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Groundwater Sustainability Plan for the Delta-Mendota Subbasin



**DELTA -
MENDOTA
SGMA**

eki environment
& water

Groundwater Sustainability Plan for the Delta-Mendota Subbasin

July 2024

Prepared for:

The Delta-Mendota Subbasin

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List of Abbreviations

AB	Assembly Bill
AEM	Airborne Electromagnetic
AF	acre-feet
AFY	acre-feet per year
AWD	Aliso Water District
AWMP	Agricultural Water Management Plans
BCM	Basin Characterization Model
BLM	United States Bureau of Land Management
BMP	Best Management Practices
CAO	Cleanup and Abatement Order
CASGEM	California Statewide Groundwater Elevation Monitoring
CASP	California Aqueduct Subsidence Program
CC	Coordination Committee
CCID	Central California Irrigation District
CCR	California Code of Regulations
CDEC	California Data Exchange Center
CDFW	controlled by California Department of Fish and Wildlife
CDM	Central Delta Mendota
CDMG	California Department of Mines & Geology
CDPR	California Department of Parks and Recreation
CE	Categorical Exemption
CEQA	California Environmental Quality Act
CFDW	California Department of Fish and Wildlife
cfs	cubic feet per second
CGPS	Continuous Global Positioning System
CGQMP	Comprehensive Groundwater Quality Management Plan
CIMIS	California Irrigation Management Information System
CNRA	California Natural Resources Agency
COC	constituents of concern
CPS	Crop Production Services
CSD	Community Services District
CVFPB	Central Valley Flood Protection Board
CVHM2	Central Valley Hydrologic Model 2
CVP	Central Valley Project
CVRWQCB	Central Valley Regional Water Quality Control Board
CWC	California Water Code
CWSRF	Clean Water State Revolving Fund
DAC	Disadvantaged Community
DCP	Drought Contingency Plan
DDW	Division of Drinking Water
DMC	Delta-Mendota Canal
DMS	Data Management System
DPWD	Del Puerto Water District

DTSC	California Department of Toxic Substances
DTW	Depth to water
DWR	California Department of Water Resources
DWSAP	Drinking Water Source Assessment and Protection
EDAs	economically distressed areas
EDF	Environmental Defense Fund
EIR	Environmental Impact Report
EIS	Environmental Impact Statement
EO	Executive Order
EPA	Environmental Protection Agency
ESA	European Space Agency
ET	evapotranspiration
FCMA	Fresno County Management Areas
FMP	Farm Process Package
FSS	Facilitation Support Services
ft	feet
ft bgs	feet below ground surface
ft msl	feet above mean sea level
ft/d	feet per day
ft/yr	feet per year
GAMA	Groundwater Ambient Monitoring and Assessment
GAR	Groundwater Quality Assessment Report
GDE	Groundwater Dependent Ecosystem
GEA	Grassland Ecological Area
GIS	Geographic Information System
GMP	Groundwater Management Plan
GNSS	Global Navigation Satellite System
GPS	Global Positioning System
GRCD	Grassland Resource Conservation District
GSA	Groundwater Sustainability Agency
GSP	Groundwater Sustainability Plan
GWC	Groundwater Conditions
GWD	Grassland Water District
GWE	groundwater elevation
HBSL	Health Based Screening Level
HCM	Hydrogeological Conceptual Model
ILRP	Irrigated Lands Regulatory Program
IM	Interim Milestone
InSAR	Interferometric Synthetic Aperture Radar
IRWMP	Integrated Regional Water Management Plan
IS	Initial Study
ISW	Interconnected Surface Water
ITRC	Irrigation Training and Research Center
IWFM	Integrated Water Flow Model

JPA	Joint Powers Authority
JPL	Jet Propulsion Laboratory
LBCDD	Los Banos Creek Detention Dam
LIDAR	Light detection and ranging
LSCE	Luhdorff & Scalmanini Consulting Engineers
LUST	Leaking Underground Storage Tanks
M&I	municipal and industrial
MAA	Management Area A
MAB	Management Area B
MAF	million acre feet
MAR	Managed Aquifer Recharge
MCL	Maximum Contaminant Level
meq/L	milliequivalents per liter
mg/L	milligrams per liter
MHI	median household income
MND	Mitigated Negative Declaration
MNW2	Multi-Node Well Package
MO	Measurable Objective
MOA	Memorandum of Agreement
MOU	Memorandum of Understanding
MPG	Mendota Pool Group
MT	Minimum Threshold
MWA	Mendota Wildlife Area
NAD83	North American Datum of 1983
NASA	National Aeronautics and Space Administration
NAVD88	North American Vertical Datum of 1988
NAWQA	National Water-Quality Assessment
NCCAG	Natural Communities Commonly Associated with Groundwater
ND	Negative Declaration
NDM	Northern Delta-Mendota
NDVI	Normalized Derived Vegetation Index
NEPA	National Environmental Policy Act
NGO	Non-Governmental Organization
NHD	National Hydrography Dataset
NOAA	National Oceanic and Atmospheric Administration
NPDES	National Pollution Discharge Elimination System
NRCS	Natural Resources Conservation Service
NVRRWP	North Valley Regional Recycled Water Program
NWIS	National Water Information System
NWQMC	National Water Quality Monitoring Council
NWR	National Wildlife Refuge
OSWCR	Online System of Well Completion Reports
P&O	Prioritization & Optimization
PID	Patterson Irrigation District

PIP	Pump-in Program
PLSS	Public Land Survey System
P/MAs	Projects and Management Actions
POC	Points of Contact
POD	Points of Diversion
PWRPA	Power and Water Resources Pooling Authority
PWS	Public Water System
RCAC	Rural Community Assistance Corporation
RMN	Representative Monitoring Network
RMS	Representative Monitoring Site
RMW	Representative Monitoring Well
RP	reference point
RPE	reference point elevation
RTWQMN	Real Time Water Quality Monitoring Network
SAGBI	Soil Agricultural Groundwater Banking Index
SB	Senate Bill
SDAC	severely disadvantaged community
SDWIS	Safe Drinking Water Information System
SFR	Streamflow Routing Package
SGMA	Sustainable Groundwater Management Act
SGWP	Sustainable Groundwater Management Planning
SHE	Self-Help Enterprises
SJR	San Joaquin River
SJREC	San Joaquin River Exchange Contractors
SJRECWA	San Joaquin River Exchange Contractors Water Authority
SJRIP	San Joaquin River Water Quality Improvement Project
SJRRP	San Joaquin River Restoration Program
SJVAPCD	San Joaquin Valley Air Pollution Control District
SLDMWA	San Luis & Delta Mendota Water Authority
SLWD	San Luis Water District
SMARA	Surface Mining and Reclamation Act
SMC	Sustainable Management Criteria
SNMP	Salt and Nitrate Management Plan
SSURGO	Soil Survey Geographic Database
SWP	State Water Project
SWPPP	SWRCB Stormwater Pollution Prevention Plan
SWRCB	State Water Resources Control Board
TAOC	Tidewater Associated Oil Company
TCP	trichloropropane
TDS	Total Dissolved Solids
TMDL	Total Maximum Daily Load
TNC	The Nature Conservancy
TRID	Tranquillity Irrigation District
UAVSAR	Unmanned Aerial Vehicle Synthetic Aperture Radar

ug/L	micrograms per liter
UNAVCO	University Navstar Consortium
UR	Undesirable Result
USACE	United States Army Corps of Engineers
USBR	United States Bureau of Reclamation
USCS	Unified Soil Classification System
USDA	United States Department of Agriculture
USEPA	United States Environmental Protective Agency
USFWS	United States Fish and Wildlife Service
USGS	United States Geological Survey
UST	underground storage tank
UWMP	Urban Water Management Plan
WDL	Water Data Library
WDR	waste discharge requirement
WIIN	Water Infrastructure Improvements for the Nation
WLI	Water Leadership Institute
WQP	Water Quality Portal
WRFP	Water Recycling Funding Program
WSID	West Stanislaus Irrigation District
WWD	Westlands Water District
WY	Water Year