

WHERE DOES RESEARCH FIT IN?

Native or Exotic Plant Species

Most forage crops for cattle are non-native plants: Alfalfa, fescue, bahia grass and crimson clover, to name a few. The species most often listed as beneficial for turkeys and quail are native plants. But it may be important what you plant AND where you plant it. The area in



the closely planted rows of trees may provide an excellent opportunity to plant native forbs and grasses for food, roosting, and brood cover, while the large open areas between tree rows can be used for cattle grazing. But will such defined, isolated spaces encourage full use of your acreage? How might the landowner vary the cover plantings to provide interconnected spaces? Conversely, would it be profitable to use these native species plantings as harvestable seed sources rather than as wildlife habitat? Research can answer these questions.

Economics

Effects of tree spacing on longleaf pine crown development and wind firmness need to be determined. Landowners also need to know their marketing options and if pruning will maintain the wood quality expected of longleaf pine products in these widely spaced trees.

Pine Straw Production

Longleaf pine straw is a high quality, popular mulch for landscaping. When trees reach 8-10 years of age, pine straw can be harvested from



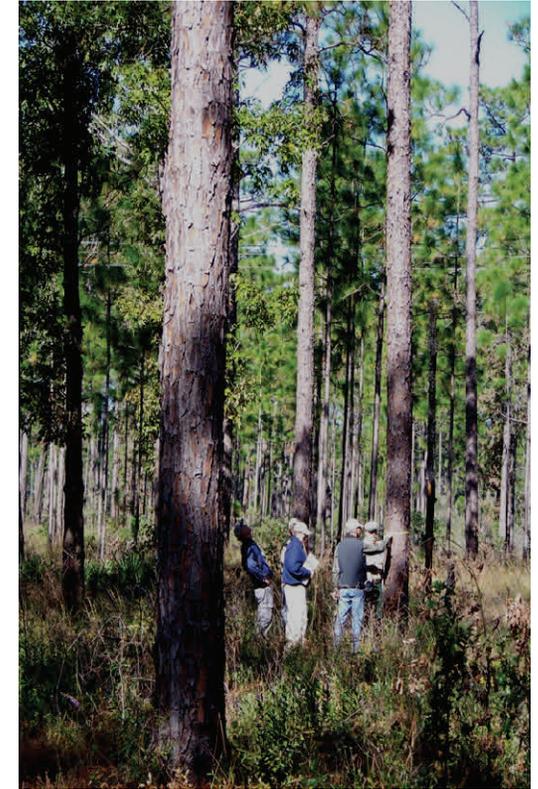
silvopasture interspaces. To obtain higher prices, mulch must be “clean”, free of cones and debris. Herbicides can eliminate shrubby plants and grasses, but how might they affect cattle forage and native wildlife plantings? Prescribed burns will clean the stands but when should they occur to avoid harming the wildlife you wish to encourage? Also, how can a landowner determine if raking pine straw affects tree growth on their acreage? Investing in research on silvopasture systems for southern landowners can answer these questions and increase the potential for economic success.

For more information Scan Here!



Website: <http://www.srs.fs.usda.gov/longleaf>
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LONGLEAF PINE SILVOPASTURE



RESTORING AND MANAGING LONGLEAF PINE ECOSYSTEMS

USDA Forest Service
Southern Research Station
SRS-RWU-4158



LONGLEAF PINE SILVOPASTURE

Many landowners are seeking alternative production systems that increase the profitability of their lands while allowing the property to remain in forests. Silvopasture is one such system. It combines growing high value timber with forage and domesticated animal production.



Silvopasture systems can be developed from existing natural stands, plantations, or from pasturelands. In addition to serving as income sources for landowners, such systems also benefit local communities. Improved water quality and soil conservation are but two of the environmental benefits of silvopasture.



HOW TO BEGIN

In the southeastern United States, landowners have many land management options from which to choose. Getting started requires a site survey and soil nutrient and moisture analyses. The savvy landowner will also have in-hand a market analysis and a sound business plan.



THE BASICS

Silvopasture systems require fewer inputs of fertilizer and herbicides than do standard agriculture production systems. However, if cattle, goats or other ruminants are in areas planted with young trees, the trees must be protected using fences or tree shelters. Tree spacing is also an issue: some research suggests that double rows of trees (10 feet apart) with wide inter-spaces (40 feet) provide more forage than if trees are evenly spaced over the entire property.



PRODUCTS

Cattle, Goats or Wildlife?

Silvopasture in the United States has primarily focused on production of beef cattle. But if growing space is limited, there are attractive alternatives. Goats, for instance, require less acreage; in addition to a meat source, they can be used in milk, cheese and fiber production.

Most silvopasture systems offer excellent opportunities for supporting local wildlife populations. Whether for game species or songbirds, management activities can be adapted to enhance habitat or forage for wildlife populations. Acreage involved may limit some larger species, and the landowner must consider effects of some larger animals on crop trees and other plant

species during the establishment phase. Quail and turkeys are ideally suited to silvopasture systems.

Different forage grasses for small birds could be planted in fenced tree rows and grazing animals could be rotated out of areas where birds are nesting and raising chicks.

