

Water Quality Report Card

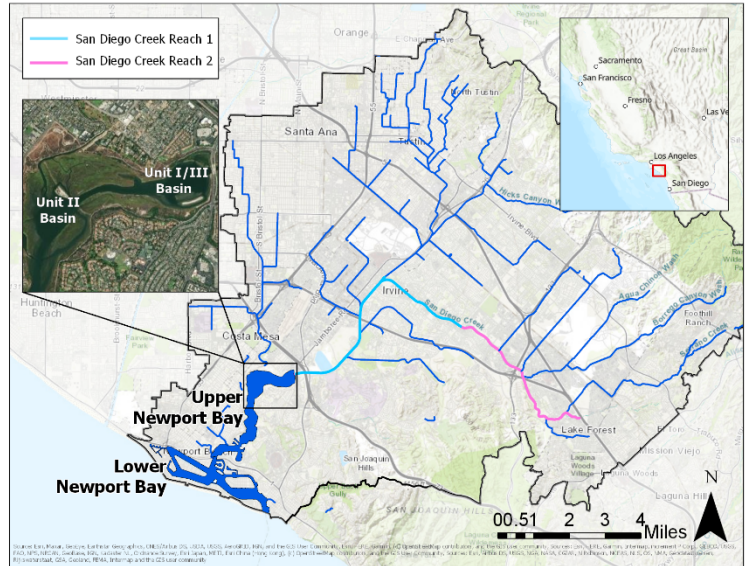
Sediment in Upper Newport Bay (Ecological Reserve)

Regional Water Board:	Santa Ana, Region 8	STATUS	Targets Achieved/Water Body Delisted
Beneficial Uses Affected:	WARM, WILD, NAV, MAR	Pollutant Type:	Nonpoint Source
Implemented Through:	WDRs, Cooperative Stakeholder Projects	Pollutant Source:	Non-point Source Runoff Erosion/Siltation
Effective Date:	April 4, 1998		
Attainment Date:	2020		

Water Quality Improvement Strategy

The 150-square-mile Newport Bay Watershed is in central Orange County. Upper Newport Bay, and Reaches 1 and 2 of San Diego Creek, were listed as sediment-impaired on the federal Clean Water Act 303(d) list in 1986 and 1998, respectively, due to excessive sediment loads from agriculture, construction, and hydromodification. To address the impairments, the Santa Ana Water Board adopted the Total Maximum Daily Load (TMDL) for sediment in the Newport Bay/San Diego Creek Watershed in 1998, establishing a 50% reduction in sediment loads as measured as a 10-year running average (target is 62,500 tons/year). Stakeholders are required to remove accumulated sediment and maintain minimum depths in Unit I and Unit II sediment basins in Upper Newport Bay. The TMDL also requires that sediment trapping basins in San Diego Creek and its tributaries have a minimum 50 percent capacity at the start of the rainy season. The TMDL has been implemented by the Newport Bay Watershed Executive Committee (composed of the Santa Ana Water Board, California Department of Fish and Wildlife, county, cities, and landowners). Large scale in-bay dredging activities were conducted for Newport Bay in 2010, followed by two sediment removal projects in 2019, which have increased both bay and channel basin storage capacities. The current 10-year annual average of sediment loading to Newport Bay is 30,892 tons/year.

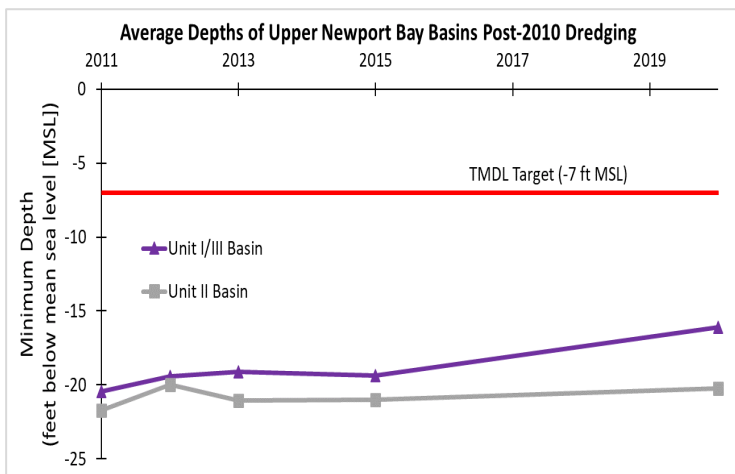
Newport Bay and San Diego Creek Watershed Map



Water Quality Outcomes

- Survey results since the 2010 dredging activities show increased capacity in the two Upper Newport Bay basins.
- Monitoring data show sediment loads from the watershed are meeting TMDL load allocation limits. This is due to a combination of sediment control measures and conversion of agricultural to urban land uses, which has helped stabilize the watershed.
- Research conducted through the [SedRISE Project](#) suggests that future management decisions for Newport Bay need to consider potential sea level rise and sediment deficiency concerns.

Water Quality



*Note: dredging data from 2004 show the Unit I/III and Unit II basins near or above the TMDL target, respectively.

