

The Coastal Zone Community of Practice of the Group on Earth Observations: Servicing the Coastal Zone with Earth Observations

Hans-Peter Plag¹, Paul DiGiacomo², Jimmy Adegoke³

- 1) Old Dominion University, Climate Change and Sea Level Rise Initiative, Norfolk, VA, USA
- 2) National Oceanic and Atmospheric Administration, NESDIS STAR/SOCD, College Park, MD, USA.
- 3) University of Missouri Kansas City, Department of Geosciences, Kansas City, MO, USA

Coastal zones are complex areas of significant ecological, social, and economic value where many conflicting interests need to be resolved in order to ensure sustainable development. Growing coastal population, urbanization, and climate-induced changes are increasing stress in coastal zones, posing serious risks to human health and safety, and reducing the capacity of coastal ecosystems to support critical goods and services. The Coastal Zone Community of Practice (CZCP) supports the intergovernmental Group on Earth Observations (GEO) in its goal to provide timely observations informing decisions concerning the coastal zone. High priorities for the Global Earth Observation System of Systems (GEOSS) are services that enable access to environmental intelligence for decision makers.

In the past, one of the main activities of the CZCP was organizing a series of Regional Workshops titled "GEOSS Support for Decision-Making in the Coastal Zone: Managing and Mitigating the Impacts of Human Activities and Natural Hazards in the Coastal Zone." These regional workshops emphasized the importance of understanding and linking to decision makers, underlined the need of capacity retention in addition to capacity building, and identified user needs for access to comprehensive environmental coastal zone information. Three workshops were organized focusing on the Mediterranean, Africa and the Caribbean.

The focus of the CZCP has now shifted to services that provide information on the coastal zone. In the frame of the GEO Task SB-01 "Oceans and Society: Blue Planet," the CZCP is facilitating monitoring services for coastal ecosystems including mangroves, coral reefs, and estuaries. The CZCP also engages in the development of globally available cyberinfrastructure for a Global Coastal Zone Information System (GCZIS), which initially will be populated for a small number of study cases. The development of demonstrators for a coastal water quality service and a decadal sea level forecasting services are also supported by the CZCP. In a regional pilot project, the value added of an end-to-end system of systems for the coastal zone will be demonstrated. User needs related to integrated coastal zone management are captured in the GEOSS User Requirement Registry (URR) and the CZCP contributes to the updating of this information.

To contact or join the CZCP, please visit <http://www.czcp.org>.