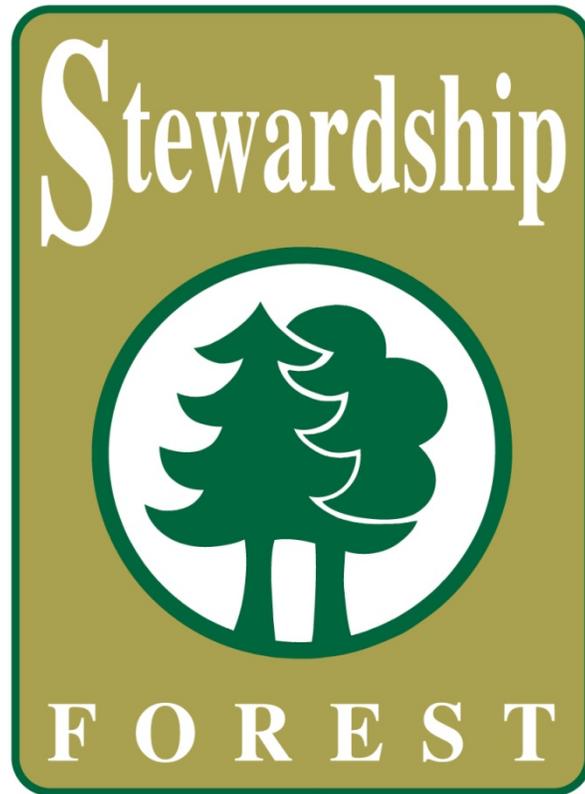


Forest Stewardship



Management Plan

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Gadsden County, Florida
June - 2016

Florida Forest Service
USDA Forest Service
University of Florida – Institute of Food and Agricultural Sciences
Private Natural Resource Consultants and Land Managers

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Location

This property encompasses 354 acres +/- in Gadsden County and is owned by Louisa Strader of Quincy, Florida. The property is located in southwest Gadsden County, approximately 4 miles southwest of Quincy, Florida in Section 69 of the Little River Survey. The central latitude and longitude is North 30.55 West -84.80, access to this tract is provided by Old Federal Road.

Management Objectives

The landowner's primary objective is wildlife management. Secondly, the promotion of quality timber habitat for local wildlife species is also important. Aesthetics, recreation, and soil & water conservation are also important objectives of the landowners. These goals can be most easily reached by utilizing management practices that benefit two or more resources at the same time. All of the management recommendations contained in this plan are compatible with Silviculture Best Management Practices for Florida.

A Summary of Management Objectives

Timber

Timber is an important agricultural crop. As a renewable natural resource, it is valuable in many ways, both to the economy and to the environment. This value extends from local benefits to the state and national levels. But as with any crop, it needs to be managed from its planting protocol to its harvest time. Then its management cycle begins again, with site preparation and replanting.

The timber management on the Strader Property will focus on periodic commercial harvests to provide income, while maintaining and/or improving forest health. The commercial harvests that will be conducted on the Strader Property will produce a variety of forest products including hardwood and pine pulpwood, pine chip and saw and pine logs. This management plan will prescribe timber harvesting, prescribed burning, mechanical treatments, and selective herbicide applications. The implementation of these practices will not only result in a high quality forest, but will also enhance wildlife habitat through increased diversity, as well as promote forest health.

The initial focus of the timber management on the Strader property is to conduct prescribed burning in the planted pine to improve overall forest health by reducing competing understory vegetation. Prescribed burning is recommended to be conducted on a two or three-year rotation to reduce hazardous ground fuel levels which will reduce the threat of wildfires; prevent hardwood encroachment; and improve recreational opportunities, forest health, wildlife habitat and aesthetics.

It is recommended that a Florida Certified Prescribed Burn Manager be present at all prescribed burns. The Florida Certified Prescribed Burn Manager must complete a written prescription and a smoke management plan for the burn area prior to ignition. The written prescription and the smoke management plan identifies the current and predicted weather conditions, fuel loads, vegetative communities, smoke sensitive areas, hazards and other pertinent information that help facilitate the burn. It is essential to have the most current weather information for the written prescription and the smoke management plan, therefore, these documents should be completed the day or morning before the prescribe burn occurs.

After the initial fuel levels are reduced in the pine stands by commercial harvests and/or prescribed burning, the continued use of prescribed fire on a 2 or 3 year rotation is recommended. Prescribed burning will provide new forage for wildlife enhancement purposes. The establishment of a perimeter fire line around stand boundaries will be necessary. Fire lines should be 8-16 feet wide and maintained by disking in late fall to winter or as needed.

Over the long term, selective timber harvesting and rotational prescribed burning of pine stands will also reduce potential attacks by pine beetles, which are serious and very destructive forest pests.

Herbicide and mechanical fuel reduction treatments are recommended to be implemented to control competing vegetation in areas where prescribed fire is not conducted or where prescribed burning has not produced the desired results. Please note that herbicide and mechanical fuel reduction treatments are generally more expensive than prescribed burning.

The Florida Forest Service plows fire lines for private landowners at an hourly cost. Requests for fire line plowing by the Florida Forest Service in Gadsden County can be made by calling (850) 681-5895. There are also many private vendors who plow fire lines. A listing of them can be obtained by request, or by going to <http://tlhfor013.doacs.state.fl.us/fsvd//>. To obtain a burn permit, call the Florida Forest Service in Tallahassee at (850) 681-5950.

Wildlife

Wildlife management on the Strader Property will principally rely on the use of standard silvicultural and wildlife management practices to improve the diversity of the habitat. White-tailed deer, turkey, and all animals that are listed as threatened or endangered are the primary species that this management plan will focus on, but numerous other game and non-game animals will directly benefit from planned forest management practices. The goal will be to develop a mosaic of various habitat types to promote wildlife enhancement.

The implementation of commercial timber harvests, prescribed burning and other fuel reduction treatments (i.e. tractor mowing) will be the primary silvicultural tools used to manipulate and improve habitat diversity. In general, the more diverse the property is, the better the wildlife habitat will be. Areas where wildlife habitat is considered adequate should be maintained and the areas that are not considered adequate should be improved, as time and money allow. By creating a mosaic of different forest and wildlife habitat types, improved populations of turkey, white-tailed deer, as well as other game and non-game species will be produced.

All standing dead trees or “snags” that will not present additional hazards when prescribed burning should be left standing to decompose naturally for wildlife enhancement purposes. Many different animal species depend on “snags” to sustain their life cycle. Some studies estimate that the removal of these standing dead trees will decrease the habitat for up to 20 percent of the animals found in this ecosystem. The trees provide hollow cavities for bats, birds, squirrels, snakes and raccoons to live. The trees also attract insects, mosses, lichens and fungi, which provide a food source for many animal species. The higher branches of the trees provide predatory birds a place to nest and to locate and stalk prey.

The establishment of new fire lines on stand boundaries will produce natural transition zones for wildlife and also provide easier access throughout the property for wildlife, especially deer. Fire lines should be 8-16 feet wide and maintained by disking in late fall or winter. Fire line maintenance during this time period will also aid the production of favorable native vegetation, such as ragweed and partridge pea, for wildlife habitat enhancement. If possible, fire lines should not be located on interior roads; this exclusion will prevent soil erosion and allow the roads to grass over. It is recommended to maintain forest roads periodically by mowing to enhance brood-rearing habitat for turkey; however mowing should not be conducted during nesting season (March-June) for turkey and quail.

The installation and maintenance of permanent openings on the Strader property is recommended for wildlife enhancement purposes. Existing logging ramps/loading areas can be “cleaned-up” or other areas may be used for this function.

No threatened or endangered species (T & E) were noted during the initial land reconnaissance. Species that have been observed (directly or indirectly through tracks) include white-tailed deer, wild turkeys, hawks, and various songbirds. Within **Appendix 2** is a list of T&E species that may be present in Gadsden County. All recommendations within this plan are conducive to T&E species management.

Recreation

The Landowner’s recreational pursuits, such as, hunting and wildlife viewing, will be influenced greatly by the success of good wildlife, and timber management that benefits multiple resources. The landowner also enjoys walking the land. Primary practices needed to enable continued recreational use include maintenance of firelines, prescribed burning, and wildlife opening management. Properly managed firelines can increase access. Prescribed burning of the pine stands and into the edge of the hardwood bottoms will keep the land accessible and encourage the habitat needed for game and hunting. Maintaining the wildlife openings will also draw wildlife to the property.

Aesthetics

The aesthetics of this property are highly valued by the landowners. The implementation of mowing, mulching, prescribed burning, herbicide applications, reforestation and timber harvesting on the property will improve aesthetics, while improving overall forest health. Timber harvesting and prescribed burning may have a temporary negative impact on aesthetics, especially clear-cuts. It should be kept in mind that these are actually regeneration cuts because pine is a pioneer species and they allow for a new forest (pine) to be created.

Even with the conduction of prescribed fire, areas of the property may require mechanical treatments and /or herbicide treatments to control undesirable vegetation. If necessary, the understory in areas can be controlled by mowing with a “bush hog”, mulching with a “gyrotrack” and/or by ground (tractor) herbicide treatments. The reduction of undesirable vegetation in areas can also be accomplished by hand (chainsaw) or backpack spraying with an herbicide. When conducting broadcast herbicide applications, care should be taken to preserve large, desirable hardwood trees, such as live oaks. It is recommended to use only contact (non-soil active) herbicides when spraying around or underneath the canopy of large desirable trees. Two excellent contact herbicides that are commonly used in forested settings are glyphosate and triclopyr. These are commonly marketed as Round Up and Garlon, respectively, and they can be tank mixed with each other or other forestry herbicides. No historical sites or artifacts have been located in the area.

Soil & Water

The featured soils on this property will be grouped into the ecological community which is historically associated with each.

Table 1: Soil Summary
Located in Addendum B, C

Stand Management Descriptions and Recommendations

Stand 1 Cutover Pine 1 ac.

Description

This area was recently cleared of small diameter pine trees. It consists of grass and a few shrubs. The site is currently wide open.

Recommendations

The landowner would like to replant this open area in Loblolly Pine. In order to get this site ready to replant site preparation needs to be done. Site preparation should include an herbicide application followed by prescribed fire, harrow operation and then hand planted for best results. Some particular herbicide mixture’s should be recommended and applied by a professional herbicide contractor if needed. This field is always changing with constant research and new chemicals being introduced. The mix that is used should contain a chemical primarily to kill hardwoods, especially sweetgum. Application should be made before the fall’s first frost. A site prep burn may take place a minimum of 6 weeks after herbicide application. Trees can be planted without burning; however, burning will free up nutrients more quickly for uptake by newly planted trees and make the site more accessible. A longer time period between herbicide application and burning or planting is recommended. The longer the period between application and the next silvicultural practice, the more effective the herbicide treatment will be. In no case should planting be done less than 6 weeks after herbicide treatment.

Trees can be planted by hand or V-blade planter. Pine should be planted with an average stocking of 726 trees per acre. Depending on the effectiveness of the site prep herbicide, a post planting herbicide treatment may be recommended. This is usually done by hand spraying making it more cost effective, however, if the trees were hand planted it would be better to get a broadcast spray.

Stand 2 Pond 5ac.

Description

This area is a manmade pond which is a special area to the landowner because of its gorgeousness. It had a few trees that bordered the pond but the trees were removed during the timber harvest. The pond is stocked with fish that bring satisfaction to Mr. and Mrs. Strader and their guest.

Recommendations

This area's beauties should be kept by keeping area clean of trash or any other debris. Also mow in areas that need to be mowed. This area will not require a lot of maintenance. Just keep watch of any unwanted vegetation in the water.

Stand 3 Home Site 8ac.

Description

This area is comprised primarily of Mr. and Mrs. Strader's home. They have a few other storage areas for other equipment they have. Both of the home sites are kept up, and very well maintained.

Recommendations

These areas will only require mowing when needed. Also road maintenance if necessary due to the fact of the road being sandy. Mr. and Mrs. Strader have a power line that comes thru the property. This will just need to be monitored for fallen trees on the power line.

Stand 4 Food Plots 14ac.

Description

There are 5 permanent openings on this tract. They total 14ac. These openings have 5 distinctive names Colorado, Dove Field, Turkey Bottom, Quail Patch, and Owl Woods. These openings provide an important addition to the otherwise forested habitat on this property. Depending on the overall landowner objectives, to manage more or less intensively for wildlife, these openings should be maintained by one of two methods that follow. The least intensive method of maintaining these openings for wildlife is to disk about half of the openings each winter, alternating so that a given plot is disked every second winter. This management will maintain the opening and promote the best native broadleaf plants and seed producers for wildlife. A more intensive method of managing openings that will likely attract more game

species while also benefiting many non-game species is to manage with planted wildlife crops. Both warm and cool season crops can be planted on these sites with expected good success.

Recommendations

Wildlife management on this property should involve the application of several practices that promote habitat diversity and availability. Important habitat management practices include retention and maintenance of desirable bottomland hardwoods, prescribed burning, and management of the fireline network. The use of each of these practices, in combination, should result in a property that provides increased utilization by both game and non-game wildlife.

Prescribed burning improves wildlife habitat by promoting the growth of new, tender vegetation at ground level. This is in response to a reduction in old, hardened plant material and a recycling of nutrients. The new vegetation is utilized directly by deer, and many small mammals, while turkey and other birds prefer the nutritious seed produced by these native plants. A positive, indirect effect is an increase in insects, such as grasshoppers and crickets, which are drawn to the fresh plants. These insects serve as a critical food source for young birds, including turkey. It is best to diversify the ground level vegetation by burning various burn units during alternate years. In addition, properly managed firelines can supply quality wildlife habitat. These firelines can be maintained by disking during the winter months with a regular farm tractor. Winter disking is best for it avoids disturbance to ground nesting birds and small mammals and promotes native vegetation with higher wildlife value than disking during other times of the year. Information on food plots can be found at the end of this plan.

Rare, threatened and endangered species, which are found in Gadsden County, are listed in the **Appendix 2**.

Stand 5 Scrub Oak Sand Pine 38ac.

Description

This stand sits on a sandhill. This xeric community is dominated by an overstory of widely spaced, scattered Sand pine, and a small quantity of Longleaf pine. It has an understory of turkey oak, sand post oak. The park-like ground cover consists of various grasses and herbs, including wiregrass, lopsided Indian grass, bluestems, blazing star, partridge pea, beggars tick, milk pea, queen's delight, and others. Due to the poor water retention properties of the soils and open canopy, temperature and humidity fluctuate rapidly and frequently in this habitat compared to high moisture closed-canopy forests.

Recommendations

This area has been absent of fire for some time. There seems to be insufficient amount of fuel on the ground to carry a prescribed burn. If a burn was done it would be very mosaic. Two recommendations can be made. One is to start a burn rotation of every 2-3 years. Or let the sandhill site continue to grow, and regenerate naturally.

Stand 6

Planted Loblolly Pine

42ac.

Description

This stand is scattered across the northern section of this tract. At approximately 42 acres +/- this stand is the only pine stand on the property. The pine overstory consists of approximately 15-20 year old loblolly pine that range from 40 to 65 feet in height. The midstory and understory consists of sweetgum, blackberry briar, sweet bay, grape vine, smilax vines. This stand was just recently row thinned with selection in the summer of 2015. The thinning removed every third row of planted pine for logging access, along with few of the diseased, defective, and suppressed trees in the remaining rows.

Recommendations

The first prescribed burn in this pine plantation was conducted 7-8 years ago with a relatively cool "backing" fire. Prescribed burning is recommended to be conducted on a two or three year rotation starting next winter of 2016.

Due to the amount of competing vegetation in the understory and midstory of this pine plantation and the varying amount of pine stocking (pine trees per acre) throughout the stand, it is recommended to wait to conduct the next thinning harvest until the competing vegetation is reduced to acceptable levels. Future timber harvesting will decrease the overall amount of ground fuel (pine needles) that is available to accomplish successful prescribed burning.

It is recommended to evaluate the timber to be selectively harvested following a few prescribed burns that is scheduled to be conducted. The selective thinning is recommended to target and remove the diseased, defective, suppressed trees and trees for spacing, leaving the dominant and co-dominant trees in the stand to grow into higher valued products (logs and poles), resulting in a residual stocking level of approximately 45-50 square feet of basal area per acre. After conducting the second selective harvest, it is recommended to wait 5-7 years before the final harvest. When the clear-cut harvest is conducted, the harvest areas should lie fallow for at least a full growing season to allow the hardwood stumps to adequately re-sprout. Once this time period has elapsed, the areas should be sprayed with a forestry herbicide, roller chopped and prescribed burned to prepare the site for planting.

Stand 7

Bottomland Hardwoods 246ac. +/-

Description

This area is a bottomland hardwood forest that is located adjacent to Bear Creek. The over story of the stand is a mixture of assorted oaks, hickory, sweetgum, and red maple with an understory of Vaccinium sp., ironwood, ti-ti, low shrubs, grape vines and native grasses. It is bisected by intermittent and perennial streams that feed into the Bear Creek system. Bear Creek is a major water resource in the Southern section of Gadsden County. Also good structures of trails lead to the creek, and other areas around the property. That created a more open and aesthetically pleasing ecotone between the upland pines dominated stands and the hardwood dominated stream-bottom

Recommendations

From the standpoint of timber production, hardwood timber has the lowest market value of timber products in the area. Therefore, unless markets become more appealing, the stand should be maintained as is with no plans for operations in the foreseeable future. This is particularly important around erodible areas around the property. This portion of the stand is moderately steep creating the necessity for careful adherence to BMPs. Special care should be taken when doing any activities with heavy equipment and a minimum SMZ of 60 feet on each side of the gully is recommended. Maintaining permanent forest cover will provide soil stabilization, and will also protect water quality, wildlife habitat, and aesthetic values. Currently, maintaining the stand for these objectives is a higher value to the landowner than the value of a timber harvest. The mast produced by this stand and the associated layered forest canopy cannot quickly be replaced. This type of cover is favored by deer and turkey especially.

Table 2: Operations Schedule for 2015-2025

Stands	Year	Month/Season	Treatment
All Stands	All	Winter or as needed	Install/maintain fire lines where possible
Stand 2,3	All	Any	Maintain as needed
Stand 7	All	Any	Monitor for any needed management
Stand 4(Food Plots)	All	Any	Disk/Plant
Stand 1	2016	Fall through Winter	Site Prep (Spray, Burn, Harrow, Replant)
Stand 1	2017	Summer to Fall	Post plant Herbicide (if needed)
Stand 1	2025	Winter	Prescribe burn (if needed)
Stand 6	2016, 2019, 2022	Winter	Prescribe burn
Stand 6	2025	Any	Monitor for 2 nd thin
Stand 5	All	Any	Maintain as needed
OR Stand 5	2016, 2019	Winter	Prescribe burn
OR Stand 5	2022, 2025	Spring	Prescribe burn

Appendix