



Resolution No. 4B, 2016

SUBJECT: SEGMENTED BREAKWATERS FOR COASTAL RESTORATION PROJECTS

WHEREAS, Louisiana is battling the threats of coastal erosion and land loss to our communities, our economy and loss of wildlife habit with planning and project selection guidance through the State's comprehensive Coastal Master Plan; and

WHEREAS, in the big picture, the barrier island chains along Louisiana's coast are experiencing some of the highest rates of erosion of any coastal region in the world and a considerable portion of the State's Coastal Master Plan is devoted to projects designed to restore and maintain this dwindling line of first defense for our interior wetlands; and

WHEREAS, in particular the Isles Dernieres island chain in the lower Terrebonne Basin has long been recognized as an important feature for hurricane protection, wildlife habitat, oil and gas infrastructure, along with recreational and commercial fisheries recognized worldwide; and

WHEREAS, the Coastal Protection and Restoration Authority (CPRA) leads the State's program to permit, manage, implement and oversee the completion of statewide coastal erosion and protection projects as outlined in the Coastal Master Plan; and

WHEREAS, since its inception, the program has authorized some 210 coastal restoration or protection projects, benefiting approximately 100,000 acres in Louisiana. However, many successfully completed shoreline protection projects are now in need of maintenance and/or adjustment to assure their longevity in providing protection and stabilize conditions on the Gulf side of these islands; and

WHEREAS, periodic assessment of project design and its ability to sustain itself in this harsh environment is crucial in determining its life expectancy and its ability to recover lost subtidal /intertidal/supratidal materials flowing parallel to the shoreline and creating new land and better stability for any breakwater system; and

WHEREAS, historically, breakwater shoreline protection has used "hard" materials, such as rip rap rock, steel or wooden bulkheads, clam or oyster shells, concrete mats, that are placed in a single straight line along the existing shore line, which focused entirely on dissipating wave energy with no mechanism to capture or collect the longshore lateral movement of natural fill materials (sand), which has the potential to eventually undermine the structure and greatly reduce the life expectancy of the system; and

WHEREAS, many credible studies and completed projects have documented the success of "segmented or detached" breakwater systems installed offshore in broken lines, parallel to the beachhead which functions not only as a formidable wave break, but effectively collects natural fill materials proven to sustain the stability and longevity of the protection system at a lesser cost of construction and overall long term maintenance, making them a clear alternative to single line hardened structures.

(more)

SUBJECT: SEGMENTED BREAKWATERS

Resolution No. 4B, 2016 – Continued

THEREFORE BE IT RESOLVED the Louisiana Wildlife Federation respectfully requests that the Coastal Protection and Restoration Authority, the U.S. Army Corps of Engineers, other state and federal agencies, and the contractor engineering firms under their direction that are responsible for engineering and design of coastal restoration and protection projects in Louisiana, consider the benefits of segmented breakwater systems as a primary option in shoreline protection projects where applicable and when appropriate with an adequate sediment budget and sediment transport regime.

BE IT FURTHER RESOLVED that the option for use of segmented breakwaters in lieu of conventional hardened or unprotected soft (sand/dirt alone) shoreline protection be recognized as a “standard tool” to be used in coastal restoration and protection projects without the specific alteration requests currently required for design changes.

Adopted by the Louisiana Wildlife Federation in Convention Assembled, August 20, 2016 in Bossier City, Louisiana.