

2 Regulatory Framework

The LSCR SNMP was developed to meet the requirements of the State Water Board's Recycled Water Policy. As such, the SNMP includes the following required elements outlined in Section 6.b.3 of the Recycled Water Policy:

- (a) A basin/sub-basin wide monitoring plan that includes an appropriate network of monitoring locations. (**Section 10** of this SNMP).
- (b) A provision for annual monitoring of Constituents of Emerging Concern (CECs) (e.g., endocrine disrupters, personal care products or pharmaceuticals). (**Section 10** of this SNMP).
- (c) Water recycling and stormwater recharge/use goals and objectives. (**Section 1** of this SNMP).
- (d) Salt and nutrient source identification (**Section 6** of this SNMP), basin/sub-basin assimilative capacity (**Section 5** of this SNMP) and loading estimates (**Section 6** of this SNMP), together with fate and transport of salts and nutrients (**Section 7** of this SNMP).
- (e) Implementation measures to manage salt and nutrient loading in the basin on a sustainable basis (**Section 9** of this SNMP).
- (f) An antidegradation analysis demonstrating that the projects included within the plan will, collectively, satisfy the requirements of Resolution No. 68-16 (**Section 11** of this SNMP).

In addition, the RWQCB's document *Assistance in Guiding Salt and Nutrient Management Plan Development in the Los Angeles Region* was used to support the development of the SNMP.

2.1 GROUNDWATER QUALITY OBJECTIVES

The *Basin Plan for the Coastal Watersheds of Los Angeles and Ventura Counties* (1994) (Basin Plan) includes water quality objectives for many constituents in the groundwater basins of the LSCR. For the SNMP, Total Dissolved Solids (TDS), chloride, and nitrate-N were determined to be the appropriate constituents to represent salts and nutrients for planning purposes. No other constituents of concern were identified. This section provides a discussion of the TDS, chloride, and nitrate-N objectives that apply to the sub-basins.

For many of the sub-basins within the SNMP area, the Basin Plan describes different TDS and chloride water quality objectives for specific areas within a sub-basin. Throughout the SNMP, these divisions of the sub-basins are referred to as subareas. **Table 2-1** summarizes the groundwater quality objectives for all sub-basins and subareas and **Figure 2-1** shows the water quality objectives on a map of the LSCR SNMP planning area.

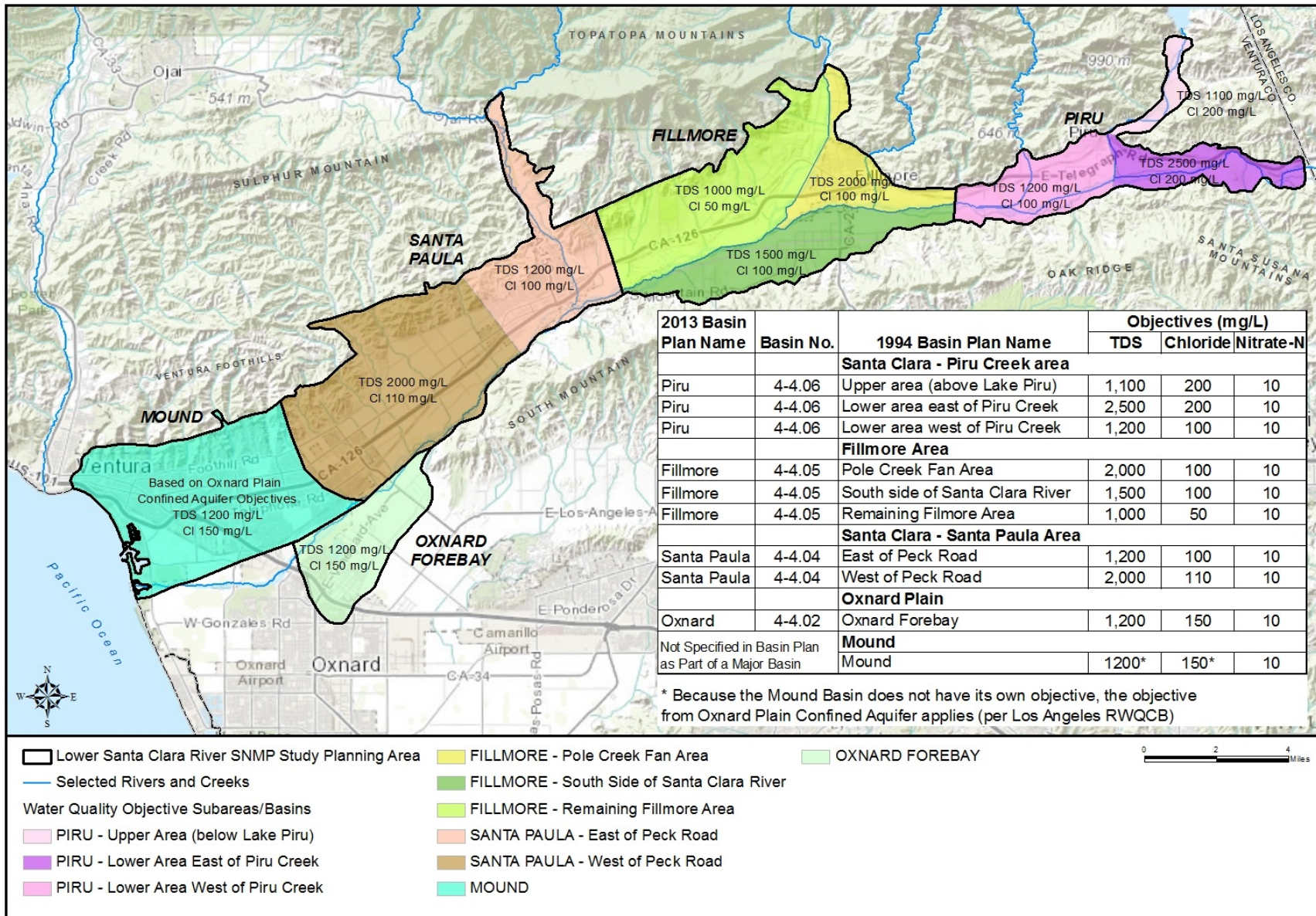


Figure 2-1 Groundwater Quality Objectives for LSCR Basins and Subareas

Table 2-1 Water Quality Objectives for the Lower Santa Clara River Groundwater Basins

2013 Basin Plan Name	Basin No.	1994 Basin Plan Name	Objectives (mg/L)		
			TDS	Chloride	Nitrate-N
Piru	4-4.06	Santa Clara – Piru Creek Area			
	4-4.06	Upper area (above Lake Piru)	1,100	200	10
	4-4.06	Lower area east of Piru Creek	2,500	200	10
	4-4.06	Lower area west of Piru Creek	1,200	100	10
Fillmore	4-4.05	Fillmore Area			
	4-4.05	Pole Creek Fan Area	2,000	100	10
	4-4.05	South side of Santa Clara River	1,500	100	10
	4-4.05	Remaining Fillmore Area	1,000	50	10
Santa Paula	4-4.04	Santa Clara – Santa Paula Area			
	4-4.04	East of Peck Road	1,200	100	10
	4-4.04	West of Peck Road	2,000	110	10
Oxnard	4-4.02	Oxnard Plain			
	4-4.02	Oxnard Forebay	1,200	150	10
	4-4.02	Confined aquifers ¹	1,200	150	10
	4-4.02	Unconfined and perched aquifers	3,000	500	10
Mound ¹		Use Oxnard confined aquifers ¹	1,200	150	10

¹ As part of the non-regulatory amendments to administratively update Chapter 3 of the Basin Plan in 2013, the Mound basin was called out separately from the Oxnard Plain for the first time. Prior the update, the Mound basin was included as part of the Oxnard Plain basin. Based on review of previous Basin Plans and associated technical documents, the RWQCB determined that the objectives for the confined aquifers in the Oxnard basin apply to the Mound basin.

During development of the SNMP, questions were raised about the applicability of the selected objectives for the Mound basin. While the Basin Plan’s administrative record is clear that the Mound basin has historically been considered part of the Oxnard Plain basin, the data and information that was used to develop the objectives does not appear to have included much if any information from the Mound basin. Since more recent information indicates that the Mound basin has distinct characteristics from the Oxnard Plain, and the Basin Plan now recognizes it as a separate sub-basin, consideration of alternative water quality objectives is appropriate. It would be consistent with the SNMP to consider site-specific objectives to support recycled water use in the Mound basin if the appropriate information were to be developed in the future to justify site-specific objectives.

Additionally, the Mound basin is located near the ocean and poor groundwater quality has existed historically in the sub-basin, likely due to marine sediments. A variance provision is included in the Basin Plan for consideration during permitting in coastal groundwater basins. Consideration of the variance provision during evaluation of the recycled water projects would be consistent with the SNMP. The Coastal Aquifer Variance Provision for Mineral Quality Objectives states:

In coastal aquifers where elevated concentrations of minerals are caused by natural sources due to an aquifer's proximity to the ocean, the Regional Board may grant a variance from implementing the mineral quality objectives specified in Table 3-13 when issuing waste discharge requirements (WDRs) or enforcement orders. Any variance granted pursuant to this variance provision shall be for no more than five years, and may be extended not more than once for an additional period of up to five years. Any further relief should be in the form of a Basin Plan amendment. A decision to issue or to extend a variance will be based upon the Regional Board's evaluation of the evidence submitted concerning the granting of the variance.

A discharger must submit to the Executive Officer a written request for a variance from compliance with the mineral quality objectives for groundwater. The request must include recent data and analysis that provide clear and convincing evidence that elevated mineral concentrations are natural in origin and result from the aquifer's proximity to the ocean. The discharger's request must include clear and convincing evidence and analysis that:

- 1. The aquifer's proximity to the ocean leads to one or more of the following:
 - a) seawater intrusion;*
 - b) the presence of marine sediments high in mineral content;*
 - c) tidal fluctuations that regularly influence the chemistry of the aquifer.**
- 2. The source of the elevated mineral concentrations is natural and not induced by current or past discharge of pollutants.*
- 3. A discharge of minerals in excess of the mineral quality objectives in the coastal aquifer will not degrade adjacent, inland aquifers.*
- 4. The discharger has not caused or significantly contributed to the elevated Mineral concentrations from which it seeks relief.*

Information provided in the SNMP includes a discussion of the sources of salts and nutrients to the sub-basins and information about fate and transport of salts and nutrients that could be utilized to support adoption of a variance if necessary to support recycled water uses in the Mound basin.