

Regional Sediment Management for Sustainable, Resilient, Healthy Systems

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US Army Corps of Engineers
BUILDING STRONG





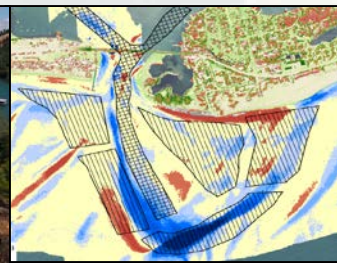
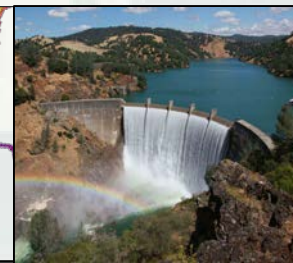
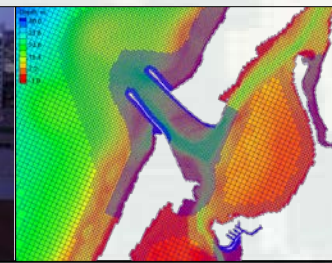
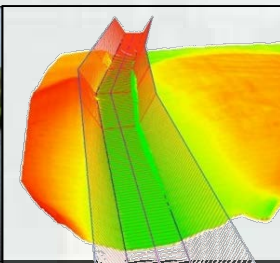
Regional Sediment Management...

Est 1999, CERB Charge



A systems approach to deliberately manage sediments in a manner that maximizes natural and economic efficiencies to contribute to sustainable water resource projects, environments, and communities = Healthy Systems

- O&M, FRM, Ecosystem, Emergency Mgmt:
 - Short and long-term sustainable, resilient solutions
 - Coastal and Inland
- Recognizes sediment as a valuable regional resource
- Work across multiple projects, authorities, business lines
- Tools and technologies for regional approaches
- Relationship building, decision making, implementation



RSM Strategies



Reduce Offshore/CDF
Placement



Nearshore/Beach
Placement



Bypass
Optimize Placement



Reservoir
Sediments



River Bank Erosion

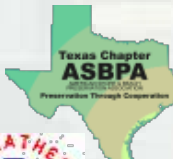


Ecosystem
Restoration

- **Keep sediment in the system**
- **Enhance natural sediment processes**
- **Reduce sedimentation**



RSM Participation (2000-2016)



- 28 Districts
- ◆ 20 Coastal
- ◆ 8 Inland
- ◆◆ 7 Coastal/Inland
- ERDC, IWR-



RSM Team

**USACE
Stakeholders and Partners**

**Share Successes
and
Lessons Learned**

**Identify Opportunities
and
Solutions**



**Take
Action**

**Decision
Making**

**Leveraging
Resources,
Data, Tools,
etc**

**Overcome
Obstacles**



Regional Sediment Budget

Understand Region
- Sediment Budget
- Beach Morphology, Landcover & Environmental Resources
- Coastal Processes

ID Gaps
Improve Knowledge
Data Management/Access
Regional Tools

Identify/Evaluate Opportunities to Optimize Use of Sediments

Develop RSM Strategies
Coordination/Funding/Permits/etc

Take Action: Construct Projects
Monitor Performance

Calculate Value & Benefits
Share Successes & Lessons Learned

Incorporate Standard Practice

The collage on the right side of the diagram illustrates the practical application of the RSM process. It features several key elements: a map of a coastal region with a sediment budget overlay; a photograph of a beach with a large sandbag marked with a dollar sign, symbolizing the economic value of sediment; an hourglass, representing the time and resource management involved; a handshake icon, signifying coordination and partnership; a yellow bulldozer, representing construction projects; and a stack of technical reports and documents, including one titled 'RSM Technical Notes, Reports, Management Conference Papers' and another from 'ERDC Coastal and Hydraulics Laboratory'.



*RSM Successes

Portland

Omaha

Philadelphia

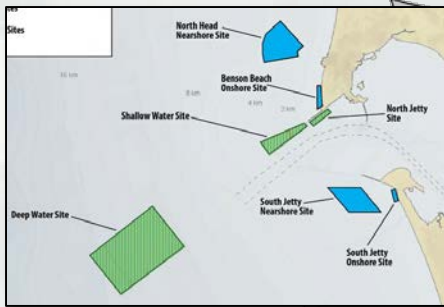
Post Sandy Recovery

Mouth of Columbia River

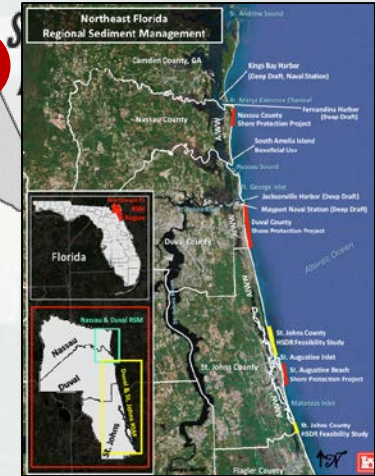
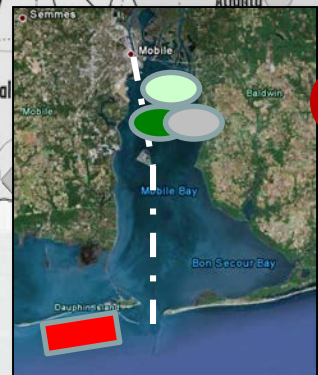
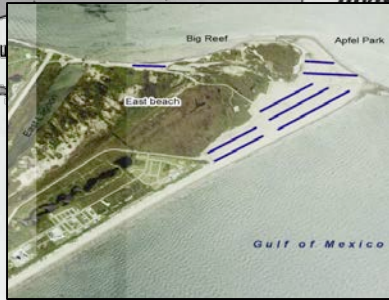
2011 Missouri River

Flood Recovery

Nearshore/BU Placement Sites



Jacksonville
Northeast Region



Galveston
Galveston Island
Sand Management Plan

Mobile
Mobile Bay
In-Bay Placement



Regional Sediment Management (RSM)

A systems approach to deliberately manage sediments in a manner that maximizes natural and economic efficiencies to contribute to sustainable water resource projects, environments, and communities.

- Recognizes sediment as a valuable resource for Healthy Systems
- Regional implementation strategies across multiple projects and business lines to guide investments to achieve long-term economic, environmental, and social value and benefits
- Enhances relationships with stakeholders and partners to better manage sediments across a region (local actions with regional benefits)
- Share lessons learned, data, tools, and technology

Interactive Map

Click icons on the map below for additional information about RSM activities at specific offices.
Note: Not all offices have additional info.

HISTORICAL RSM PARTICIPATION (2000-2015)

Map showing RSM participation across various divisions: Northwestern, South Pacific, Pacific Ocean, Southwestern, Mississippi Valley, and South Atlantic. Legend: 27 Districts (20 Coastal, 7 Inland), ERDC, IWR-HEC, RSM Video.

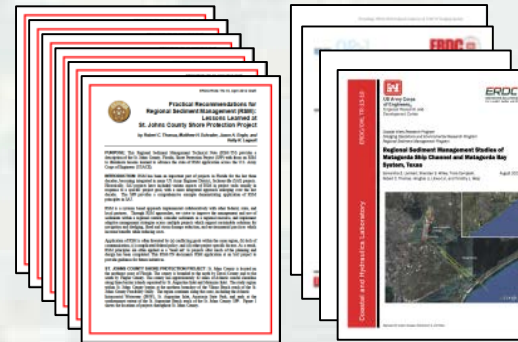
What's New?

- 2016 BSM IPR and Successes/Challenges Meeting, 12-19 May 2016
- FY17 Request for Proposals
- GenCode Version 1 Quick-Start Guide
- 'Sustainable Ports' - A Guide for Port Authorities
- USACE Navigation R&D Strategic Vision Document
- RSM Successes
- CHEITs
- District Project Templates: Fact Sheets, Quarterly Reports

In the News

- New Jersey Intra-coastal Waterway Dredging with Innovative Placement team is awarded in the NAP Corps of Engineers Day External Engineering Team Award
- Mobile District and Interagency Working Group BSM Teams honored by beach association
- Palm Beach receives free sand from Port of Palm Beach dredging
- ERDC - Potential RSM Projects: West Maui Region, Maui, Hawaii

RSM Calendar



*District
Stakeholder Workshops*

**RSM University:
Tools, Technologies, Implementation*

