

SCCWRP #885

## **Impact of Stormwater Discharges on Water Quality in Coastal Marine Protected Areas**

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### **ABSTRACT**

Marine protected areas worldwide limit harvest to protect sensitive fisheries, but rarely do they address water quality goals that may have equally demonstrable impacts. California has over 500 coastal shoreline miles of marine protected areas designated as Areas of Special Biological Significance (ASBS), but receives untreated wet weather runoff discharges from over 1600 storm drain outfalls. The goal of this study was to assess the extent and magnitude of water quality impacts in ASBS following storm events. A stratified probabilistic design was used for sampling receiving water shorelines near (discharge) and far (non-discharge) from storm drain outfalls. In general, reasonably good water quality exists in California's ASBS following storm events. Many of the target analytes measured did not exceed water quality standards. The post-storm concentrations of most constituents in discharge and nondischarge strata of ASBS were similar. The three potentially problematic parameters identified were total PAH, chromium, and copper. *Water Environ. Res.*, 87, 772 (2015)

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