



Chapter 1 Introduction

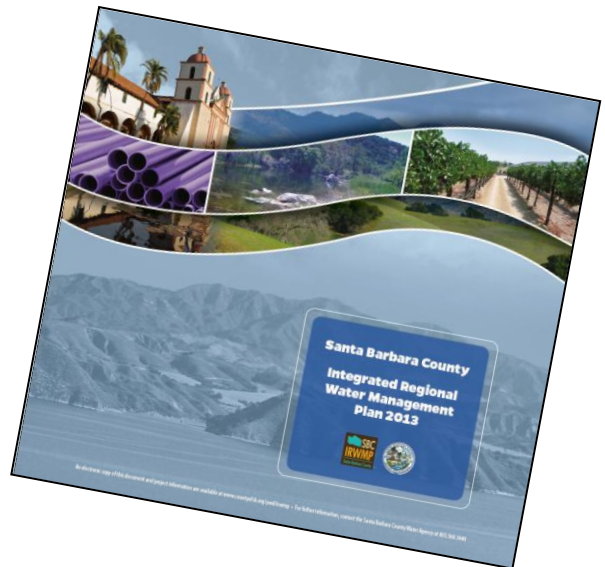
1.1 Introduction

The Santa Barbara County Integrated Regional Water Management Plan 2013 (IRWM Plan 2013) is the main integrated regional water management (IRWM) planning document for the Santa Barbara County IRWM Region (Region). IRWM Plan 2013 emphasizes multi-agency collaboration, stakeholder involvement and collaboration, regional approaches to water management, water management involvement in land use decisions, and project monitoring to evaluate results of current practices. IRWM Plan 2013 complies with the IRWM Plan Standards (Guidelines, IRWM, California Department Water Resources (November 2012)). The IRWM Plan 2013 updates the Santa Barbara Countywide Integrated Regional Water Management Plan, May 2007 (Appendix 1-A). The IRWM Plan 2013 was funded through a Proposition 84 IRWM planning grant from the Department of Water Resources (DWR) and contributions, both cash and in-kind, from the multiple agencies, cities, and non-profit organizations that make up the Santa Barbara County IRWM regional water management group, known as the Cooperating Partners.

IRWM Plan 2013 identifies regionally and locally focused projects that help achieve regional objectives and targets while working to address water-related challenges within the region. Regional objectives include the following: conserving, protecting, and augmenting water supplies; protecting, managing, and increasing groundwater supplies; practicing balanced natural resource stewardship; protecting and improving water quality; maintaining and enhancing water and water infrastructure; ensuring the equitable distribution of benefits; improving flood management; improving emergency preparedness, and addressing climate change issues.

The IRWM Plan 2013 includes two focused studies, also funded by the DWR Proposition 84 planning grant. Those Santa Barbara County studies include the South Coast Recycled Water Development Plan (see Appendix 1-B) and the Santa Maria Valley Groundwater Assessment (see Appendix 1-C). Both planning documents can be accessed at the following site: <http://www.countyofsb.org/irwmp/irwmp.aspx?id=42008> or in the appendix section of this Plan.

The South Coast Recycled Water Development Plan identifies opportunities to potentially restructure or integrate previously envisioned local projects and expand potential end uses to maximize regional objectives. It identifies the opportunities and constraints of advancing recycled water generation and use in the south coast subregion and outlines steps to implementing potentially cost-effective, feasible projects as elements of the Region's water management portfolio.





The Santa Maria Valley Groundwater Assessment was conducted by the stakeholders in the Santa Maria Valley. Those stakeholders are interested in assuring sustainability of water supplies and addressing water quality regulations, specifically the future development of salt and nutrient plans. The Santa Maria Valley Groundwater Assessment evaluated sources, transport and fate of “salts” and “nutrients” (Nitrate and other forms of nitrogen) in surface water and groundwater within the Santa Maria Valley. The goals of the assessment were as follows: 1) identify regulatory requirements; 2) gather data; 3) summarize key issues, and 4) provide recommendations to support the future development of salt and nutrient plans.

The Region identified issues and challenges of the four major watersheds (Santa Maria, San Antonio, Santa Ynez, and South Coast watershed). The four watersheds are displayed on page 4 of this chapter. The watershed issues and challenges were then used to develop regional objectives and targets as mentioned above. The issues and challenges are listed below:

1.1.1 Santa Maria River Watershed Issues and Challenges

- Sedimentation accumulation in Twitchell Reservoir which leaves less supply for groundwater recharge, habitat preservation, and fish migration;
- Wildfire risk that could increase sediment accumulation in dams, rivers and streams and therefore increases the risk of flooding;
- The need for continued groundwater monitoring and management to ensure compliance with water quality standards and adequate supply;
- Fluctuations in State Water Project (SWP) deliveries due to annual variations in climate, hydrology, and regulatory constraints, and
- Cuyama Groundwater Basin is in a state of significant overdraft and some water quality impairments are of concern.

1.1.2 San Antonio Creek Watershed Issues and Challenges

- Groundwater basin overdraft and with a resulting increase in pumping lift costs;
- Lack of affordable supply in Casmalia;
- Insufficient integration of adjacent systems constrains operational flexibility, and
- Changes in clean water standards may require modification of stormwater and water quality management.

1.1.3 Santa Ynez River Watershed Issues and Challenges

- Poor water quality in shallow groundwater;
- Nitrate groundwater contamination from septic systems in Los Olivos;
- Compliance with existing and emerging wastewater discharge standards;
- Lack of diversity of supply in the City of Solvang;

- Wildfires risk damage to habitat and cause erosion adversely affecting reservoir storage and water quality at Cachuma and Gibraltar reservoirs;
- Flooding imperils the lower portion of the watershed and can cause large releases from the Cachuma Reservoir which can flood farm land and cities along the lower Santa Ynez River;
- The need for regional collaboration for conjunctive groundwater management;
- A pending State Water Resources Control Board decision on Cachuma Project water rights permits that support the Cachuma Project Settlement Agreement that will facilitate integration of water supply, downstream water rights, and public trust resources, and
- Development of TMDLs that may require changes in water use and water management.

1.1.4 South Coast Watershed Issues and Challenges

- Need to expand existing water supplies and develop new local supplies to address future water supply constraints;
- Lack of redundancy and capacity in storage and distribution systems leaves the subregion vulnerable to water supply shortages during times of prolonged drought and in emergency situations;
- Shallow groundwater contamination issues at orphaned sites, groundwater and surface water contamination from septic systems, and contaminated soils that cause polluted runoff;
- Wildfires that can cause habitat damage and extreme erosion which adversely affects reservoir storage and water quality;
- Anthropogenic (manmade) barriers such as lined flood control channels and bridges impede steelhead trout migration;
- Need to control stormwater to protect ocean water quality and public health, and increase capture to augment supply, and
- Low-lying coastal wastewater treatment plants - City of Santa Barbara's El Estero Treatment Plant and Goleta Sanitary District's treatment plan - are vulnerable to flooding due to sea level rise.

1.2 Integrated Regional Water Management

Water resource managers in the Region have a long history of working cooperatively to resolve multiple issues related to water and wastewater, including ensuring the adequacy of supplies and services, protecting and improving surface and groundwater quality, and protecting and enhancing ecosystems. Together they have planned and implemented significant water resources projects; developed integrated supplies and delivery systems; managed resources to meet the needs of urban users, agriculture, and ecosystems; and developed adaptive management strategies to respond to changing circumstances.

Nonetheless, challenges remain, and the IRWM Plan 2013 is intended to increase the level of coordination among all the agencies and districts responsible for water resources planning, nongovernmental organizations, and interested members of the public to facilitate the optimal management of water resources within the County over the next 20 years. The IRWM Plan 2013 also provides the foundation for grant applications needed to augment limited local financial resources.

The planning framework established by the IRWM Plan 2013 can be modified as needed to respond to changing conditions, including regulatory requirements, and will increase flexibility and efficiency by integrating multiple aspects of water resources management, such as water quality, local and imported water supplies, watershed

protection, wastewater treatment and recycling, and protection of local ecosystems. The watersheds of the Santa Barbara County IRWM Region are displayed below.

