OVERVIEW

As in the prior update, the 2009 Update of the California Water Plan includes a volume consisting of Regional Reports, which describe the conditions for each hydrologic region in the State – as well as two areas of special interest (the Delta and Mountain Counties areas). Each regional report uses a standardized format in describing the current conditions for each region or area. The content for each report is being developed with the involvement of regional and local interests through a series of public workshops conducted in each region or area.

Each workshop consists of three major presentations to describe: an update on the state of Update 2009 activities; revision of Regional Report outlines, based on previous workshop results; and overview of the initial draft outline. For each workshop, most of the time is dedicated to small group review and comment of the initial draft outline of the Regional Report for that region or area. A workshop for the South Coast hydrologic region was held on March 6, 2008 in San Diego, CA. Copies of the workshop presentations, handouts, and materials are available on the Water Plan website at www.waterplan.water.ca.gov/materials.

A brief recap of the presentations is provided in the following paragraphs and the remainder of this document provides a summary of the small group discussions. Flip charts and worksheets were used to record ideas generated during the discussions and transcripts of the recorded results are located on the following pages.

Lew Moeller, Department of Water Resources (DWR) Update 2009 Project Team, made the first presentation regarding the status of major 2009 Update activities. A key element is the integration of the FloodSafe and IRWM (Integrated Regional Water Management) programs with the Water plan. This new content will be reflected in each Regional Report, as well as the scenarios and Resource Management Strategies (RMS). Other additions to the Water Plan include: quantification of scenarios and potential response packages; assessment of climate change impacts and recommended adaptation actions; and incorporation of other State plans with strong connections to the Water Plan.

Outreach efforts to regional, Tribal, and local interests are continuing to expand. A total of six drafts will be available for each Regional Reports and RMS, with opportunities to comment on the five drafts preceding the final report. Workshop sessions for RMS will occur during July and August 2008, with a conference line to facilitate participation. In addition to the feedback solicited for Regional Reports and RMS, review and comment is requested by June 30, 2008 for the Draft Assumptions and Estimate report released at the end of 2007.

In the second presentation, Mark Stuart, Chief of the Southern District for the Department of DWR, reviewed the key characteristics of the South Coast hydrologic region. A recap of the comments heard during the previous workshop was also provided, along with a revised outline for the Regional Report format. The final presentation, by Vern Knoop and David Inouye of the Southern District for DWR, described each section of the Regional Report for South Coast. Workshop attendees reviewed, discussed, and provided suggestions for each section, as recorded on the following pages.
Suggestions for Topics in Regional Report Outline

- how do environmental aspects (e.g. Delta smelt, Owens Valley, QSA), that impact water supplies and development, get reflected in Regional Report
- how can regional data be accessed? (need user-friendly access; breakdown to smaller areas); links to drill down to more information
- water supply funding is hard to reach through IRWMP process
- can Tribes access grants (IRWM) individually or required to partner with others
- inventory of all water sources
- recreation and fires should be included
- energy considerations (e.g. of conveyance)
- point to water rights issues: water transfers; Tribal issues
- stormwater: refer to jurisidictional urban runoff management plans (JURMPs) and watershed urban runoff management plans (WURMPs) [www.projectcleanwater.org](http://www.projectcleanwater.org)
- provide more tools for action (e.g. model ordinances)
- need a category on energy – energy consumption for water use and consequences to climate change; energy needs and future of energy availability (link to water choices and uses); also link to conservation and climate change
- include Tribal water districts
- Tribes need to be included in IRWMPs and other planning processes – Tribal lands and areas are being shown as habitat for threatened and endangered species in the MSHCP; land use patterns show Tribal lands as open space; Tribal lands are **NOT** open space

Suggestions for South Coast Regional Report

**Setting**
- need a heading for economy

**Watersheds**
- San Diego River
- 11 watershed units in San Diego County, see Regional Board Basin Plans and IRWMP
- how will State Watershed Plan (Dept. of Conservation) be included; include Tribes in planning process
- Tijuana River watershed

**Ecosystems**
- MSHCP – critical habitat, instream flows; Riverside County HCP; San Diego MSHCP
- fire burns as part of ecology
- riparian habitat, wetlands, including salt marshes and vernal pools
- very important to consider areas that are pristine or “minimally impacted”
- ocean, coastal estuaries
- invasive species

**Climate**
- Native American oral histories on changes in plant communities
- dry weather flows
- consider “arid, Mediterranean-like”
- precipitation decreases from north to south
- EPA Region 9 Regional Tribal Operations Committee (RTOC) has a Climate Change and Science panel
**Demographics**
- population growth, community development and economic trends
- longer-lived population, increased diversity with different cultural expectations
- border Tribes (i.e. Tijuana watershed)

**Land Use Patterns**
- city/county ordinances in place or to be encouraged
- summary of land use planning agency policies regarding water supply availability and conservation/landscaping ordinances
- building permits and low-impact development
- conversion of farmland to residential
- higher density in urban areas, less development in sensitive habitat areas

**Regional Water Conditions**
- provide snapshots of regional issues regarding water supply and future trends
- include issues from San Diego County, Sweetwater, and San Digueto, Catalina Island, and City of Avalon
- map out aquifers, surface storage, and adjudicated areas
- Tribal supply and use; Tribal systems and operators
- water transfers and banking are increasing
- include a section specific to each major area, including San Diego, to highlight local region-specific issues (e.g. high dependence – 90% - on imported water and Mexico; pumping restrictions

**Water in the Environment**
- coastal lagoons need constant water replenishment
- Santa Margarita River Habitat Preserve
- endangered species impacts on historical ag, M & I water supplies (i.e. Casitas WD loss of historical supply)
- regional HCPs

**Water Supplies**
- see URWMPs and IRWMP ([www.sdirwmp.org](http://www.sdirwmp.org))
- include storage
  - stormwater capture
- do recycled water projects result in a net increase in supply (e.g. Riverside park/playground project uses 1,000 AF – is less imported?); not all recycled water projects are equal (Riverside, Orange County)
- do transfers result in double-counting of supply?
- water reliability and impact on economy (suggested sources: MWD IRP, groundwater assessment, other regional reports)
- pumping restrictions
- imported: Colorado River drought and overdraft; SWP – judicial curtailment of exports to Southern CA

**Water Uses**
- conservation strategies (what's being done and efforts in future)
- xeriscape, native plants
- ag water and impact on economies
- summary of California Water Code and “reasonable” use of State’s drinking water resources
- reliability (for businesses that depend on 100% service) needed to support strong economy
- M & I per capita water use trends (info source: URWMPs)

**Water Quality**
- pesticides
- wild fire impacts
- aging wastewater treatment issues and discharge to ocean
- algal blooms
- invasive species (quaga mussels in Colorado River, tamarisk, arrundo)
- Mexico
- nutrients
- emerging contaminants: pharmaceuticals and personal care products
- agricultural runoff
- TDS
- Regional Board involvement (role)

**Project Operations**
- San Vicinte Dam; Cuyamala Lake (spelling?)

**Water Governance**
- include Tribal interests and regulators

**Flood Management**

**Historic Floods**
- floods on Tijuana and San Diego rivers

**Flood Hazards**
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**Institutions**
- regulations and ordinances from FEMA and local agencies
- add Mexico international boundary and water commission

**Existing Flood Damage Reduction Measures**
- Goat Canyon Flood Control Project (failure to accomplish, being redone)
- flood warning system (County of San Diego) trans-border

**Relationship with Other Regions**
- reliance on Delta supplies; effects of Delta on reliability and impact on economy – detail on peripheral canal in Delta Regional Report (some type of overarching chapter?)
- surface water with Mexico; flows from Mexico; binational agreements
- 7 Basin States Agreement; Colorado River Indian Tribes water rights
- SWP conveyance
- would be helpful to have a table that shows sources of water supply for regions (Colorado River, SWP, LA Aqueduct, water banking in Central Valley, IID transfers)
Regional Water and Flood Planning and Management
- how is IRWMP information being used?
- need balance of generalities and specifics
- Tribes need to be involved in IRWMPs
- how to include Watershed Plans developed by Department of Conservation
- model ordinance for conservation practices
- additional plans: large agency IRPs

Integrated Regional Water Management
- include Upper Santa Margarita IRWM
- info sources: www.sdirwmp.org; www.lawaterplan.org
- page 5-11 Santa Ana Watershed Project Authority, (not Protection Agency)
- connections between efforts
- governance structures for IRWMs
- add La Jolla Integrated Coastal Water Management Plan
- discuss relationship between SDIRWMP, La Jolla, and Upper Margarita

Accomplishments
- desal plant at Carlsbad permitted; desal of brackish groundwater sources (Oceanside and Sweetwater)
- San Diego agreements on water banking; IID/SDCWA water transfers agreement
- Coachella canal lining (All American Canal)
- groundwater storage/conjunctive use programs
- water reuse (City of San Diego Reuse Study); res. aug./IPR demo project
- Orange County Groundwater Replenishment System (www.gwrsystem.com)
- water conservation, drought tolerant planting
- 7 Basin States Agreement

Challenges
- management of salinity; brine disposal (annual multi-state salinity conferences, see http://multi-statesalinitycoalition.com)
- coordinating drought plans in region
- rising water costs, financing, infrastructure requirements; rate-setting
- regulatory processes (desal, recycled water)
- Tijuana River drainage (note: is this a water quality issue?)
- public acceptance of reuse
- protecting groundwater quality; regulating development of private wells
- sustainable agriculture
- limited recharge potential in some areas (spreading)
- salinity management issues; imported water has high salinity
- coordinating ordinances at regional and municipal levels
- population growth, need for education on water issues and use
- coordination of information and efforts; how to integrate watershed management plans

Drought and Flood Planning
- information source: SANDAG
- IFM: include stormwater capture
- MWD drought plan; Colorado River drought allocation plan (7 Basin States Agreement)
- flood monitoring and real-time warnings (real-time precipitation monitoring – Sac model)
- Tijuana River flood control; lack of information on flows in Mexico
- recharge along flood control channels (artificial recharge, lined channels, water quality issues, habitat preservation)
- emergency planning
- regional and local drought planning

Looking to the Future
- much text copied from 2005, needs to be substantially updated
- include recharge, alternative water sources

Future Scenarios
- renegotiation of long-term contracts in the future (e.g. area of origin claims)
- look out to 50 years, in addition to 20 year timeframe

Climate Change
- energy needs: link to climate change and conservation
- WEAP statewide model?
- some Tribal groups (RTOC – supported by USEPA) doing climate studies
- refine models to look at smaller regional effects
- alternative energy technologies
- equivalent carbon footprint

Response Strategies
- change to “management” strategies
- identify all available storage options
- alternate water sources: recycled water and reuse, stormwater, rainwater harvesting
- State should promote recycled water projects that create new regional supply (e.g. 1 AF recycled in Riverside, prevents that 1 AF from being available in Orange County – Riverside buys 1 AF less, Orange County buys 1 AF more; result is net = zero for region); example of new supply is recycled water project in Irvine, where result is 1AF recycled is 1 AF less discharged to ocean
- given unknown effects of climate change, all strategies and plans must be flexible
- need county-wide, uniform drought plan at local water district level
- what should desal look like? carbon foot-print

Implementation Next Steps
- public outreach and education to all parts of the State
- State standardized desal regulations
- where is State headed on potable reuse (e.g. Orange County 50/50 blend)
- State guidelines for conservation and recycled water, including indirect potable reuse
- integration with General Plans and local planners
- getting public education on plans
- coordination and communication among agencies and entities
- energy optimization at facilities

Water Portfolios from 1998 - 2005

Selected References