# Southeast Mixed and Outer Coastal Plain Forest

#### **Physical description**

The terrain is rolling hills to mostly flat. Marshes, lakes, and swamps are numerous along the Coastal Plain. The average annual precipitation ranges from 40 to 60 inches. Precipitation is received throughout the year. Summers are hot and winters are mild.

### **Dominant vegetation**

The final stage of succession usually consists of deciduous trees, such as oaks, hickories, American beech, blackgum, red maple, redbay, Southern magnolia, laurel oak, and American holly. However, on many upland sites, especially where prescribed fire is used, longleaf or loblolly pine are often the principal overstory species. Fire suppression has decimated the longleaf pine ecosystem to a fraction of its former range throughout the ecoregion. Planted loblolly pine is widespread over much of the ecoregion, but without fire and judicious thinning, the value of loblolly plantings for wildlife is low. Gum and cypress are dominant on moist areas along the Atlantic and Gulf coasts and along major river drainages. Midstory trees throughout much of the ecoregion include dogwoods, American hornbeam, redbud, sweetbay, titi, and shadbush. Native forbs and grasses commonly found include lespedezas, partridge pea, ragweed, pokeweed, bluestems, paspalums, wiregrass, povertygrass, and many others. Vines, such as Virginia creeper, trumpet creeper,



grapes, yellow jessamine, and greenbriar, are common. Shrubs include sumacs, viburnums, elderberry, wild plum, blueberry, blackberry, hawthorns, and wax myrtle.

Typical nonnative invasive plants in the Southeast Mixed Forest include bermudagrass, bahiagrass, cogongrass, kudzu, Japanese honeysuckle, privets, Japanese climbing fern, chinaberry, tree-of-heaven, mimosa, and popcorntree.

### **Farming and ranching**

Many wetlands along major rivers have been drained and forests cleared to grow crops such as cotton, tobacco, soybeans, corn, and other grain crops. Large areas of forests also have been cleared and planted to nonnative grasses, especially bermudagrass and bahiagrass, for livestock. Unfortunately, most of these are not beneficial for wildlife.



Mature pine stands, especially longleaf, are best managed by thinning to a predetermined basal area, which allows better tree growth and a diverse understory. Prescribed fire is used to manage the composition and structure of the understory.

#### **Plant succession**



Annual forbs and grasses represent the initial successional stage. Here, a strip was disked in a field dominated by perennial native warm-season grasses to enhance brooding cover for northern bobwhite. Note the common ragweed and open ground space in the disked strip (center) as compared to the relatively dense native grass on the right.

Perennial forbs and grasses represent the second successional stage.





The second successional stage slowly gives way to the third. Broomsedge bluestem, blackberry, goldenrod, and other forbs commonly succeed to sweetgum, red maple, loblolly pine, and eastern redcedar. This transition provides excellent cover for northern bobwhite, loggerhead shrike, and eastern cottontail.

Various shrubs (such as wild plum) and trees (such as eastern redcedar, sweetgum, and winged elm) represent the third successional stage. Planted loblolly pine stands often represent a third successional stage. Longleaf pine also represents a third successional stage. Longleaf pine is maintained with frequent prescribed fire, which prohibits succession from advancing further.





Mixed hardwood forest dominated by various oaks, hickories, maples, and sweetgum represent the fourth successional stage. Loblolly, shortleaf, and Virginia pine are often a component in these forests. More shade-tolerant species, especially American beech and American holly, become more prevalent in stands that are not disturbed with prescribed fire. Unmanaged forests often lack a developed understory, such as seen in this picture.





Planted pines, especially loblolly, are common across the Southeast. Early successional vegetation is provided for a few years until the canopy of the pines closes. These pictures show the same loblolly pine stand 4 years after planting and 8 years after planting. Although it is the same loblolly pine stand, the wildlife species found in this stand 4 years apart are quite different because the structure of the stand has changed dramatically.

## Wildlife associated with Southeast Mixed and Outer Coastal Plain Forest

barred owl loggerhead shrike mourning dove northern bobwhite prothonotary warbler red-cockaded woodpecker red-eyed vireo wild turkey wood duck coyote eastern cottontail eastern fox squirrel raccoon white-tailed deer wild pig American alligator eastern indigo snake gopher tortoise channel catfish largemouth bass American bumble bee monarch butterfly