



CDBG-MIT

Harvey Competition Application

Public Comment Package

Project: Newcomb Point Shoreline Preservation

Disaster Conditions

On the northeastern portion of Copano Bay in Aransas County, the Holiday Beach residential area, a Low to Moderate Income (LMI) community largely within the floodplain, is losing the protection it receives from Newcomb Point from waves, erosion, storm surge and flooding. A shallow protective vegetated point, or peninsula from Copano Bay Bridge North to Newcomb's Point (approximately 6,000 ft) helps prevent erosion of nearly 1,000 acres of wetlands, marsh, and salt flats (Aransas National Wildlife Refuge is nearby) and a shallow cove (Newcomb's Bend) of the bay that helps protect this community from flooding and erosion.

With the deterioration of Newcomb's Point, the shoreline has eroded several hundred feet since it was first surveyed in 1854. Several original platted parcels and roadways running parallel to the shoreline that are now approximately 500 feet offshore. The erosion has accelerated in the last ten years, ranging from 3 to 9 feet per year, due to Hurricane Harvey and similar storm events. This erosion rate is exacerbated by probable combined influences of subsidence, sea level rise, droughts with water table effects, and wave erosion enhanced by commercial oyster dredging. The dredging has removed or lowered elevation of oyster reefs that were offshore in past years which helped mitigate shoreline erosion by dissipating the wave energy before it reaches the shoreline.

Without this natural oceanic buffer to the Holiday Beach area, it is anticipated Newcomb Point will eventually erode into the bay/ocean leaving the Holiday Beach area exposed to the immediate harsh conditions of not only daily direct oceanic erosion, but include more extreme storm surge, flooding erosion impacts from tropical storms and hurricanes.

Project Description

The goal of the proposed project is to stabilize the shoreline with the construction of partially emergent rock structures to protect homes in the Holiday Beach Subdivision area and upland habitat while creating new marine habitat for various species. To reduce erosion in Copano Bay to protect Newcomb's Point, this project proposes construction of offshore breakwaters in approximately 3 acre area. Breakwaters, as defined by the American Geosciences Institute, are "...barriers built offshore to protect part of the shoreline. They act as a barrier to waves, preventing erosion and allowing the beach to grow. The dissipation of wave energy allows material carried by longshore currents to be deposited behind the breakwater. This protects the shore."

The primary objective of the breakwaters is to protect the exposed shoreline by dampening and dissipating wave energy affecting the shoreline and creating a resilient solution against future storm surge events and rising sea levels. These improvement measures represent an independent solution to water surge and will not need other projects to support it.



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As the breakwaters reduce wetland and critical shoreline erosion, it will also create calm water areas that will promote wetland propagation, natural recruitment of aquatic vegetation, and create an enriched marine environment for mollusks and various species of fish. The offshore breakwater will use materials conducive for oyster bed creation, including rock, oyster shell, crushed concrete, and other living shoreline solutions. The additional habitat will also increase recreational fishing opportunities, bird watching, and ecotourism. The Aransas County economy depends largely on tourism and marine activities, ranking in the top 25% of counties in Texas in tourism impact. Visitors generate revenues that benefit the local community through money spent on goods and services, and also benefit state and federal programs through sales taxes on those goods and services, and on various permits and licenses.

Local Plan Inclusion

This project is a recommended project in the list of coastal strategies for Region 3 (Aransas, Kleberg, Nueces, Refugio, and San Patricio counties) in the "Texas Coastal Resiliency Master Plan" developed by the Texas General Land Office. It is also included in the Aransas County Coastal Resiliency Initiative.

Project Construction

It is anticipated that this project will involve the construction of 18 to 25 overlapping angled breakwaters measuring approximately 200 feet in length and 26 feet in width (at the base). The crest will measure approximately 4 feet in width and 4.5 feet in height with a 2:1 slope, for a total of 6,000 linear feet. The breakwaters will be constructed with concrete rip-rap, combined with a mix of limestone and crushed concrete, oyster shell and spat when feasible. The structures will be approximately 500 feet offshore, with openings between each section. A US Army Corps of Engineers permit application for this project will be needed.

National Objective & Mitigation Risk

National Objective - LMI – Area Benefit

This community lies within a single Census Block Group that is 59.34% LMI. According to the American Community Survey (ACS), total population of Holiday Beach is 648 with a median household income of \$26,221. ACS Table DP04, the Holiday Beach subdivision area has a total of 657 housing units that would be protected by this project, with 335 being owner occupied units and the remaining are vacant. The average age is almost 60 years old and over 6.5% speak Spanish. The population is Caucasian with over 40.5% disabled. The breakdown includes 28.6% cognitive difficulties, 34.8% ambulatory difficulties, 18.6% self-care difficulties, and 28.3% independent living difficulties.



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Mitigation Risk - This project addresses two of the Mitigation Risks under the Hurricane Harvey Competition: hurricanes/tropical/storms/tropical depressions; and severe coastal flooding.

Budget

The anticipated cost of the project is **\$7,782,174** with **1% match of \$63,257.28 to be provided from the Aransas County General Budget. CDBG-MIT funding in the amount of \$6,262,470.72** is being requested. A detailed Cost Estimate is attached.

Project Administration

This project will be managed by Aransas County personnel and the County's procured grant administrator. The County Attorney will review and approve all legal documents. The County Auditor will maintain a project financial account, process all vendor payments and prepare timely reimbursement requests for submittal to the Texas General Land Office (GLO). The County Commissioners Court will approve all legal documents. The County will conduct Federally-compliant procurement processes to administer all professional and construction services contracts associated with the design and construction of the project. The grant administrator and engineering firm have already been procured according to Federal requirements. The County Commissioners Court will approve all selection of project contractors.

Under the direction of the County's project manager, the County's grant administrator will oversee all aspects of the project on behalf of the County. The County's grant administrator will provide technical assistance to the project, assist with preparation of bid documents, qualifications review, and selection of contractors to manage construction and build the project. The grant administrator will work closely with the engineer to ensure that the project stays on time and budget. The grant administrator will monitor the design and construction of the project to ensure that all procurement, Davis Bacon labor, Section 3, environmental, Fair Housing, Equal Opportunity, and other Federal requirements are met, and that measures are taken to prevent waste, fraud and abuse.

The grant administrator will review all invoices for payment, change orders if needed, and work through GLO's system of record to request reimbursement. The grants manager will visit the project site periodically to verify invoices for work certified as complete by the construction manager. The grant manager will prepare for submittal to GLO all required performance and financial reports, excluding preparation audited financial statements. If needed, the grant administrator will assist with procurement of auditing services and will support Federally-compliant preparation of audited financial statements. The grant manager will close out the sub-award as required.



CDBG-MIT: Budget Justification of Retail Costs (Former Table 2)

Cost Verification Controls must be in place to assure that construction costs are reasonable and consistent with market costs at the time and place of construction.

Applicant/Subrecipient:		Aransas County				
Site/Activity Title:		Newcomb Point Shoreline Preservation				
Eligible Activity:		Natural or Green Infrastructure				
Materials/Facilities/Services	\$/Unit	Unit	Quantity	Construction	Acquisition	Total
Mobilization and Demobilization	\$ 195,000.00	LS	1	\$ 195,000.00	\$ -	\$ 195,000.00
Construction Surveying	\$ 38,000.00	LS	1	\$ 38,000.00	\$ -	\$ 38,000.00
Environmental Protection (BMP)	\$ 18,000.00	LS	1	\$ 18,000.00	\$ -	\$ 18,000.00
Shoreline Excavation and Grading	\$ 25,000.00	LS	1	\$ 25,000.00	\$ -	\$ 25,000.00
Geotextile Fabric	\$ 8.00	SY	26000	\$ 208,000.00	\$ -	\$ 208,000.00
Bedding Material	\$ 180.00	CY	7300	\$ 1,314,000.00	\$ -	\$ 1,314,000.00
Armoring	\$ 230.00	CY	17400	\$ 4,002,000.00	\$ -	\$ 4,002,000.00
Smooth Cordgrass Planting	\$ 11.00	SY	970	\$ 10,670.00	\$ -	\$ 10,670.00
Marshay/Sea Ox-Eye Planting	\$ 6.00	SY	1500	\$ 9,000.00	\$ -	\$ 9,000.00
Grant Management	\$ 506,058.00		0	\$ -	\$ -	\$ 506,058.00
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TOTAL	\$ 782,493.00			\$ 5,819,670.00	\$ -	\$ 6,325,728.00

1. Identify and explain the annual projected operation and maintenance costs associated with the proposed activities.

By design as a natural barrier, no maintenance is required.

2. Identify and explain any special engineering activities.

NA



Seal

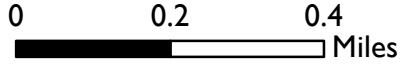
Date:	9/30/2020
Phone Number:	361-661-3061

Signature of Registered Engineer/Architect
Responsible For Budget Justification:

Aransas County

Newcomb Point Shoreline Preservation

Proposed Living Shoreline System



Esri -2020, Aransas County - 2020

28.150925,
-97.028471




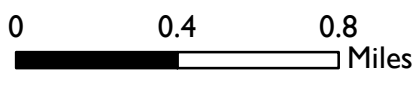
SH 35

PR 13

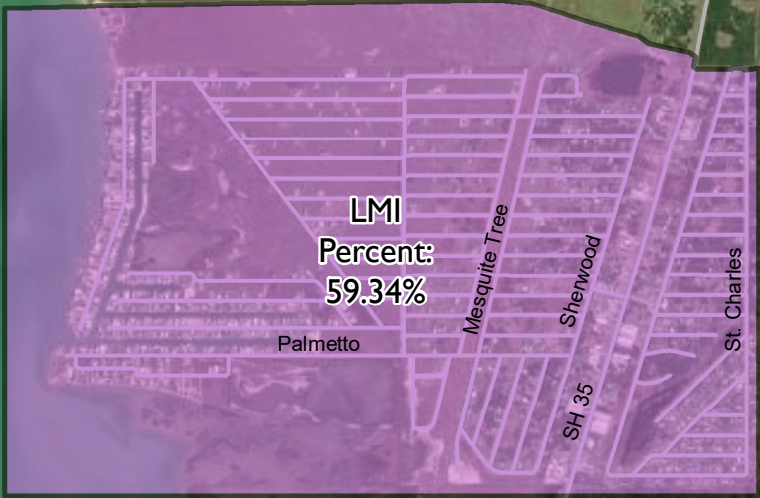
Aransas County

Newcomb Point Shoreline Preservation

-  Proposed Living Shoreline System
-  Census Designated Place



Esri - 2020, Aransas County - 2020, ACS - 2015



Eighth

PR 13

PR 13