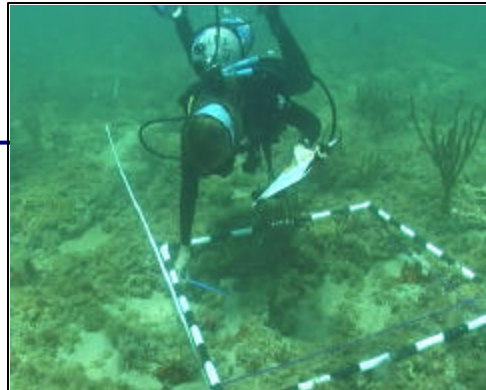


BROWARD COUNTY SHORELINE PROTECTION PROJECT

Client Name: Coastal Planning & Engineering
Type of Service: *Marine Resources Monitoring*



Florida's critically eroded beaches pose a threat to this state's social, economic and environmental health. The Broward County Shore Protection Project – Segment III, is a component of Florida's Beach Restoration Management Plan. The Plan seeks to restore the beach with a protective, publicly accessible and recreational beach berm, which is environmentally conducive to sea turtle nesting and other ecologically sensitive activities.

This segment of the Broward County Shore Protection Project extends from Port Everglades to the Miami-Dade County Line. The beach construction activity was conducted from May 2005 through February 2006. The project estimated fill volume was 1.54 million yd³ of sand. It was anticipated that the construction activity would cover approximately 7.6 acres of nearshore hardbottom. Therefore, Florida Department of Environmental Protection (FDEP) required the contractor to install of 8.9 acres of mitigative artificial reef.

Milian Swain & Associates, Inc. (MSA) supported the coral reef and benthic resources monitoring for this project using Benthic Ecological Assessment for Marginal Reefs (BEAMR) and video point count methods. Routinely collected quantitative benthic data characterized the biological assemblage of the nearshore reef systems in the project area and on the mitigation reefs. This data provided the existing conditions of the reef, the baseline, and the mitigation area baselines. Data collection continued throughout construction to measure the impact of construction activities on the macroepibenthic flora and fauna, and the success of the mitigation activities.