



***Deepwater Horizon* Natural Resource Damage Assessment**

Louisiana Trustee Implementation Group

2020 Annual Public Meeting

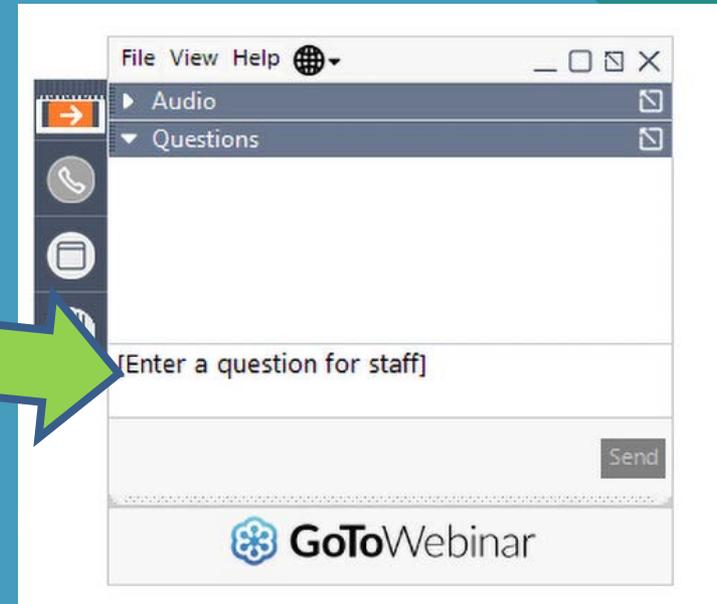
September 9, 2020

Agenda

- **Welcome & Instructions**
- **DWH Overview**
- **LA TIG Overview**
- **LA TIG Restoration Implementation and Planning Update**
- **Your Comments**

Webinar Participation

- If you're using a phone, turn off your computer's microphone and speakers.
- When the Comment session starts later, use the "Questions" box to type comments for Trustee staff.



Meeting Materials

**All meeting materials will
be available at:**

- <https://la-dwh.com/>
- <https://www.gulfspillrestoration.noaa.gov/>



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Sources of DWH Oil Spill Funding

NRDA
(Natural Resource Damage Assessment)
Oil Pollution Act

RESTORE Act
(Resources and Ecosystems
Sustainability, Tourist
Opportunities, and Revived
Economies)
CWA Civil

NFWF
(National Fish & Wildlife
Foundation)
CWA Criminal

DWH NRD Settlement

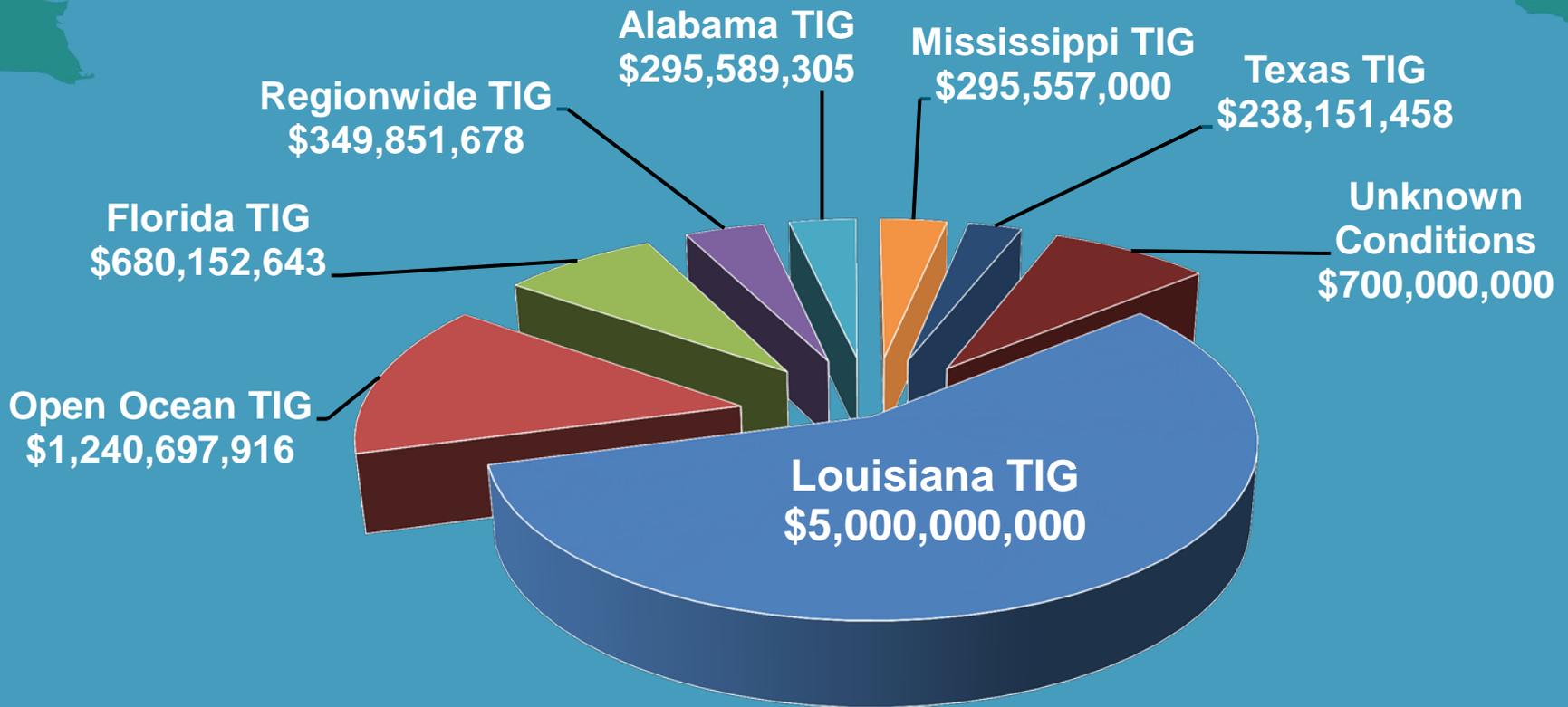
- LA TIG will receive \$5 billion for the Deepwater Horizon (DWH) oil spill Natural Resource Damages (NRD)
- Settlement funds to be paid by BP on or before April 4 of each year, beginning in 2017 through 2031
- Pursuant to the Oil Pollution Act (OPA), the natural resource trustees must use these funds to restore environmental damages caused by the DWH oil spill

Restoration Funding in Dollars

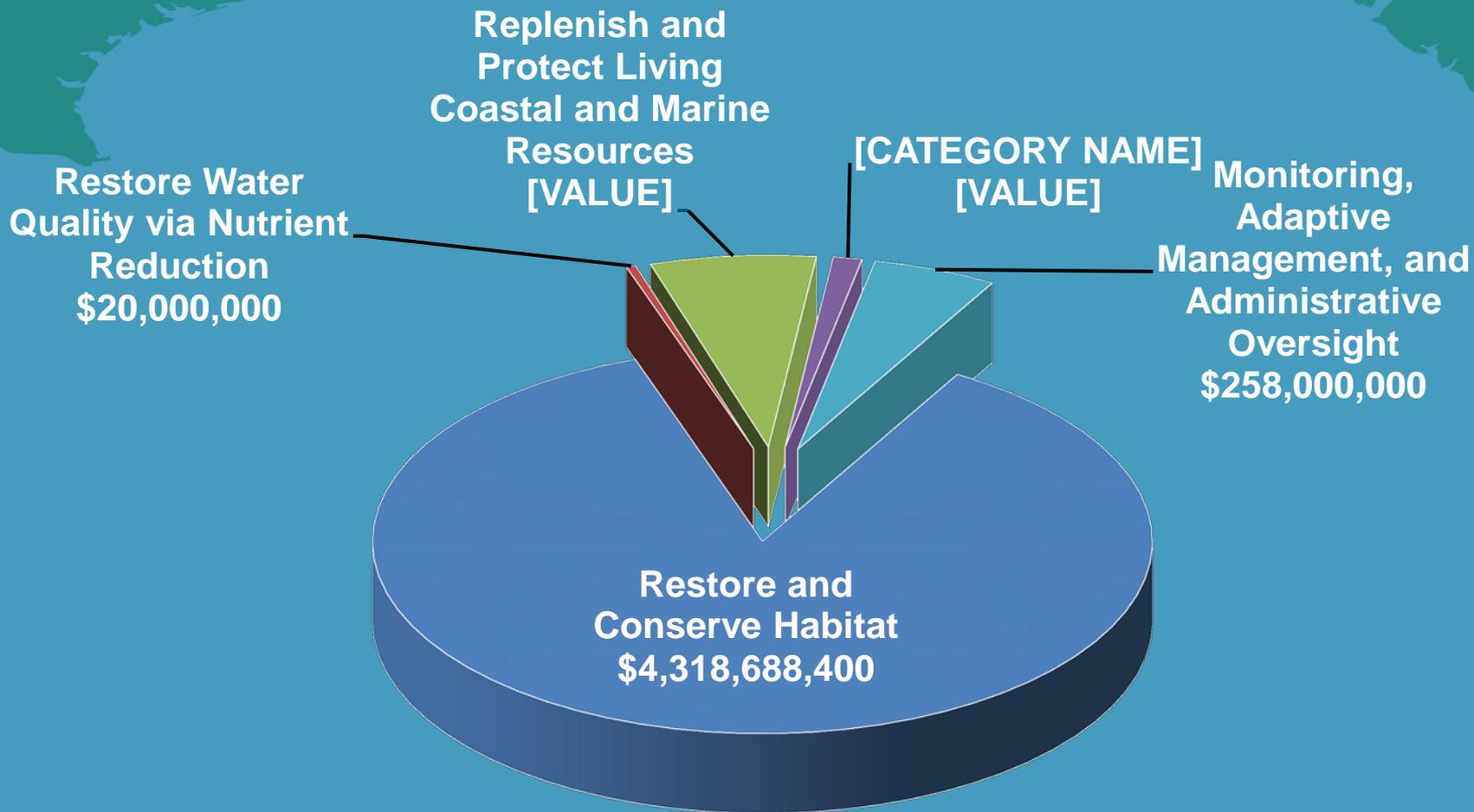
Major Restoration Categories	Unknown Conditions	Regionwide	Open Ocean	Alabama	Florida	LOUISIANA	Mississippi	Texas	Total Restoration Funding*
1. Restore and Conserve Habitat									
Wetlands, Coastal, and Nearshore Habitats				65,000,000	5,000,000	4,009,062,700	55,500,000	100,000,000	4,234,562,700
Habitat Projects on Federally Managed Lands				3,000,000	17,500,000	50,000,000	5,000,000		75,500,000
Early Restoration (through Phase IV)				28,110,000	15,629,367	259,625,700	80,000,000		383,365,067
2. Restore Water Quality									
Nutrient Reduction (Nonpoint Source)				5,000,000	35,000,000	20,000,000	27,500,000	22,500,000	110,000,000
Water Quality (e.g., Stormwater Treatments, Hydrologic Restoration, Reduction of Sedimentation, etc.)					300,000,000				300,000,000
3. Replenish and Protect Living Coastal and Marine Resources									
Fish and Water Column Invertebrates			380,000,000						380,000,000
Early Restoration Fish and Water Column Invertebrates			20,000,000						20,000,000
Sturgeon			15,000,000						15,000,000
Sea Turtles	60,000,000	55,000,000	5,500,000	20,000,000	10,000,000	5,000,000	7,500,000		163,000,000
Early Restoration Turtles	29,256,165						19,965,000		49,221,165
Submerged Aquatic Vegetation						22,000,000			22,000,000
Marine Mammals	19,000,000	55,000,000	5,000,000	5,000,000	50,000,000	10,000,000			144,000,000
Birds	70,400,000	70,000,000	30,000,000	40,000,000	148,500,000	25,000,000	20,000,000		403,900,000
Early Restoration Birds	1,823,100		145,000	2,835,000	71,937,300		20,603,770		97,344,170
Mesophotic and Deep Benthic Communities			273,300,000						273,300,000
Oysters	64,372,413			10,000,000	20,000,000	26,000,000	20,000,000	22,500,000	162,872,413
Early Restoration Oysters				3,329,000	5,370,596	14,874,300	13,600,000		37,173,896
4. Provide and Enhance Recreational Opportunities									
Provide and Enhance Recreational Opportunities				25,000,000	63,274,513	38,000,000	5,000,000		131,274,513
Early Restoration Recreational Opportunities			22,397,916	85,505,305	120,543,167	22,000,000	18,957,000	18,582,688	287,986,076
5. Monitoring, Adaptive Management, and Administrative Oversight									
Monitoring and Adaptive Management		65,000,000	200,000,000	10,000,000	10,000,000	225,000,000	7,500,000	2,500,000	520,000,000
Administrative Oversight and Comprehensive Planning		40,000,000	150,000,000	20,000,000	20,000,000	33,000,000	22,500,000	4,000,000	289,500,000
Adaptive Management NRD Payment for Unknown Conditions	700,000,000								700,000,000
Total NRD Funding	\$700,000,000	\$349,851,678	\$1,240,697,916	\$295,589,305	\$680,152,613	\$5,000,000,000	\$95,557,000	\$238,151,458	

* The total restoration funding allocation for the Early Restoration work; each restoration type; and monitoring, adaptive management, and administrative oversight is \$5.1 billion (plus up to an additional \$700 million for adaptive management and unknown conditions).

Total Allocation



LA TIG Allocation



Louisiana Restoration Area Representatives

Bren Haase

State of Louisiana

Erin Chandler

Department of the Interior

Mel Landry

National Oceanic and Atmospheric Administration

Doug Jacobson

U.S. Environmental Protection Agency

Ron Howard

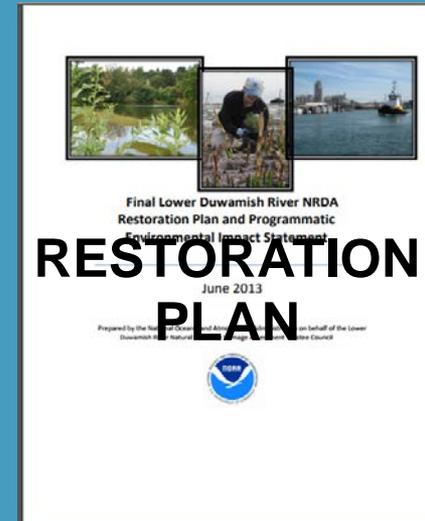
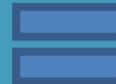
U.S. Department of Agriculture

Typical NRDA & NEPA Process

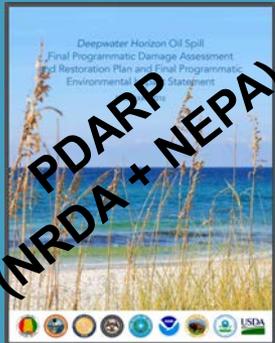
NRDA



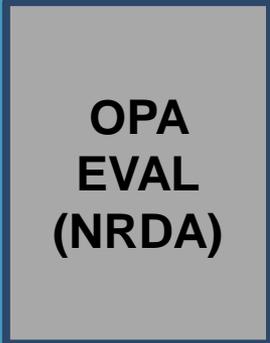
NEPA



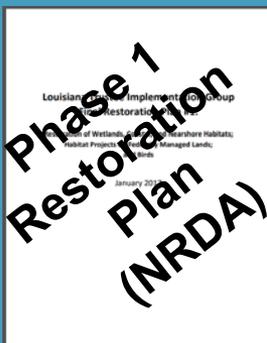
DWH Phased NRDA & NEPA Process



**PDARP
(NRDA + NEPA)**



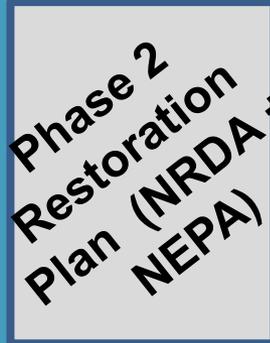
**OPA
EVAL
(NRDA)**



**Phase 1
Restoration
Plan
(NRDA)**



**Project
Design +
Enviro
Eval**



**Phase 2
Restoration
Plan (NRDA +
NEPA)**



Construction



Approaches / Techniques

Solicitation of Projects

Project Type/Location
E&D Funding

Design Alts

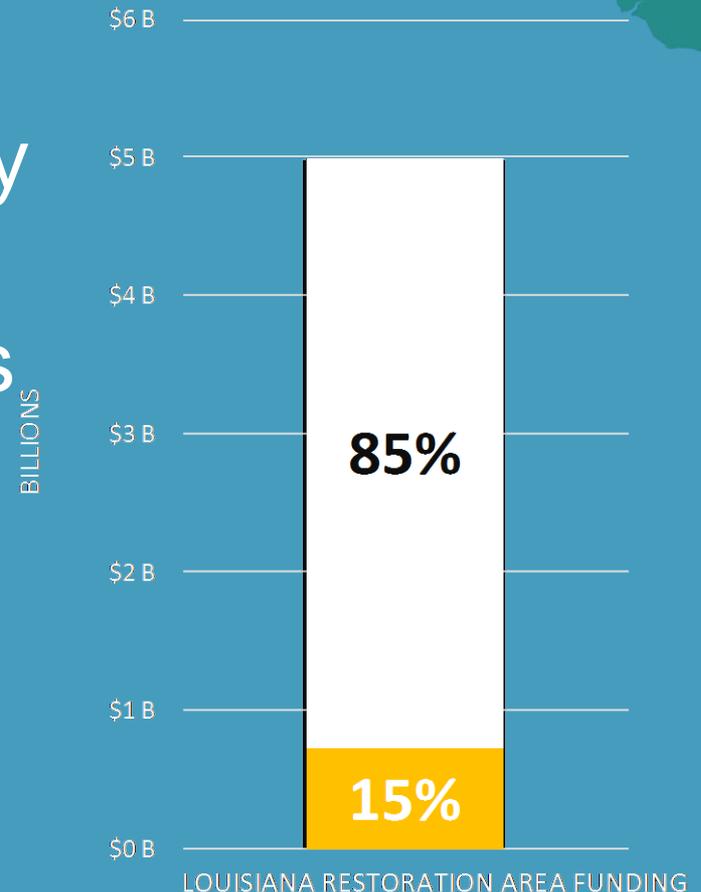
Selection/
Construction
Funding



Restoration Implementation Update

Funding Update

- Committed approximately \$744 million for projects and planning activities as of July 2020.
- The total allocation is \$5 billion.



Early Restoration Overview

Project	Cost	Status
Lake Hermitage Marsh Creation Project	\$13.2 million	Monitoring
Louisiana Oyster Cultch Placement / Hatchery Project	\$14.8 million	Monitoring
Louisiana Outer Coast Restoration:	\$318 million	--
- Caillou Lake Headlands	--	Monitoring
- Shell Island	--	Monitoring
- Chenier Ronquille	--	Monitoring
- Breton Island	--	In Construction
Early Restoration Total	\$346 million	

Calliou Lake Headland Project



Chenier Ronquille Project



Chenier Ronquille Project





Post Settlement Restoration Planning Activities



Restoration Plan #1:

Restoration of Wetlands, Coastal, and Nearshore Habitats; Habitat Projects on Federally Managed Lands; and Birds

Restoration Plan #1

Restoration of Wetlands, Coastal, and Nearshore Habitats

- Terrebonne Basin Ridge and Marsh Creation Project:
Bayou Terrebonne Increment
- Barataria Basin Ridge and Marsh Creation Project:
Spanish Pass Increment
 - Lake Borgne Marsh Creation Project:
Increment One

Habitat Projects on Federally Managed Lands

- Shoreline Protection at Jean Lafitte National Historical Park and Preserve

Birds

- Queen Bess Island Restoration Project
 - Rabbit Island Restoration Project

Restoration Plan #1





Restoration Plan #1.1: Queen Bess Island Restoration

Queen Bess Island





Draft Restoration Plan #1.2:

**Spanish Pass Ridge and Marsh Creation
Project and Lake Borgne Marsh Creation
Project**

Spanish Pass Ridge and Marsh Creation



Google Earth

Image © 2020 TerraMetrics

10 mi



Restoration Plan #1.3:

Rabbit Island Restoration and Shoreline Protection at Jean Lafitte National Historical Park and Preserve

Rabbit Island Restoration



Shoreline Protection at Jean Lafitte





Restoration Plan # 2:

Provide and Enhance Recreational Opportunities

Restoration Projects





Restoration Plan #3:

Barataria Basin Strategic Restoration Plan for the Restoration of Wetlands Coastal, and Nearshore Habitats

Barataria Basin Strategic Restoration Plan

- ❖ **Strategic Restoration Plan and Environmental Assessment**
- ❖ **For the Restoration of Wetlands, Coastal, and Nearshore Habitats in the Barataria Basin**
- ❖ **Focuses on addressing ecosystem-level injury in Barataria Basin and the Gulf of Mexico**

Barataria Basin Strategic Restoration Plan

The Trustees' two decisions:

1. A restoration strategy that utilizes a suite of restoration approaches/types, including large-scale sediment diversions to restore deltaic processes, marsh creation, and ridge restoration
2. Selected 3 projects for further evaluation and planning:
 - **Mid-Barataria Sediment Diversion**
 - **Large Scale Marsh Creation: *Component E***
 - **Barataria Basin Ridge and Marsh Creation: *Spanish Pass Increment***



Restoration Plan #3.3: Large-Scale Barataria Marsh Creation: Upper Barataria Component

Restoration Plan #3.3

Project will construct 1,207 acres of Marsh in Upper Barataria



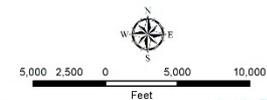
Proposed Marsh
Creation Areas

Proposed MCA
Exist. Permanent Access
Corridor

Previously Constructed
Marsh Creation Areas

Wills Point Borrow

Alliance Anchorage Borrow
Area





Restoration Plan #4: Nutrient Reduction (Nonpoint Source) and Recreational Use



Nutrient Reduction (Nonpoint Source) Projects

Nutrient Reduction (Nonpoint) Projects

Project Phases:

- Project Guidelines Development
- Outreach and Education
- **Implement Baseline Water Quality Monitoring: Current Phase**
- Conduct Landowner Sign-up: September & October 2020
- Develop Site Specific Restoration Plans: October 2020
- Landowner Contract/Agreement: November 2020 - TBD
- Site Specific Project Implementation: December 2020 - TBD
- Post-Execution Water Quality Monitoring: TBD

Nutrient Reduction (Nonpoint) Proposed Projects

- Nutrient Reduction on Dairy Farms in St. Helena & Tangipahoa Parishes
 - \$1,000,000 project budget
 - Partnering with Capital RC&D & LDEQ to conduct Water Quality Baseline Monitoring

- Nutrient Reduction on Dairy Farms in Washington Parish
 - \$1,000,000 project budget
 - Partnering with Capital RC&D & LDEQ to conduct Water Quality Baseline Monitoring

Nutrient Reduction (Nonpoint) Proposed Projects

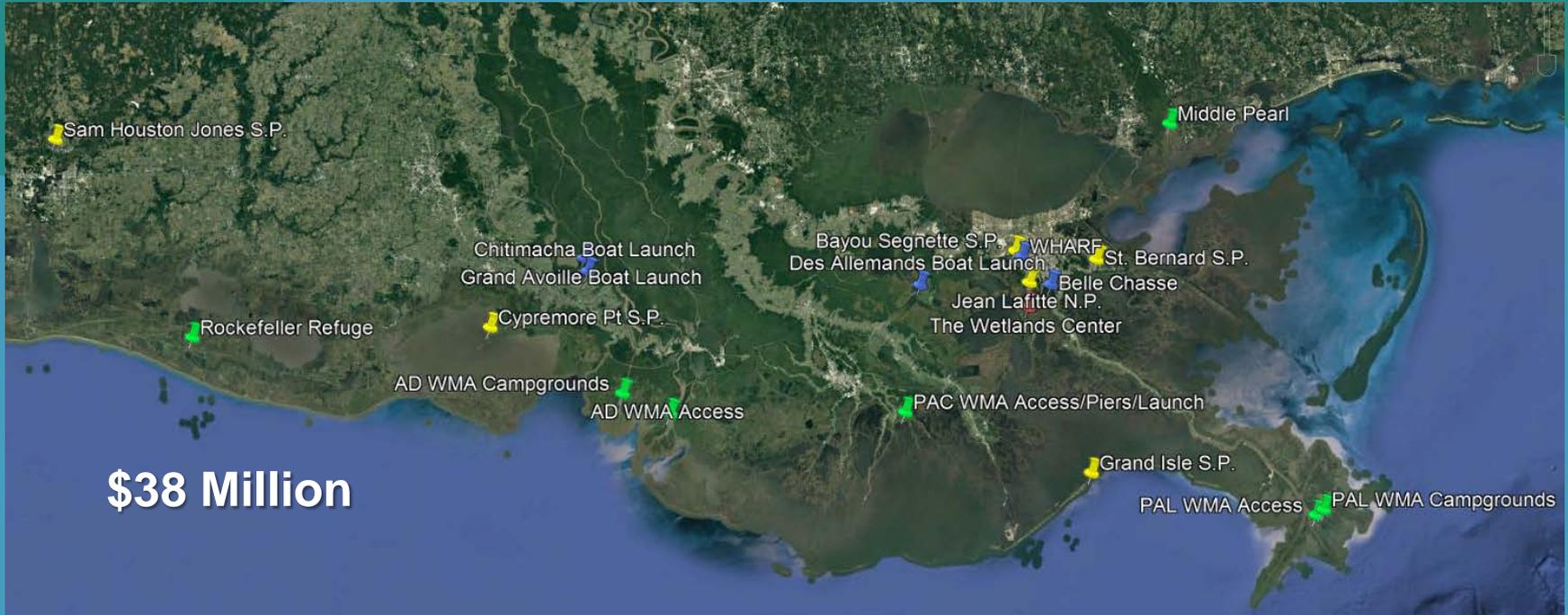
- Nutrient Reduction on Cropland and Grazing Land in Bayou Folsé
 - USDA has withdrawn \$500,000 of the \$2,500,000 project budget;
 - Partnering with BTNEP/LDEQ to conduct Water Quality Baseline Monitoring

- Winter Water Holding on Cropland in Vermilion and Cameron Parishes Plus Agricultural Best Management Practices
 - USDA has withdrawn \$500,000 of the \$3,000,000 project budget;
 - Partnering with TNC/DU to conduct Water Quality Baseline Monitoring



Recreational Use Restoration Projects

Recreational Use Restoration Projects



Project Types:

State & Federal Parks

WMAs & Refuges

Fishing Access

Education & Outreach



Restoration Plan #5:

Living Coastal and Marine Resources – Marine Mammals and Oysters

Restoration Plan #5

Marine Mammals

- Increasing Capacity and Expanding Partnerships along the Louisiana Coastline for Marine Mammal Stranding Response

Oysters

- Enhancing Oyster Recovery Using Brood Reefs
- Cultch Plant Oyster Restoration Projects
- Hatchery-based Oyster Restoration Projects





Restoration Plan #6:

Restore and Conserve Wetlands, Coastal, and Nearshore Habitats

West Grand Terre



Golden Triangle Marsh Creation



Biloxi Marsh Living Shoreline





Monitoring and Adaptive Management

Monitoring & Adaptive Management Strategy Development



Credit: J. Smith

- **Louisiana Adaptive Management Report** identified opportunities to improve and integrate among LA coastal restoration efforts
- **Programmatic MAM Strategy** addresses key findings, clarifies LA-focused restoration objectives, identifies MAM priorities

Secretive Marsh Birds Monitoring



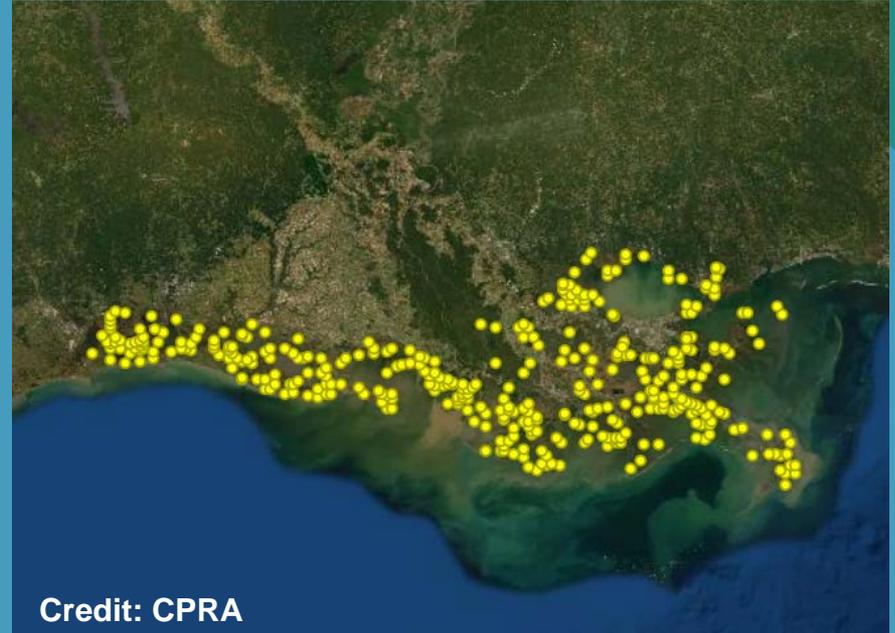
- Estimate breeding population in Louisiana habitats
- Enhance coastal restoration actions to benefit secretive marsh birds

Fisheries Monitoring



- **Fisheries Sampling Gear Comparison:**
Study identifies best use (and drawbacks) of each nekton sampling method to improve design of project monitoring plans
- **Fisheries-Independent Monitoring Program:**
Collects and assesses changes in fish and shellfish populations along LA coast

Coastwide Reference Monitoring System



- Site-specific data from 390 sites: hydrology, vegetation, soils, elevation change
- Coast-wide data: aerial photos, vegetation cover, elevation



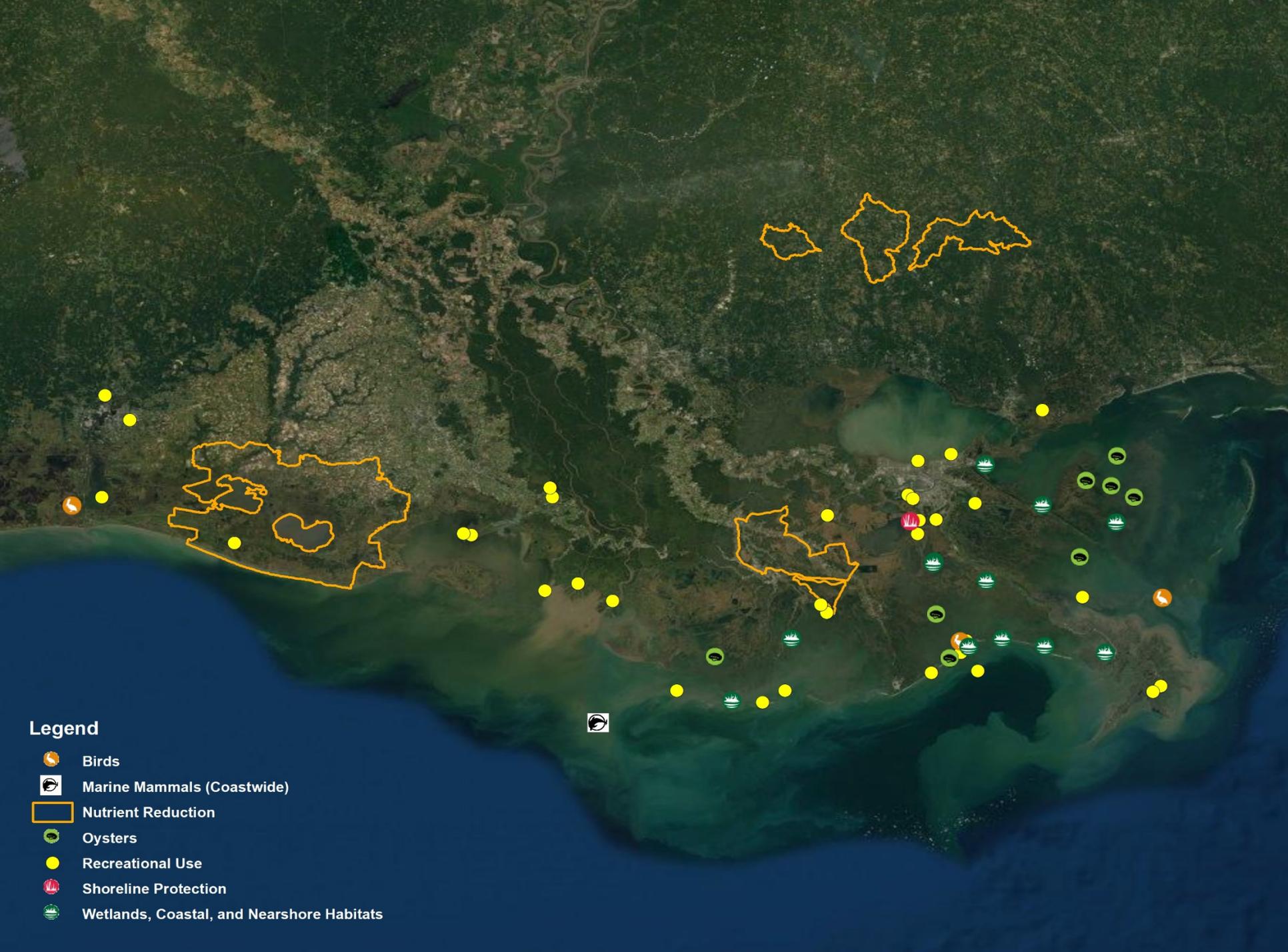
Planned Future Efforts

Restoration Plans in Development

Restoration Plan	Proposed Project Budget
Draft Restoration Plan and Environmental Assessment #1.2 – Lake Borgne and Spanish Pass Marsh Creation Projects	Approximately \$224,000,000
Draft Restoration Plan and Environmental Assessment #7 – Wetlands, Coastal, and Nearshore Habitats and Birds	TBD (Winter 2020)
RP #3.2 – Mid-Barataria Sediment Diversion	TBD

Takeaways

- Louisiana will ultimately have \$5.0B available through NRDA allocated through the Louisiana TIG.
- Slightly under \$1.5B allocated to date.
- Eleven Comprehensive Restoration Plans completed or underway
- 57 projects initiated or completed.



Legend

-  Birds
-  Marine Mammals (Coastwide)
-  Nutrient Reduction
-  Oysters
-  Recreational Use
-  Shoreline Protection
-  Wetlands, Coastal, and Nearshore Habitats

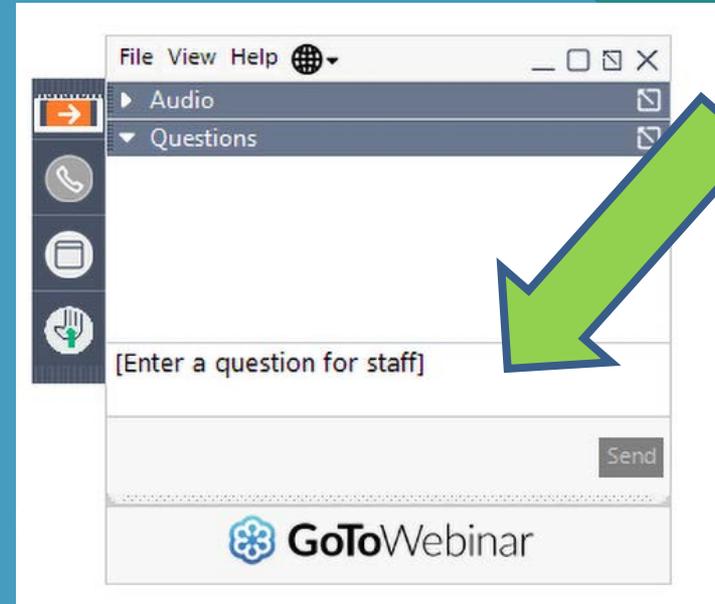
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Comments

- Please use the “Questions” box to type comments for Trustee staff
- Comments will be read on the webinar as time allows



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