February 2015
Cost figures as of: January 2017

No Name Bayou Marsh Creation & Nourishment (CS-78)

Project Status

Approved Date: 2015
Project Area: 533 acres
Approved Funds: $2.72 M
Total Est. Cost: $28.2 M
Net Benefit After 20 Years: 497 acres
Status: Engineering and Design
Project Type: Marsh Creation
PPL #: 24

Location

Region 4, Calcasieu-Sabine Basin, Cameron Parish

Problems

The project area is located in the Cameron-Creole Watershed Management Area which protects approximately 64,000 acres in the watershed. It includes a 16.5 mile levee along Calcasieu Lake and five large concrete water control structures to manage the unit and prevent the effects of saltwater intrusion, by managing salinity, tidal exchange, water levels, and estuarine organism movement into and out of the watershed. The Calcasieu Ship Channel, immediately west of the project area, provides an avenue for the rapid movement of high-salinity water into the marshes around Calcasieu Lake. This movement increased salinity in the area, resulting in plant death and marsh loss. The weakened marshes located between the East Fork of the Calcasieu River and Calcasieu Lake has also been decimated by hurricanes. Marshes that once provided a buffer to the southwest rim of Calcasieu Lake are now shallow open water areas.

Restoration Strategy

The proposed project's primary feature is to create and/or nourish approximately 533 acres of saline marsh (502 acres created, 21 acres nourished and 10 acres of creeks/ponds) south of Calcasieu Lake. In order to achieve this, approximately 3.5 million cubic yards of sediment will be hydraulically pumped from the upland disposal areas of the Calcasieu River immediately adjacent to (across East Fork), and into the shallow water marsh creation area to an elevation of 1.4 ft NAVD 88. Clean out approximately 5,000 LF of the Cameron Creole Watershed Levee borrow channel to facilitate water movement into the newly created area. Containment dikes will be constructed around the marsh creation area to keep material on site during pumping. Once pumping has been completed, the containment dikes will be degraded to the current platform elevation and gaps will be excavated. Additionally, 251 acres of vegetative plantings will occur within the newly created areas. Approximately 10,000 linear feet of tidal creeks and two 2.5 acre ponds will be constructed to help facilitate hydrologic flow of water in and out of project area.

Beneficial use of dredge material helps to sustain eroding marsh near the site of the No Name Bayou Marsh Creation and Nourishment project.

Progress to Date

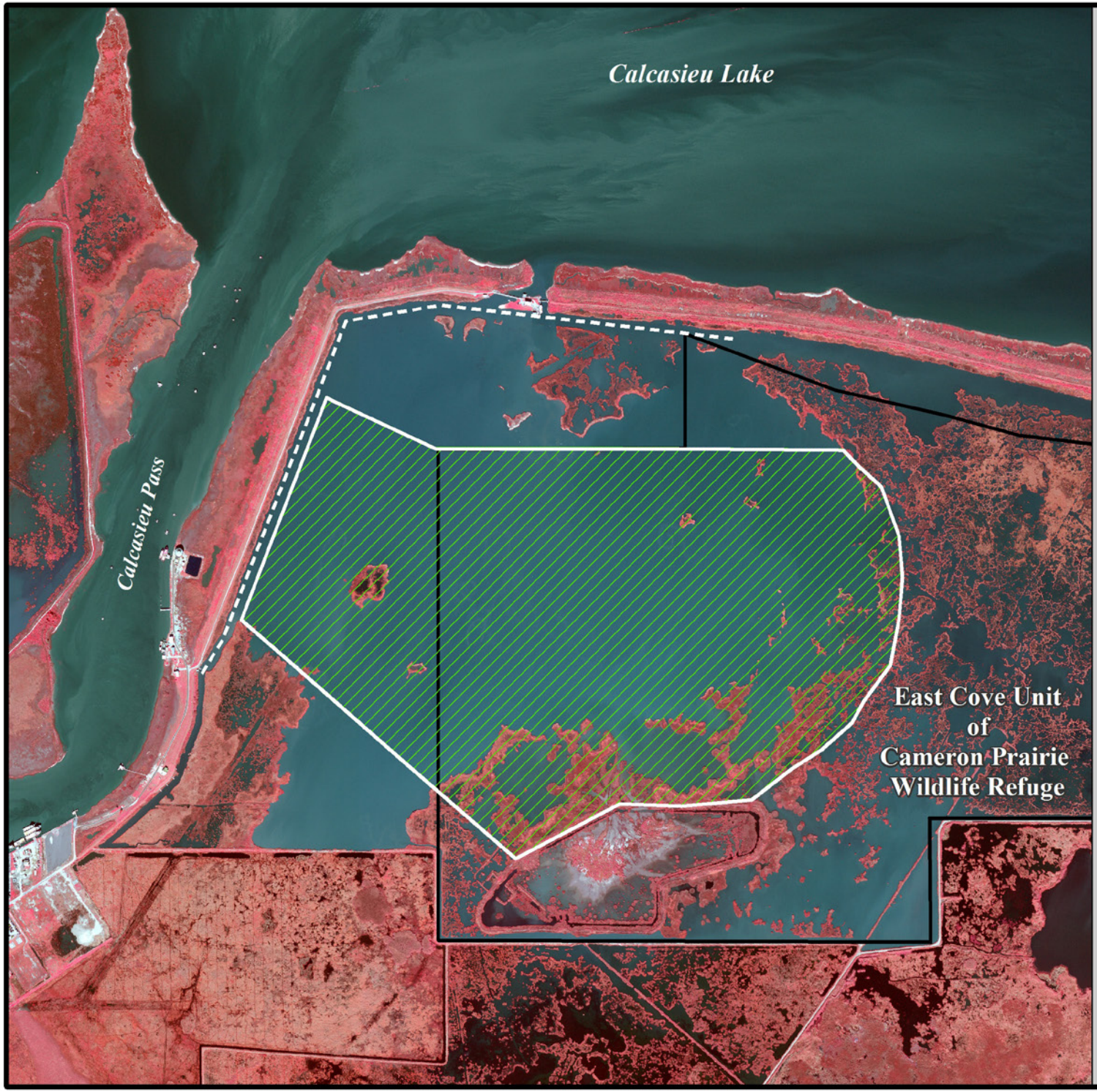
This project was approved for Phase I Engineering and Design in January 2015

This project is on Priority Project List (PPL) 24.

For more information, please contact:

Federal Sponsor:
National Marine Fisheries Service
Baton Rouge, LA
(225) 389-0508

Local Sponsor:
Coastal Protection and Restoration Authority
Baton Rouge, LA
(225) 342-4736



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Dredged Channel *

Marsh Creation *

Project Boundary

*denotes proposed features

USGS science for a changing world

0.1 0 0.1 0.2 Kilometers

0.1 0 0.1 0.2 Miles

Map Produced by:
U.S. Department of the Interior
U.S. Geological Survey
National Wetlands Research Center
Coastal Restoration Assessment Branch
Baton Rouge, La.

Background Imagery:
2015 Digitial Orthophoto Quarter Quadrangle

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