

# State Water Board's Program to Develop Sediment Quality Objectives

San Diego Regional Water Board  
Workshop  
August 10, 2005

Chris Beegan  
cbeegan@waterboards.ca.gov  
916 341 5577

# Challenges

- Shifting away from a pollutant-specific concentration-based approach
- Integration with other programs that address sediment quality but have very different goals or objectives (dredged materials)
- Need to minimize BPJ

# Program Goals

- Develop scientifically defensible SQOs that are protective of specific beneficial uses.
- Provide consistent sediment quality assessment tools and ecologically relevant thresholds throughout the state.
- Include numeric targets or thresholds that would be applied to each indicator
- Develop approach to integrate the multiple responses into a station quality value or quality category.
- Develop approach for assessing multiple stations.

# Schedule

- By June 30 2003 adopt Workplan
- By August 5, 2005 circulate draft objectives and policy\*
- By February 28, 2007 submit SQO policy to Office of Administrative Law.

# Boundaries

- California Water Code – Bay Protection Chapter
  - Bays and Estuaries
- The program approach could be applied to all these waterbodies.
- However the MLOE indicators have only been developed for marine embayments
  - Enough existing data present to support development

# Numeric versus Narrative SQOs

- Numeric Objectives
- Narrative Objectives

# How Narrative SQOs Could Be Implemented

- **Example** of Narrative Objective for Direct Effects

*Sediment quality shall be maintained at a level that protects benthic communities from degradation or toxicity do to exposure to bio-available pollutants in bottom sediments... This narrative shall be implemented using the multiple lines of evidence described in...*

# Programs

- Dredging - Effects of disposal versus in-place effects
- Non dredge-related programs
  - Waterbody Assessments
  - Conventional NPDES permits
  - Stormwater NPDES Permits
  - Nonpoint Source Programs
  - TMDLS
  - Cleanup Efforts



# Sequential Approach

The general approach would consist of four steps

- Assessment - multiple sites
- Confirmation – What's the Stressor
  - Chemical Pollutant?
  - Which pollutant
- Source Identification and Loading
  - Source Identification
  - Load Evaluation,
  - Load Allocation
- Permits and Regulatory Tools
  - Options