2013 Achievements Report



Condition of California Perennial Wadeable Streams Based on Algal Indicators

What is it?

Algae can serve as indicators of stream ecological condition in two ways: (1) Information about algal community composition can be used for assessing overall stream health using indices of biological integrity, and (2) information about algal biomass can be used as an indicator for stream health because excessive algae growth can impact stream health. The assessment, Condition of California Perennial Wadeable Streams Based on Algal Indicators, is funded by SWAMP and uses SWAMP data from 2007 to 2011. It uses information from algae species composition and algal biomass to evaluate the condition of California's wadeable perennial streams.

The development of the report was a collaborative effort between the Southern California Coastal Water Research Project, California State University San Marcos, University of Colorado, California Department of Fish and Wildlife, SWAMP, and San Diego Water Board, with funding from SWAMP.



Rainbow Creek, San Diego County. Picture by the Southern California Coastal Water Research Project

Why is it important?

Excessive algal growth in response to nutrient enrichment is a major problem in California water bodies. This assessment will help in the development of the nutrient policy for California using biological endpoints and setting nutrient criteria. Also, using algal community composition as a bioindicator will contribute to holistic assessments of stream ecosystem health.

How will this information be used?

The assessment will help decision makers to make informed management decision to better protect and restore California's water resources.

The report can be accessed on the **SWAMP** website.

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