Using Earth Observations to Inform the Valuation of Ecosystem Services that Support Coastal Resilience: Gulf Coast Workshops

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Objectives

• Identify the ecosystem service valuation methods that work best where stakeholder needs and available earth observations overlap
• Contribute to learning among coastal planners and resource managers about how earth observations could improve resiliency planning

Approach

• Evaluate the ecosystem service valuation options for relevant services: regulating (flood control/storm protection, water quality, carbon sequestration), provisioning (water supply, food supply), and cultural (recreation and research/education)
• Assess suitability of earth observations and derived products to provide the information needed for valuation; adapt valuation methods where needed
• Learn from stakeholders (surveys, interviews, workshops) how their coastal resiliency planning could be improved by integrating ecosystem service valuation at a large scale
Gulf Coast workshops – linking earth observations and stakeholders to advance ecosystem service valuation

**Key data sources**... linking vegetation measures and ocean color to ecosystem type and properties

- MODIS: NDVI, NPP, LAI
- MODIS/AQUA Chlorophyll a, among others

**Process**...
Gulf Coast workshops – linking earth observations and stakeholders to advance ecosystem service valuation

**Key outcome**... pathway from coastal planners and resource managers to earth observations and ecosystem valuation for improved coastal resiliency