

Waterfowl

Migrating and Wintering Waterfowl

Species addressed in GCJV planning: Mallard, Northern Pintail, Gadwall, American Wigeon, Green-winged Teal, Blue-winged Teal, Northern Shoveler, Mottled Duck, Canvasback, Redhead, Ring-necked Duck, Greater & Lesser Scaup, and Lesser Snow Goose

Population Objectives: 4,694,568 ducks and 51,614 geese; refer to Table 1 in the [Mississippi River Coastal Wetlands Initiative Area Plan](#) for objectives by species

Habitat Objectives: Table 1. Habitat objectives for migrating and wintering waterfowl in the Mississippi River Coastal Wetlands IA.

Habitat Type	Flooded Acres
Forested Wetlands	637,164
Coastal Marsh	NA ¹

¹Not yet available.

Biological Foundation: Bio-energetic models yield acreage of foraging habitats necessary to meet dietary demands of population objectives

Conservation Activities:

- Minimize saltwater intrusion and enhance productivity of coastal marsh through hydrologic restoration
- Reduce erosion of coastal marsh through shoreline and bank stabilization
- Create and promote expansion of coastal marsh through beneficial use of dredge material
- Maintain or improve levees and water-control structures on managed marshes
- Maintain, enhance, or restore resource values of forested wetlands through application of silvicultural practices and hydrologic restoration

Research Priorities:

- Estimate waterfowl foraging values of coastal marsh types
- Quantify movements, habitat use, and foraging ecology of scaup wintering in offshore and inshore waters
- Evaluate effects of coastal marsh restoration techniques on sustainability of GCJV waterfowl habitats

Breeding Waterfowl

Priority Species: [Mottled Duck](#)

Population Objective: Western Gulf Coast (i.e., GCJV-wide) population index of 105,816 individuals, including at least 35,322 in Texas and 70,132 in Louisiana, as measured from Mid-winter Surveys in coastal areas of these states.

Habitat Objective: Not yet available

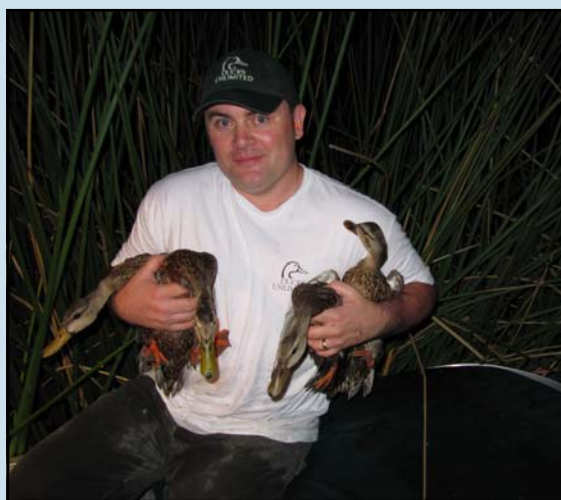
Biological Foundation: Factors limiting recruitment are primary constraints to population growth

Conservation Activities:

- Create and restore large blocks of nesting habitat in or adjacent to coastal marsh
- Use hydrologic restoration to maintain low salinity (<6–8 ppt) and enhance the quality of brood-rearing habitats in coastal marsh
- Remove predators in targeted locations

Research Priorities:

- Measure the effectiveness of habitat conservation actions to benefit Mottled Duck breeding productivity, including breeding propensity, nest success, and brood survival





Landbirds



Priority Landbird Species: [BCR 37](#); [BCR 25, 26, 27](#)

Northern Bobwhite

Population Objective: BCR 37, LA portion - 100,853 birds; 8,404 coveys; BCR 26 and 27, Mississippi River Coastal Wetlands Initiative Area - 54,336 birds; 4,528 coveys

Habitat Objective:

- BCR 37, LA portion - Improve 4,538,400 acres (3,250,800 cropland acres; 609,300 pasture/hay acres; and 678,300 pine forest acres)
- BCR 26 and 27, Mississippi River Coastal Wetlands Initiative Area - Improve 368,042 acres (76,806 cropland acres; 88,107 pasture/hay acres; 88,506 rangeland acres; 114,419 pine forest acres; 54 hardwood forest acres; and 150 mixed pine-hardwood forest acres)

Biological Foundation: Acreage of improved cropland, pasture/hay, rangeland, or forest required to produce a covey

Conservation Activities: Control but don't remove brush; convert exotic grass to native grass; thin and burn pine stands to remove litter and create herbaceous ground cover

Loggerhead Shrike

Population Objective: 120,946 birds during winter (85,106 Resident, 35,840 Migratory)

Habitat Objective: 305,286 acres

Biological Foundation: Territory size(s) dictates acreage needed to support population objectives

Conservation Activities: Preserve native prairie areas; maintain low, thick shrubs in fields (3–10 shrubs or small trees per acre)

Le Conte's Sparrow

Population Objective: 32,663 birds during winter

Habitat Objective: 32,663 acres

Biological Foundation: Winter density estimates dictate acreage needed to support population objectives

Conservation Activities: Manage ≥500 acre blocks of native grassland with burned and unburned areas; prescribed burns should occur on a 3-year rotation

Seaside Sparrow

Population Objective: 65,000 birds in U.S. BCR 37 and GCJV portion of BCR 26

Habitat Objective: 650,000 acres in U.S. BCR 37 and GCJV portion of BCR 26

Biological Foundation: Breeding territory size dictates acreage needed to support population objectives

Conservation Activities:

- Create and/or restore marsh habitat, in blocks ≥10,000 acres, containing areas of medium height smooth cordgrass, interspersed with ponds, tidal creeks, and bare ground areas
- Plug selected ditches in marshes that have been ditched
- Create marsh-elevation islands, with shallow water bodies and scattered woody shrubs, using dredged material

Cerulean Warbler, Golden-winged Warbler, and Swainson's Warbler (migratory suite)

Population Objectives: Not yet available

Habitat Priorities: Large forest patches (≥10,000 acres) close to the Gulf of Mexico

Biological Foundation: Theoretical bio-energetic foraging needs of migrating warblers

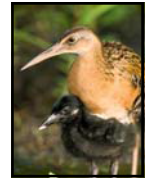
Conservation Activities: Maintain, restore, or create large forest patches (≥10,000 acres) along the Louisiana coast

Landbird Research Priorities:

- Test assumptions and refine parameter estimates used in population-habitat models
- Determine suitable grassland patch size, species composition, structure, and landscape habitat matrix needed to support wintering Le Conte's Sparrows
- Identify habitat components of ideal migration stopover habitat
- Assess effectiveness of GCJV priority landbird species planning and management in addressing the needs of other bird species of conservation concern



Shorebirds and Waterbirds



Shorebirds

Population Objectives: Table 2. Fall (Jul 15–Nov 5) migrating shorebird objectives for inland-managed habitat in the Mississippi River Coastal Wetlands IA.

Priority Species	Population Objective	Shallowly Flooded and/or Mudflat Acres
Long-billed Curlew	19	19
Western Sandpiper	95,871	2,179
Stilt Sandpiper	44,984	2,150
Buff-breasted Sandpiper	4,478	4,596
Short-billed Dowitcher	852	799
Total	146,204	9,743

Biological Foundation: Bio-energetic models yield acreage of foraging habitats necessary to meet the demand of population objective

Other Shorebirds of Concern: Snowy Plover, Wilson's Plover, Hudsonian Godwit

Population Objective: Not yet available

Habitat Objective: Not yet available

Biological Foundation: Not yet available

Conservation Activities: Provide habitat ranging from shallow, flooded fields to mudflats

Research Priorities:

- Evaluate assumptions used to derive inland/managed habitat objectives in GCJV shorebird plan
- Improve accuracy and precision of population estimates

Waterbirds

Priority Species: Reddish Egret, Little Blue Heron, Wood Stork, King Rail, Black Rail, Gull-billed Tern, and Black Skimmer

Population Objectives:

- Reddish Egret: 100 breeding pairs in LA, MS, and AL portion of the GCJV
- Little Blue Heron: 6,254 breeding pairs in Mississippi River Coastal Wetlands IA
- Wood Stork, King Rail, Black Rail, Gull-billed Tern, and Black Skimmer: Not yet available

Biological Foundation:

- Reddish Egret: Estimation of breeding population impacts of specific management treatments applied to specific colonies
- Little Blue Heron: Population is limited by availability of suitable foraging habitat proximal to suitable nesting habitat

Habitat Objectives

- Little Blue Heron: See Little Blue Heron Conservation Plan (http://www.gcjv.org/docs/GCJV_LBHE_Conservation_Plan.pdf)
- Not yet available for Reddish Egret, Wood Stork, King Rail, Black Rail, Gull-billed Tern, or Black Skimmer

Conservation Activities:

Reddish Egret

- Apply colony-specific management actions
- Create/improve alternate colony sites
- Improve foraging habitat within 10 km of existing colonies

Little Blue Heron

- Apply specific management actions to colonies, or clusters of colonies, and associated foraging habitat

Research Priorities:

- Reddish Egret: Test breeding population response assumptions for each management action
- Little Blue Heron: (1) Test breeding population response to management actions, (2) Develop standard, repeatable methodology, incorporating detection probabilities, to assess population status and distribution

Reddish Egret Colony Site	Recommended Action		
	Predator Control	Disturbance Management	Habitat Action
North Island Complex	X		X