services maintains a database of all types of spills in the state, including SSOs greater than 1,000 gallons.

The SWRCB is overhauling its SSO database as part of the CIWQS project. Planned improvements include online discharger reporting of SSOs and a comprehensive suite of data elements relative to SSOs. This new system is expected to be available in July 2005.

The SWRCB is working with stakeholders, including EPA Region 9 staff, to address SSOs throughout the State. Products resulting from this effort are expected to include the following:

- Monitoring and reporting requirements

- Standard collection system management plan topics that must be addressed
- Industry standards for certain types of management practices
- Training and outreach program

SWRCB action and approval of these recommendations is expected within the next 6–9 months.

SSO trends are difficult to assess because of incomplete reporting in most parts of the State. However, in Orange County and within the San Diego RWQCB (where systems are required to report all SSOs), reporting is now very complete. A review of historical data for these areas shows increasing numbers of reported SSOs in the late 1990s and early 2000 as systems began more complete reporting. In these areas there is now see a downward trend in the number of SSOs, which probably reflects real decreases as these systems have been required by permit and enforcement to improve system operation and maintenance.

Two RWQCBs (Santa Ana and San Diego) have issued general waste discharge requirements requiring spill reporting and development of SSO response and prevention plans. These general waste discharge requirements cover both direct dischargers and satellite systems. Other RWQCBs have issued individual waste discharge requirements (some are also NPDES permits) requiring spill reporting and development of SSO response and prevention plans. Some of these waste discharge requirements (and some issued enforcement orders) have addressed satellite systems.

The Central Coast RWQCB has issued an SSO waste discharge requirement to the Monterey Regional facility and satellite systems.

Some State-issued permits (see above) require development of SSO response and prevention plans or sanitary sewer system management plans, which are similar to EPA's draft Capacity, Management, Operations and Maintenance (CMOM) requirements. Some of these permits are NPDES permits; others are not. The Santa Ana and San Diego RWQCBs take the position that these permits should remain as non-NPDES waste discharge requirements (WDRs) until such time that EPA adopts a CMOM regulation. Generally, the State requires the plans to be submitted for State review, but State approval is not required.

EPA Region 9:

There are no CSOs in Indian Country in California; therefore, the Region has no direct CSO activities in California. Over the past several years, Region 9 has been working actively with the RWQCBs to address SSOs. The Region sent CWA section 308 information request letters to about 30 collection systems in coastal Southern California, an area with many recreational beaches known to be impacted by contaminated runoff and sewage spills. Responses were evaluated to target the systems with the most frequent spills and follow-up inspections were conducted. Stemming from this activity, the Region issued administrative orders to several systems and filed lawsuits against the cities of Los Angeles and San Diego. The Los Angeles case was recently resolved with a consent decree requiring improved maintenance and extensive repair and replacement of aging sewer pipes. Region 9 has addressed collection system CMOM at numerous conferences and workshops for California collection systems. Also, as noted above, Region 9 is a member of the SWRCB SSO workgroup working to improve and standardize how SSOs are addressed in California.

6. Biosolids

The State of California:

The State informed EPA in 1994 that it will not seek authorization for the federal biosolids program unless EPA were to provide funding. The RWQCBs generally include standard biosolids requirements in NPDES permits, citing EPA as the enforcement agency, and the State has authority to regulate the land application of biosolids under the State's WDR program. Several RWQCBs issue WDRs to land applicators. The SWRCB adopted a general order for WDRs for biosolids on July 22, 2004. Very few WDRs have been issued to wastewater treatment plants (WWTPs) to address their responsibilities. Only WWTPs that spread the biosolids on their own property or on adjacent city-owned lands have received WDRs. RWQCB personnel do not review biosolids activities requiring tracking at the treatment plant (operation of digesters, sampling points, and the like) except at treatment plants where biosolids are applied on site or on adjacent lands. No electronic tracking system has been created to track compliance; only a paper filing system exists for tracking compliance information. The Region estimates that about 65% of biosolids are being applied to land or distributed for reuse.

For compost facilities, the California Integrated Waste Management Board (CIWMB) issues permits that include the same basic regulations under 40 CFR 503 for biosolids and disposal. Currently about one-quarter of the biosolids produced in California are composted, either at large regional composting facilities or at WWTPs.

The WDRs issued by the RWQCBs and the permits issued by the CIWMB are all individual permits; some permits have expired but have been administratively extended.

The Region works with the State to include biosolids requirements consistent with federal regulations in State-issued NPDES permits. This is covered in the annual work plan for State grant funding under CWA section 106. Moreover, the Region works closely with POTWs, providing assistance, guidance, and support. In California there is a great deal of resistance to applying biosolids on agricultural lands.

EPA Region 9:

In addition to providing recommended standard permit language or facility-specific permit language, the Region inspects WWTPs, other biosolids preparers, and land application sites; provides guidance, compliance assistance, and interpretation of the rules to the regulated community; and takes enforcement actions. The Region focuses primarily on the treatment plants, since these are generally not inspected by RWQCB or county staff, in particular in the jurisdiction of RWQCBs where the biosolids will be sent to another RWQCB's or the State's jurisdiction for use or disposal. The Region also focuses on tracking operations in Indian Country. The Region provided a statement to the SWRCB supporting adoption of the SWRCB's general order for biosolids, which was adopted on July 22, 2004.

Section III. NPDES Compliance Monitoring and Enforcement Response

In a separate initiative, EPA's Office of Enforcement and Compliance Assurance (OECA), EPA Regions, and the Environmental Council of the States have developed a tool for assessing State performance in enforcement and compliance assurance to ensure that States meet agreed-upon minimum performance levels and provide a consistent level of environmental and public health protection nationwide. OECA will use the State profiles to focus these efforts and identify areas needing further discussion and evaluation.

1. Enforcement Program

The State of California:

California has a statewide Water Quality Enforcement Policy (WQEP), which is by all nine RWQCBs to provide for consistent enforcement of water quality laws and regulations in the State of California. This policy lays out procedures for implementation by the individual RWQCBs. It provides for reviews of compliance reports submitted by the various water programs, inspections of permitted facilities, and monitoring of the progress of made by facilities on compliance schedules. The WQEP also sets priorities for enforcement, including escalation of enforcement action when appropriate. These procedures are used for the review of effluent data, schedules, pretreatment reports, biosolids, stormwater, SSO violations, and other issues. The policy is consistent with the federal Enforcement Management System. The WQEP also contains procedures for establishing injunctive relief and penalties through written orders and guidelines for establishing supplemental environmental projects (SEPs).

California has the authority to issue various types of formal and informal enforcement actions that include penalties. These penalties, with potential SEPs, include the recovery of economic benefit for noncompliance. California has established a statewide policy for determining monetary assessments of penalties, and the policy is consistent with EPA's Penalty Policy. These procedures are also contained in the State's WQEP. In addition, California is implementing a Mandatory Minimum Penalty program, which was enacted by the State legislature in 1999. California, through each of the RWQCBs, ensures that enforcement actions are prioritized and addressed in a timely and appropriate manner.

However, California is severely limited by resource constraints in the enforcement programs. Improvement in this area could significantly increase identification of violations and collection of penalties. One of California's responses to this resource shortfall is to provide for the electronic submittal of dischargers' reports and compliance checking mentioned earlier. The automation is intended to enable California to do more with limited state resources.

EPA Region 9:

The Regional enforcement role in the State of California is to provide support and oversight to the nine RWQCBs' programs to enforce the NPDES programs, including wet-weather priorities. The Region, the SWRCB, and the RWQCBs meet bimonthly to coordinate and collaborate on program- and case-specific matters. The Region works closely with each RWQCB to ensure that timely and appropriate action is taken, as warranted. The RWQCB, EPA Region 9, or both identify cases and work on them in a collaborative manner to bring the best resources to bear on a specific issue. The Region has taken on

significant cases involving sewage spills and stormwater violations by municipalities and MS4s. A few of these cases are discussed in earlier parts of this evaluation. The result of this joint State and EPA Region 9 enforcement presence in California has had a positive impact on industry compliance with the CWA.

2. Record Keeping and Reporting

The State of California:

The data for California in the PCS database are unreliable, and it is therefore difficult to assess on a national level whether trends in enforcement are valid. However, based on data from State systems, EPA is aware that California has a good enforcement presence in the State due to inspections and is implementing an effective enforcement program. Database reporting deficiencies have been historically identified by EPA within California, and improvement in this area would greatly improve the California program. Many improvements are being developed through the CIWQS project mentioned earlier, including complete reporting to PCS.

3. Inspections

The State of California:

The State attempts to inspect all major facilities each year and minor facilities at least once every 5 years. Problem facilities are inspected more frequently. In the pretreatment program, audits are conducted once every 5 years. In addition, the State attempts to perform yearly inspections of all programs.

The State considers public health and the environment in establishing State and Regional priorities, and has a robust wet-weather inspection program.

4. Compliance Assistance

The State of California:

California provides compliance assistance to permittees through various training programs, workshops, publications, and “help desk”-style staff assistance with questions and concerns. These activities are consistent with EPA guidance, policy, and procedures for compliance assistance activities.

Section IV. Related Water Programs and Environmental Outcomes

1. Monitoring

The State of California:

The SWRCB is still developing its monitoring strategy, incorporating the 10 elements included in the “Elements of a State Water Quality Monitoring Program Guidance,” March 2003. The draft strategy is expected in fall 2004. Therefore, the SWRCB has not yet begun its implementation. However, the SWRCB plans to develop a statewide probabilistic sampling design as part of its program to monitor its nonpoint source program’s effectiveness. The State will be using CWA section 319 program funds to implement this monitoring program, and its commitments will be incorporated into the 319 grant work plan. California is also part of the Western Environmental Monitoring and Assessment Program (EMAP) pilot monitoring program. Significant sampling partners in this major effort are the California Department of Fish and Game (wadeable streams), Southern California Coastal Water Research Project (coastal and wetlands), San Francisco Estuary Institute (coastal and wetlands), Moss Landing Marine Lab (coastal), and NPDES dischargers (coastal) among others. Each of the nine RWQCBs has targeted monitoring programs for TMDL development, standards development, and other uses. For the Southern California Bight coastal waters, a regional monitoring program (using an EMAP-type design) is conducted every 4–5 years. Information from the targeted monitoring, project- or program-specific monitoring (e.g., San Francisco Bay-Delta monitoring network), and probabilistic monitoring data (EMAP and other regional monitoring) can be used for permit background calculations.

For the State’s Western EMAP pilot effort, a randomized probabilistic design was used to develop a monitoring program for coastal offshore waters, estuaries, and wadeable perennial streams. In addition, the State supports numerous site- or Region-specific monitoring programs targeted to answer more specific questions (e.g., for TMDL development, San Francisco Bay Delta). The State does not use the probabilistic approach for lake monitoring.

Monitoring requirements are included in all NPDES permits. Some permits include rigorous and extensive ambient monitoring requirements. Parameters to be monitored have different frequencies of monitoring, from continuous monitoring to annual or less frequent monitoring. Regular, annual, and more frequent monitoring requirements allow the State to determine trends. The 5-year permit term is considered in the State’s monitoring approach. For example, southern California coastal dischargers are encouraged to participate in regional monitoring (on a 4- to 5-year cycle) and collaborate with the State, EPA, other dischargers, and monitoring agencies to collect coastal ecological information more consistently and with better spatial coverage. The dischargers permit allow them to participate in the regional monitoring and forgo some of the regular permit monitoring requirements in the year that regional monitoring is conducted. A similar regional monitoring program exists in San Francisco Bay area, where the NPDES dischargers are assessed a fee by the State and required to pay an appropriate share to the San Francisco Estuary Institute to have that research group conduct the monitoring throughout the bay to ensure consistency in data collection.

EPA Region 9:

EPA Region 9, in collaboration with EPA's Office of Research and Development (ORD), has been instrumental in initiating much of the monitoring activities mentioned above. The Region has contributed substantial funding as well as personnel, time, and resources for the Western EMAP pilot project, coastal EMAP efforts, and the regional monitoring by NPDES dischargers of the Southern California Bight. It was also Region 9 that encouraged the SWRCB to consider adopting a probabilistic design using CWA section 319 funds for a statewide monitoring program to assess the effectiveness of the nonpoint source program. Region 9 initiated the Regional monitoring effort offshore for southern California and within San Francisco Bay about 10 years ago with a joint kickoff meeting with ORD EMAP. The Region facilitated and coordinated the Western EMAP efforts for coastal estuaries, offshore waters, coastal wetlands, San Francisco Bay, and wadeable perennial streams. The Region also continues to support and fund much of the necessary monitoring for TMDL development.

2. Environmental Outcomes

The State of California:

Overall, according to EPA's latest Water Quality Report (August 2002), California assessed 12% of its river miles and 45% of its lake acres.⁷ These figures are similar to the national averages. However, California assessed 95% of its estuarine areas, well above the national average. The percentage of water bodies that are assessed has increased in recent years relative to a decade ago. In 1992, the State assessed 3% of river miles, 18% of lake acres, and 50% of estuarine areas.

The State's activities in the Western EMAP will help to improve information concerning water quality.

EPA Region 9:

For the Western EMAP effort, the Region will be working with the State to assess the information for a State summary report. With a probabilistic design, the final assessment and data results would be representative of 100% of the population of water bodies monitored (i.e., wadeable perennial streams and estuaries in California). The Region hopes that the State will sustain this effort and approach to monitoring through the nonpoint source program to assess the general effectiveness of the State's nonpoint source program and projects.

3. Water Quality Standards

The State of California:

The implementation of water quality standards in NPDES permits is a factor that the State considers when standards and policies are adopted, and the State attempts to coordinate between the standards and permit programs. Implementation guidance for water quality standards may also be provided; for example, when the CTR was adopted in 2000, the State concurrently adopted a SIP for the CTR to clarify implementation issues. The CTR and SIP were reviewed by both the standards and permit programs to ensure coordination. Nevertheless, a few water quality standards which are difficult to implement (such as narrative standards). On occasion, use attainability analyses are considered. Several group actions covering similar water bodies have been completed covering roughly 100 water bodies.

⁷ Note that these values are the percentage of waters assessed for any one or more uses, while the Management Report, measures #47 through #50, shows the percentage of waters assessed for particular uses.

Four of the nine RWQCBs have enabling provisions for compliance schedules in their Basin Plans. The State is generally timely about meeting the triennial review schedule and developing issues to be considered; however, the actual adoption of amendments is often delayed. Resource limitations are cited by the State for delays in adoption.

All RWQCBs have adopted at least narrative nutrient standards and most have adopted numeric criteria. The numeric criteria predate the national effort to develop criteria on an ecoregional basis. However, the State has a plan, consistent with the national policy, to develop scientifically defensible nutrient criteria. Two RWQCBs have adopted E. coli and Enterococci standards. The State plans to adopt Enterococci standards for all ocean waters in FY2005 as part of the update of the California Ocean Plan.

EPA Region 9:

The implementation of water quality standards in NPDES permits is a factor the Region considers when standards and policies are adopted. The water quality standards and NPDES programs administered by the same office and many staff work on both water quality standards and permits to foster integration on a watershed basis. Also, several of the permits are issued jointly by EPA and the State. This helps foster integration with State water quality standards.

The Region is in the process of updating the mercury and selenium water quality criteria in the CTR. For mercury, in the near future, the Region plans to amend the CTR to include the new CWA 304(a) fish tissue criteria guidance values for human health. For selenium, Region 9 is developing California-specific wildlife criteria and expects to amend the CTR to include these values when they are available.

4. Total Maximum Daily Loads

The State of California:

In California, TMDLs must be incorporated into each RWQCB's Basin Plan along with an implementation plan. The mechanism for incorporating the Basin Plan provisions into NPDES permits varies by RWQCB. In some RWQCBs this is accomplished by reviewing all NPDES permits on a rotating watershed basis over a 5-year rotation. The use of the rotating watershed process allows all NPDES permits in a watershed to be reviewed at the same time, and helps ensure who TMDL-related wasteload allocations (WLAs) are appropriately incorporated in the permits. In other RWQCBs staff who develop the TMDL are responsible for incorporating the TMDL provision into permits at the time of renewal. For statewide permits, language is being added requiring permittees to comply with individual regional TMDLs. The basis for each WQBEL is explained in the permit fact sheet, with additional documentation kept in the facility-specific files, which are available for public review. WQBELs are developed consistent with the State's administrative rules for all waters; however, for waters that do not meet water quality standards, special consideration is given to the waters' assimilative capacity. New applicants for permits to discharge to waters without assimilative capacity would be subject to WQBELs established at stringent levels (either end-of-pipe criteria or zero) for the pollutants of concern. Such applicants are encouraged to find alternative locations for their discharges.

California incorporates the provisions of relevant TMDLs into NPDES permits at the time the permits are renewed. WLAs are incorporated into NPDES permits as they are expressed in the TMDL—either as a load or a concentration.

RWQCB TMDL staff work on many issues beyond TMDLs. It is not uncommon for them to perform water quality standard and NPDES duties in conjunction with their main TMDL duties. This enhances program integration, but reduces the amount of staff time available to develop TMDLs.

EPA Region 9:

The 2002 inventory of impaired water bodies in California prepared under CWA section 303(d) lists 1,883 waterbodies.⁸ For the upcoming 2004 section 303(d) list, Region 9 initiated data collection efforts in early 2004 when the SWRCB indicated that it would not be able to compile the 2004 list. The Region solicited and gathered new data from various sources (e.g., sediment quality data from W-EMAP, EPA National Lakes Contamination study, San Francisco Estuary Institute data, San Diego MS4 data, SWRCB-Water Rights Division data for three rivers with FERC facilities, and perchlorate data for Colorado River). Subsequently, the SWRCB said that it would produce the 2004 list, albeit late (in 2005), after concentrating its efforts on first developing a listing methodology and policy. The Region stopped further data collection and, on June 15, 2004, provided all the data collected up to that date to the State.

Thus far, 324 TMDLs had been completed (146 by the State and 178 by EPA), or about 17% of the necessary TMDLs.⁹ Three hundred additional TMDLs are under way. The State is somewhat behind schedule but is making diligent efforts to adopt high-quality TMDLs that can be implemented because the State adopts implementation plans concurrent with TMDLs (which is not a federal requirement). Region 9 is expending approximately \$1 million a year in staff and contract resources to develop TMDLs in California under consent decrees. Point sources are key issues in approximately one-half the TMDLs now under way in California, and Region 9 and the RWQCBs are trying to develop adequate WQBELs in the interim to be protective. The strengths of the California TMDL program include a fairly large staff (about 100 people) and a strong commitment to implementation. Weaknesses include timeliness in TMDL completion, a burdensome adoption process, a limited base monitoring program, and delays in the development of the State listing policy for the 2004 list.

The Region establishes TMDLs in California in accordance with two consent decrees: North Coast and Los Angeles Region. As noted above, the Region has developed and established 178 TMDLs for California, all of which are related to the consent decrees. The Region has not established any TMDLs for Indian Country in the State. For all EPA-issued permits, permitting staff coordinate with TMDL staff to ensure that permits are consistent with any existing TMDLs.

At this time, none of the permits issued by Region 9 incorporate the provisions of a TMDL. In fall 2004, the Region and the State intend to jointly propose a permit for the City of Los Angeles Hyperion POTW that will incorporate a TMDL for bacterial indicators. The TMDL was adopted by the State.

Region 9 and SWRCB staff visited each RWQCB between October and December 2003 to review TMDL program status, planning, difficulties, and support needs. The review focused on identifying program areas that could benefit from contract support and technical assistance.

⁸ The National Data Sources column on the Management Report, measure #41, shows 1,471 TMDLs. The remaining TMDLs had not been entered into the National TMDL Tracking System at the time the data were downloaded on July 2, 2004.

⁹ Note that the Management Report, measure #54, includes only TMDLs completed as of September 30, 2003. The 324 value includes TMDLs completed after that date.

5. Safe Drinking Water Act

The State of California:

The California Department of Health Services has nearly completed its Drinking Water Source Assessment program for 16,000 sources of drinking water in the State. Runoff has been identified as one of the most prevalent potentially contaminating activities for both ground and surface sources of drinking water, in the opinion of the public water supply managers.

EPA Region 9:

The Region and the State have worked to coordinate the Underground Injection Control (UIC) program with the NPDES stormwater program. Region 9 is also working on a guide for MS4s concerning the requirements of the UIC program and the best management practices that are available to ensure the protection of groundwater resources.

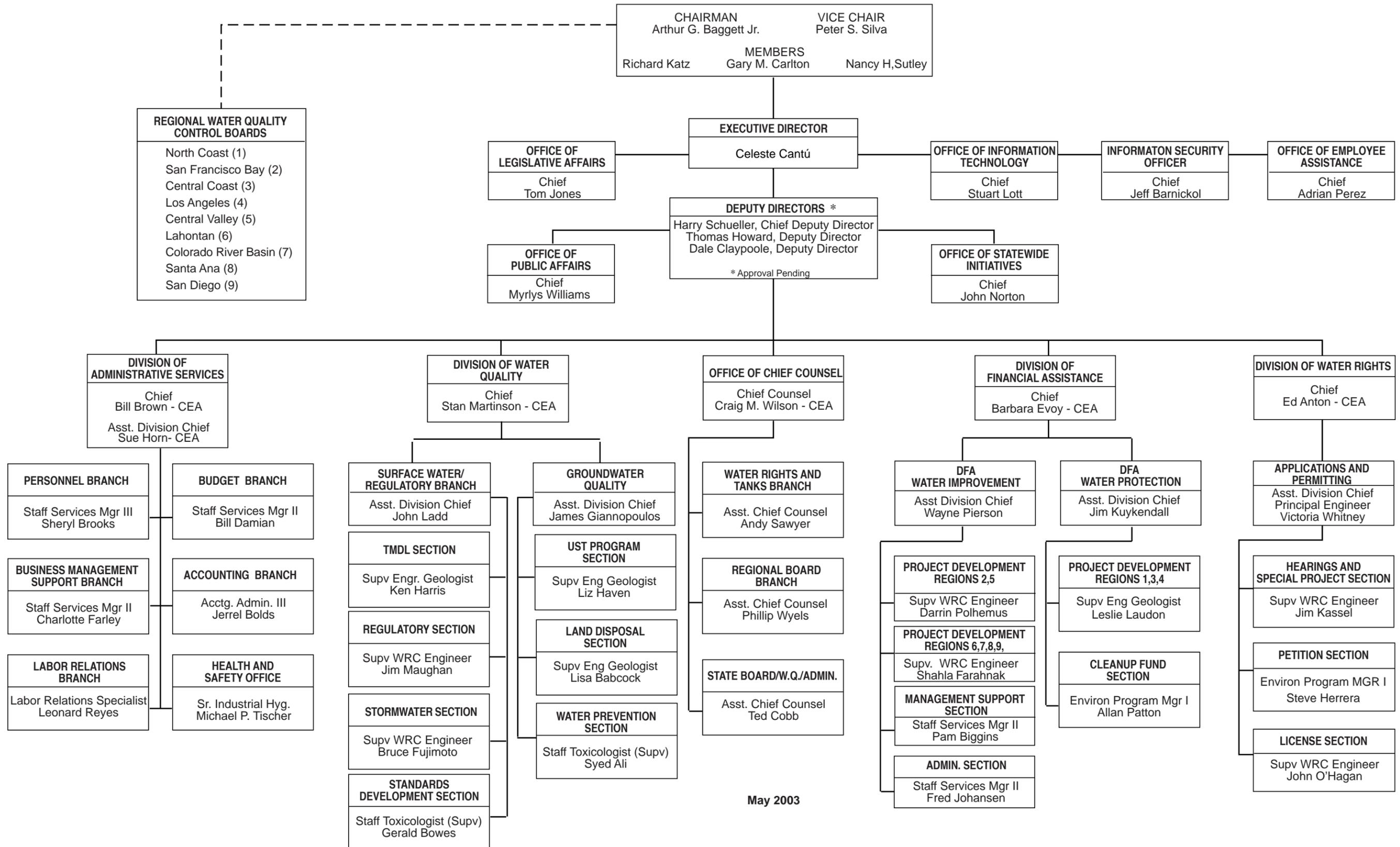
Section V. Other Program Highlights

The State of California:

The State has developed an innovative process to address the Ninth Circuit Court decision on the Phase II stormwater regulations. In 2003, the court ruled that permitting authorities must ensure State review of stormwater management programs (SWMPs) submitted pursuant to a general NPDES permit for small MS4s and must provide for public review and public hearings concerning the SWMPs. The State's procedures include an initial State review (minimum of 60 days) of SWMPs to determine the completeness of the SWMPs. After the SWMPs are deemed complete, they are made available to the public for review; a public hearing may also be requested. A list of SWMPs that have been deemed complete is available on the SWRCB's Web site. In most cases, a link is also available for interested parties to download a SWMP.

The State currently uses and accepts applications from the Permit Application Software System (PASS). In addition, the State plans to establish an electronic Monitoring Reporting System (e-SMR) that will provide facilities with an alternative to submitting paper Self-Monitoring Reports to the State and DMR packages. The e-SMR system is in design and is scheduled for implementation in July 2005.

STATE WATER RESOURCES CONTROL BOARD



May 2003

NPDES Management Report, Fall 2004

California

			Profile Section	GPRA Goal	Nat. Avg.	National Data Sources		Additional Data	
						State Activities	EPA Activities	State Activities	EPA Activities
NPDES Progress									
Universe	1	# major facilities (6,690 total)	I.1		n/a	220	11		10
	2	# minor facilities covered by individual permits (42,057 total)	I.1		n/a	558	5	557	6
	3	# minor facilities covered by non-storm water general permits (39,183 total)	I.1		n/a	1,259	0		14
	4	# priority permits (TBD)	I.6			--	--		
	5	# pipes at facilities covered by individual permits (142,761 total)	I.7		n/a	2,099	--		
	6	# industrial facilities covered by individual permits (32,505 total)	I.1		n/a	507	11		10
	7	# POTWs covered by individual permits (15,197 total)	I.1		n/a	245	5		6
	8	# pretreatment programs (1,482 total)	II.2		n/a	92	--		
	9	# Significant Industrial Users (SIUs) discharging to pretreatment programs (22,158 total)	II.2		n/a	3,844	--		
	10	# Combined Sewer Overflow (CSO) permittees (831 total)	II.5		n/a	3	--		
	11	# CAFOs (current and est. future) (17,672 total)	II.3		n/a	1,575	--		
	12	# biosolids facilities (TBD '05)	II.6			--	--		
NPDES Program Administration	13	State or Region assessment of State NPDES program (none (N)/assessment (A)/profile (P))	I.1	50 states 2004	n/a	A, P	P		
	14	% pipes at facilities covered by individual permits w/ lat/long in PCS	I.7		46.3%	44.9%	--		
	15	State CAFO legal authority expected (mo/yr)	II.3	2005	n/a	NC	n/a		
	16	# Withdrawal petitions/legal challenges (22 total)	I.4		n/a	1	n/a		
	17	DMR data entry rate	I.7		95%	33%	--		
	18	# permit applications pending (1,011 total)	I.6		n/a	2	--		
NPDES Program Implementation	19	% major facilities covered by current permits	I.6	90%	83.7%	86.4%	27.3%		
	20	% minor facilities covered by current individual or non-storm water general permits	I.6	90% 12/04	87.0%	86.5%	0.0%	80.0%	
	21	# major facilities w/permits expired >10 yrs. (56 total)	I.6		n/a	0	1		
	22	% priority permits issued as scheduled (TBD '05)	I.6	95% 2005		--	--		
	23	% pretreatment programs inspected/audited during 5 yr. inspection period	II.2		85.3%	88.0%	--		
	24	% SIUs w/control mechanisms	II.2		99.2%	99.8%	--		
	25	% of CSO permittees with long-term control plans developed or required	II.5	75% 2008	82.2%	33.3%	--		
	26	% CAFOs covered by NPDES permits	II.3		35%	21%	--		
	27	% biosolids facilities that have satisfied part 503 requirements (TBD '05)	II.6			--	--		
	28	# Phase I storm water permits issued but not current (76 total)	II.4		n/a	4	0		
	29	# Phase I storm water permits not yet issued (5 total)	II.4		n/a	0	0		
	30	Phase II storm water small MS4 permits current (Y/N/D (draft) (35 States)	II.4	100% states 2008	n/a	Y	0/1/0		
	31	Phase II storm water construction permit current (Y/N/D (draft) (49 States)	II.4	100% states 2008	n/a	Y	Y	N	
NPDES Compliance Monitoring and Enforcement Response	32	% major facilities inspected	III.3		71%	82%	4%		
	33	(inspections at minors) / (total inspections at majors and minors)	III.3		76%	48%	64%		
	34	% major facilities in significant non-compliance (SNC)	III.1		20%	8%	--		
	35	% SNCs addressed by formal enforcement action (FEA)	III.1		14%	11%	--		
	36	% SNCs returned to compliance w/o FEA	III.1		70%	74%	--		
	37	# FEAs at major facilities (666 total)	III.1		n/a	13	0		
	38	# FEAs at minor facilities (1,660 total)	III.1		n/a	16	0		

Explanation of Column Headers:

Profile Section: For each measure, this column lists the section of the profile where the program area (including any additional data for the measure) is discussed.

National Data Sources: The information in these two columns is drawn from two types of sources:

(1) EPA-managed databases of record for the national water program, such as PCS, the National Assessment Database, and the National TMDL Tracking System. NPDES authorities are responsible for populating PCS with required data elements and for assuring the quality of the data. EPA is working to phase in full use of NAD and NNTS as national databases.

(2) Other tracking information maintained by EPA Headquarters for program areas such as CAFOs, CSOs, and storm water.

The [definitions document](#) accompanying this Management Report provides a detailed definition of each data element in the National Data Sources columns.

Additional Data: These columns provide additional data in cases where information from other data sources differs from information in the National Data Sources column for reasons such as different timing of the data "snapshot." Additional data should generally adhere to the same narrative definitions as data in the National Data Sources, and should be derived using similar processes and criteria. Our goal is to work with the States on these discrepancies to ensure consistent and accurate reporting. A State contact is available who can respond to queries. The profiles discuss each additional data element.

State Activities: Information in these columns reflects activities conducted by the State program. (Shaded cells in these columns indicate that the work may not be entirely the State's responsibility, but a breakdown of the data into EPA and State responsibilities is unavailable.)

EPA Activities: Information in these columns reflects activities conducted by the EPA Region within the State.

NPDES Management Report, Fall 2004

California

		Profile Section	GPRA Goal	Nat. Avg.	National Data Sources		Additional Data	
					State Activities	EPA Activities	State Activities	EPA Activities
Water Quality Progress								
Universe	39	River/stream miles (3,419,857 total)	IV.2		n/a	211,513	n/a	
	40	Lake acres (27,775,301 total)	IV.2		n/a	2,164,417	n/a	
	41	Total # TMDLs in docket at end of FY 2003 (52,795 total)	IV.4		n/a	1,471	--	1,883
	42	# TMDLs committed to in FY 2003 management agreement (2,435 total)	IV.4		n/a	n/a	n/a	
	43	# Watersheds (2,341 total)	IV.2		n/a	--	--	
Water Quality Administration	44	On-time Water Quality Standards (WQS) triennial review completed (42 States)	IV.3		n/a	Y	n/a	
	45	# WQS submissions that have not been fully acted on after 90 days (32 total)	IV.3	<25% submissions	n/a	n/a	3	
Water Quality Implementation	46	State is implementing a comprehensive monitoring strategy (Y/N) (TBD)	IV.1	all states 2005	--	--	--	
	47	% river/stream miles assessed for recreation	IV.2		13.8%	8.5%	n/a	
	48	% river/stream miles assessed for aquatic life	IV.2		22.0%	12.0%	n/a	
	49	% lake acres assessed for recreation	IV.2		49.4%	38.0%	n/a	
	50	% lake acres assessed for aquatic life	IV.2		48.5%	42.0%	n/a	
	51	# outstanding WQS disapprovals (23 total)	IV.3		n/a	1	n/a	
	52	WQS for E. coli or enterococci for coastal recreational waters (12 States)	IV.3	35 states 2008	n/a	N	n/a	
	53	WQS for nutrients or Nutrient Criteria Plan in place (13 States)	IV.3	25 states 2008	n/a	Y	n/a	
	54	Cumulative # TMDLs completed through FY 2003 (10,807 total)	IV.4		n/a	210	--	
	55	# TMDLs completed in FY 2003 (2,929 total)	IV.4		n/a	98	36	
Environmental Outcomes	56	# TMDLs completed through FY 2003 that include at least one point source WLA (5,036 total)	IV.4		n/a	28	--	
	57	% Assessed river/stream miles impaired for swimming in 2000	IV.2		--	80.5%	n/a	
	58	% Assessed lake acres impaired for swimming in 2000	IV.2		--	55.8%	n/a	
	59	# Watersheds in which at least 20% of the water segments have been assessed and, of those assessed, 80% or more are meeting WQS (440 total)	IV.2	600 2008	n/a	--	--	

Explanation of Column Headers:

Profile Section: For each measure, this column lists the section of the profile where the program area (including any additional data for the measure) is discussed.

National Data Sources: The information in these two columns is drawn from two types of sources:

(1) EPA-managed databases of record for the national water program, such as PCS, the National Assessment Database, and the National TMDL Tracking System. NPDES authorities are responsible for populating PCS with required data elements and for assuring the quality of the data. EPA is working to phase in full use of NAD and NTTs as national databases.

(2) Other tracking information maintained by EPA Headquarters for program areas such as CAFOs, CSOs, and storm water.

The [definitions document](#) accompanying this Management Report provides a detailed definition of each data element in the National Data Sources columns.

Additional Data: These columns provide additional data in cases where information from other data sources differs from information in the National Data Sources column for reasons such as different timing of the data "snapshot." Additional data should generally adhere to the same narrative definitions as data in the National Data Sources, and should be derived using similar processes and criteria. Our goal is to work with the States on these discrepancies to ensure consistent and accurate reporting. A State contact is available who can respond to queries. The profiles discuss each additional data element.

State Activities: Information in these columns reflects activities conducted by the State program. (Shaded cells in these columns indicate that the work may not be entirely the State's responsibility, but a breakdown of the data into EPA and State responsibilities is unavailable.)

EPA Activities: Information in these columns reflects activities conducted by the EPA Region within the State.