

DRAFT

NATIONAL WETLANDS INVENTORY

NOTES TO USERS

1:100,000 SCALE MAP

MACON NE, NW, SE and SW

GEORGIA

USER REPORT: MACON NE, NW, SE and SW, GEORGIA

NATIONAL WETLANDS INVENTORY MAPS

A. INTRODUCTION

The U.S. Fish & Wildlife Service's National Wetlands Inventory is producing maps showing the location and classification of wetlands and deepwater habitats of the United States. The Classification of Wetlands and Deepwater Habitats of the United States by Cowardin et al. is the classification system used to define and classify wetlands. Photo interpretation conventions, hydric soils lists and wetland plant lists are also available to enhance the use and application of the classification system.

B. PURPOSE

The purpose of the notes to users is threefold: (1) to provide localized information regarding the production of NWI maps, including specific imagery and interpretation discussion; (2) to provide a descriptive crosswalk from wetland codes on the map to common names and representative plant species, and (3) to explain local geography, climate, and wetland communities.

C. STUDY AREA

Geography:

The study area covered by the Macon NE, NW, SE and SW base maps is located in central to south Georgia (Appendix A). The study area, according to Bailey (1980), lies within the Outer Coastal Plain Forest Province (Beech-Sweetgum-Magnolia-Pine-Oak Forest Section) and the southeastern Mixed Forest Province. The latter is located in the northern half of Macon NW and the northwest corner of Macon NE.

The topography is characteristic of low, undulating relief (100-200 ft.), except for the northern quarter of the study area where the piedmont-type terrain reaches 500 ft. elevation.

Major rivers within the study area include the Ocmulgee, Oconee, Ogeechee, Ohoopie and Flint. These rivers are generally slow-moving and contain well-developed floodplains. Of these rivers, the only one that has been impounded is the Flint River, which created Lake Blackshear.

Climate:

The climate is characterized by warm, humid summers and mild winters. Rainfall throughout summer usually results from

thunderstorm frequency, while fall, winter and spring precipitation may be a result of frontal activity. Temperatures show a moderately wide range, averaging 60°F to 70°F annually. It is not uncommon during the peak of summer for the temperature to reach 100°F occasionally.

Vegetation:

According to Bailey, the study area is characterized as the Temperate Rainforest. Common forest communities include broadleaf deciduous trees such as red maple, sweetgum, larrel oak, water oak, elm and blackgum. Broadleaf evergreen forest occurs throughout the southern and eastern portion of the study area. These communities, commonly known as bayheads, contain a mix of bay and magnolia trees interspersed with pines and evergreen shrub understories. Bald cypress habitat also occurs in the low-lying areas throughout the study area. Extensive areas of upland and wetland communities have been replanted with stands of pine.

Soils:

Temperate rainforest grows on a wide variety of upland and wetland soils. Generally speaking, these soils are characteristically wet, acidic and low in major plant nutrients. The soils are derived mainly from Coastal Plain sediments, ranging from heavy clay to gravel, but sandy materials predominate. Silty soils occur on expansive level areas.

Soil groups representative of wetland habitats may include the Osier-Bibb-Coxville, Pelham-Ardilla-Ocilla, Herod-Muckalee, Grady-Plummer, Alluvial Land-Swamp-Myatt and Bibb-Kinston associations. These are level to nearly level soils that are poorly drained and have a high water table. They are composed of sandy to clayey or loamy subsoil and are subject to seasonal flooding. Soils occurring along the well-developed floodplains, such as the Oconee River, are commonly comprised of recent alluvial deposits.

D. WETLAND CLASSIFICATION CODES AND WATER REGIME DESCRIPTIONS

TABLE - Cowardin Classification Codes and Descriptions

NWI CODE (Water Regime)	NWI DESCRIPTION	COMMON DESCRIPTION	CHARACTERISTIC VEGETATION
R2UB (H)	Riverine, lower perennial, unconsolidated bottom	River or drainage ditches	Unconsolidated bottoms
L1UB (H)	Lacustrine, limnetic, unconsolidated bottom	Lakes	Unconsolidated bottoms
L2AB3 (G,H)	Lacustrine, littoral, aquatic bed rooted vascular	Lake Marshes	<u>Nuphar luteum</u> (yellow pond lily) <u>Nymphaea odorata</u> (white water lily) <u>Nelumbo lutea</u> (American lotus)
L1AB4 (H)	Lacustrine, limnetic, aquatic bed floating vascular	Lakes	<u>Lemna spp.</u> (duckweed)
PUB (F,G,H)	Palustrine, unconsolidated bottom	Ponds	Unconsolidated bottoms
PAB3 (G,H)	Palustrine, aquatic bed rooted vascular	Ponds or deep marshes	<u>Nuphar luteum</u> (yellow pond lily) <u>Nymphaea odorata</u> (white water lily) <u>Nelumbo lutea</u> (American lotus)
PAB4 (G,H)	Palustrine, aquatic bed floating vascular	Ponds	<u>Lemna spp.</u> (duckweed)
PEMI (A,C,F,G)	Palustrine, emergent persistent	Ponded prairies, marshes, depressions or drainage areas	<u>Scirpus cyperinus</u> (wool grass) <u>Juncus effusus</u> (soft rush) <u>Typha latifolia</u> (common cattail)

D. WETLAND CLASSIFICATION CODES AND WATER REGIME DESCRIPTIONS

TABLE - Cowardin Classification Codes and Descriptions

NWI CODE (Water Regime)	NWI DESCRIPTION	COMMON DESCRIPTION	CHARACTERISTIC VEGETATION
PEM1 (A,C,F,G) (cont'd)	Palustrine, emergent persistent	Ponded prairies, marshes, depressions or drainage areas	<u>Carex</u> sp. (sedges) <u>Polygonum</u> sp. (smartweed) <u>Juncus</u> spp. (rushes) <u>Peltandra virginica</u> (arrow arum) <u>Rhexia</u> spp. (meadow beauties) <u>Xyris</u> spp. (grasses)
PSS1 (A,C,F,G)	Palustrine, scrub shrub, broad-leaved deciduous	Willow thicket	<u>Salix nigra</u> (black willow) <u>Cephalanthus occidentalis</u> (buttonbush) <u>Acer rubrum</u> (red maple) <u>Liquidambar styraciflua</u> (sweetgum) <u>Alnus serrulata</u> (common elder)
PSS3 (B,C,F)	Palustrine, scrub shrub, broad-leaved evergreen	Thicket	<u>Persea borbonia</u> (red bay) <u>Myrica cerifera</u> (wax myrtle) <u>Magnolia virginiana</u> (sweet bay) <u>Cyrilla racemiflora</u> (titi) <u>Hypericum virginicum</u> (marsh st. johnswort)
PSS7 (A,B,C)	Palustrine, scrub shrub mixed evergreen	Shrub forest	<u>Persea borbonia</u> (Red bay) <u>Myrica cerifera</u> (wax myrtle) <u>Pinus taeda</u> (lobolly pine)

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NWI CODE (Water Regime)	NWI DESCRIPTION	COMMON DESCRIPTION	CHARACTERISTIC VEGETATION
PSS7 (A,B,C) (cont'd)			<u>Pinus elliotii</u> (slash pine) <u>Pinus serotina</u> (pond pine)
PFO1 (A,C,F)	Palustrine, forested, broad-leaved deciduous	Floodplains, swamps or depression	<u>Acer rubrum</u> (red maple) <u>Quercus laurifolia</u> (laurel oak) <u>Liquidambar styraciflua</u> (sweetgum) <u>Nyssa sylvatica</u> (black gum) <u>Nyssa aquatica</u> (water tupelo) <u>Nyssa sylvatica var biflora</u> (swamp tupelo)
PFO2 (C,F,G)	Palustrine, forested, needle-leaved deciduous	Cypress domes, sloughs, swamps	<u>Taxodium distichum</u> (bald cypress)
PFO3 (B,C)	Palustrine, forested, broad-leaved evergreen	Bayheads or bay swamps	<u>Magnolia virginiana</u> (sweet bay) <u>Persea borbonia</u> (red bay) <u>Gordonia lasianthus</u> (loblolly bay)
PFO4 (A,B,C)	Palustrine, forested, needle-leaved evergreen	Pine flatwoods	<u>Pinus elliotii</u> (slash pine) <u>Pinus serotina</u> (pond pine) <u>Pinus taeda</u> (loblolly pine)
PFO6 (C,F,G)	Palustrine, forested, mixed deciduous	Sloughs, swamps	<u>Taxodium distichum</u> (bald cypress) <u>Nyssa sylvatica</u> (blackgum)

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NWI CODE (Water Regime)	NWI DESCRIPTION	COMMON DESCRIPTION	CHARACTERISTIC VEGETATION
PF06 (C,F,G) (cont'd)			<u>Nyssa sylvatica var</u> <u>biflora</u> (swamp tupelo) <u>Acer rubrum</u> (red maple) <u>Liquidambar</u> <u>styraciflua</u> (sweetgum)
PF07 (A,B,C)	Palustrine, forested, mixed evergreen	Bay swamp/Pine Flatwoods	<u>Gordonia lasianthus</u> (loblolly bay) <u>Magnolia virginiana</u> (sweet bay) <u>Persea borbonia</u> (red bay) <u>Pinus taeda</u> (Loblolly pine) <u>Pinus elliottii</u> (slash pine)

Water Regime Description

- (A) Temporarily Flooded - Surface water present for brief periods during growing season, but water table usually lies well below soil surface. Plants that grow both in uplands and wetlands are characteristic of this water regime.
- (B) Saturated - The substrate is saturated to surface for extended periods during the growing season, but surface water is seldom present.
- (C) Seasonally Flooded - Surface water is present for extended periods especially early in the growing season, but is absent by the end of the growing season in most years. The water table after flooding ceases is very variable, extending from saturated to a water table well below the ground surface.
- (F) Semipermanently Flooded - Surface water persists throughout the growing season in most years. When surface water is absent, the water table is usually at or very near the land's surface.
- (G) Intermittently Exposed - Surface water is present throughout the year except in years of extreme drought.
- (H) Permanently Flooded - Water covers land surface throughout the year in all years.
- (K) Artificially Flooded - The amount and duration of flooding is controlled by means of pumps or siphons in combination with dikes or dams.
- (U) Unknown - The water regime is now known.

General Note: Table 1

In the Palustrine Forested NWI codes, the split subclasses will be meant to also include the inverse subclasses. However, the vegetation characteristics will be the same only in different percentages.

Also, any split classes will generally contain those vegetation characteristics found in the singular class.

F. MAP PREPARATION

The wetland classification that appears on the Macon National Wetlands Inventory (NWI) Base Map (Table 1) is in accordance with Cowardin et al. (1977). The delineations were produced through stereoscopic interpretation of 1:58,000 scale color infrared photography. The photography was taken during March 1980, February and March 1981 and 1982.

Field checks of areas found within Macon NE, SE, NW & SW photography were made prior to the actual delineation of wetlands. Field check sites were selected to clarify varying signatures found on the photography. These photographic signatures were then identified in the field using vegetation types and soil types, as well as additional input from field personnel.

Collateral data included USGS topographic maps, SCS soil surveys, climate, vegetation, and ecoregional information.

The user of the map is cautioned that, due to the limitation of mapping primarily through aerial photo interpretation, a small percentage of wetlands may have gone unidentified. Since the photography was taken during a particular time and season, there may be discrepancies between the map and current field conditions. Changes in landscape which occurred after the photography was taken would result in such discrepancies.

- Aerial photo interpretation and drafting were completed by Martel Laboratories, Inc., St. Petersburg, Florida.

G. SPECIAL MAPPING PROBLEMS

None.

H. MAP ACQUISITION

To discuss any questions concerning these maps or to place a map order, please contact:

John Hefner
Regional Wetland Coordinator
U.S. Fish and Wildlife Service - Region IV
R.B. Russell Federal Building
75 Spring Street S.W.
Atlanta, GA 30303

To order maps only, contact:

National Cartographic Information Center
U.S. Geological Survey
National Center
Reston, VA 22092

Maps are identified by the name of the corresponding USGS 1:24,000 scale topographic quadrangle name. Topographic map indices are available from the U.S. Geological Survey.

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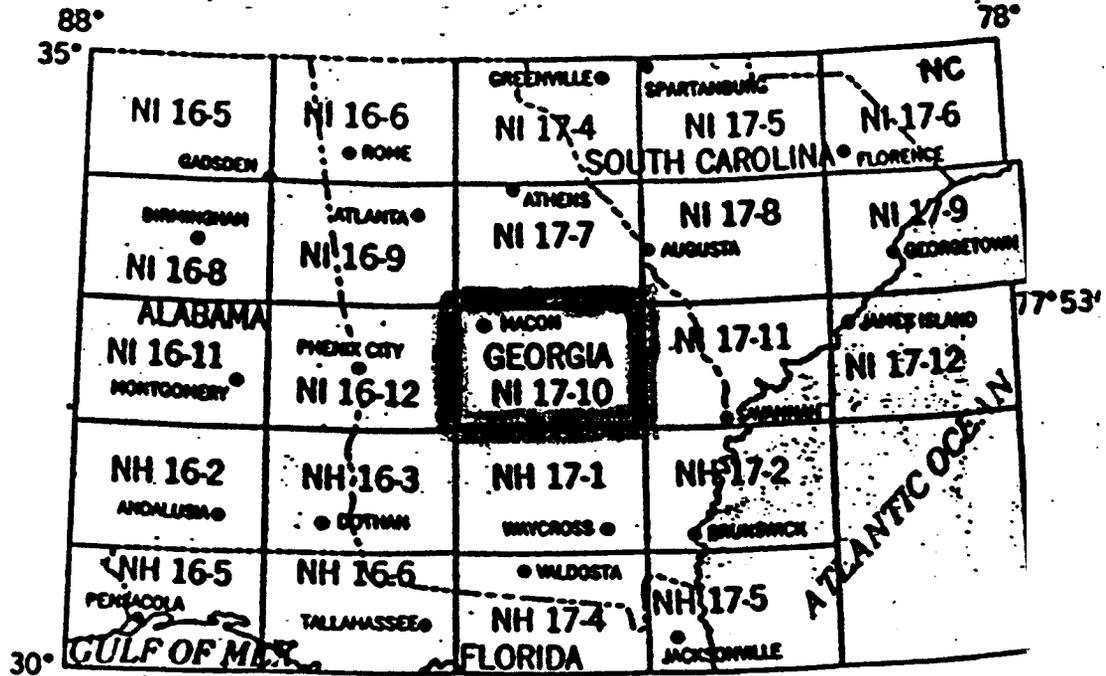
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Appendix A. 1:250,000-scale Index Map



U.S.G.S. Topographic Quad Index Map

