

DRAFT

STRAWMAN Summary of the Salt Removal Strategies in Each of the Representative Study Areas and the Long-Term Sustainability of the Salt Disposal Method

Study Area	Source Control	Treatment		Salt Disposal Method	Salt Disposal Sustainability ⁴				Relative Cost
		For Salt Concentration or Removal	For Other Constituents		50 Years	100 Years	150 Years	200 Years	
Red Rock Ranch	<ul style="list-style-type: none"> • IFDM –Sequential Crop Production Areas • Efficient Irrigation Methods 	<ul style="list-style-type: none"> • Salt Tolerant Crop Uptake • Solar Evaporator 	N/A	Salt Accumulation at the Site	L	L	L	L	\$
City of Dixon	<ul style="list-style-type: none"> • Public Outreach • Water Softener Ban/Incentive Program • Reduction of Inflow/Infiltration to Sewers • Higher Quality Source Waters 	High Rate treatment to minimize evaporation losses at WWTF	Wastewater Treatment Facility: Activated Sludge ¹	Wastewater Treatment Facility Percolation Ponds	H	M	M	M	\$\$
Westside Drainage Plan	<ul style="list-style-type: none"> • Grasslands By-Pass Project² • Land Retirement • Regional Reuse Facilities¹ 	<ul style="list-style-type: none"> • Drainage Water Treatment • RO Demonstration Project³ 	N/A	<ul style="list-style-type: none"> • Grassland’s Open System Discharges to the SJR • Westland’s Closed System Discharges to the Shallow Groundwater 					
San Luis Unit Ocean Disposal	<ul style="list-style-type: none"> • Land Retirement and re-allocated irrigation water¹ • On-Farm Drainage Reduction including: drainage re-use, irrigation practice improvements¹ 	N/A	Selenium Bio-treatment	Regional drainage collection system brine line to ocean outfall at Point Estero ¹					
Hilmar Cheese	N/A	UF/RO/Evaporator	Onsite Wastewater Treatment Facility (DAF/Anaerobic Digester/ Sequencing Batch Reactors)	Deep Well Injection	M	L	L	L	\$\$
				Truck to EBMUD	M	L	L	L	\$\$\$
Grasslands Water District	Real-time water quality monitoring network	N/A	N/A	Real Time Management Program ¹					
City of Tracy	<ul style="list-style-type: none"> • Source Water of Higher Quality • Industrial Source Controls¹ 	Desalinization Plant ¹	Tracy Wastewater Treatment Plant	Tracy Wastewater Treatment Plant - Discharge to Old River					
Stevinson Water District	<ul style="list-style-type: none"> • Lateral Canal Pipelining Project • Agricultural Drainage Control Project 	N/A	Constructed Wetlands	N/A					
Tulare Lake Bed	N/A	Evaporation Ponds	N/A	Evaporation Ponds/ Sequestered On-Site ¹					
Industrial Food Processing	<ul style="list-style-type: none"> • Water Treatment of Source Supply • Boiler Feed Water Treatment • Product Loss Reduction • Cleaning and Process Chemical Treatment & Reduction 	Evaporation Ponds	Effluent Treatment	Evaporation Ponds/Sequestered On-Site					
				Disposal to local POTWs					
				Land Application					

¹ Potential future projects.

² Project began in 1996 permitted through 2019.

³ RO demonstration project operated between 2003 and 2006.

⁴ The determination of the sustainability of a particular salt disposal method considers factors such as the longevity (service life) of the project, the salt capacity of the disposal method, regulatory requirements, costs, potential impacts to the environment, and other considerations (e.g., population growth, cropping practices, and water demands).

Legend

L – Low Sustainability
M – Medium Sustainability
H – High Sustainability

\$ - Low Relative Cost
\$ - Medium Relative Cost
\$ - High Relative Cost