Vision • Commitment • Pride

FOREST STEWARDSHIP MANAGEMENT PLAN

Prepared For: Natchez-Adams School District

> Prepared By: Charles Wellborn MFC

Time Period Covered by This Plan: 2012 - 2021

Date Plan Prepared: 2012-01-24

Plan Type: Stewardship / Stewardship

This plan was developed in accordance with the rules of the Stewardship program.

Property Name: 11-T3N-R5W

TABLE OF CONTENTS

LANDOWNER INFORMATION	3
FORESTER INFORMATION	3
DISCLAIMER	3
INTRODUCTION	3
OBJECTIVES	4
PROPERTY DESCRIPTION	4
SOIL TYPES	5
GENERAL PROPERTY RECOMMENDATIONS	6
STRATA	8
PLAN MAP	11
PLAN MAP	12
STRATA ACTIVITY SCHEDULE	13

LANDOWNER INFORMATION

Organization: Natchez-Adams School District
Name: Natchez-Adams School District

Mailing Address: P.O. Box 1185

City, State, Zip: Natchez, MS 39120 Country: United States of America

Contact Numbers: Home Number:

Office Number: 601-445-2815

Fax Number:

E-mail Address:

Social Security Number (optional):

FORESTER INFORMATION

Name: Charles Wellborn, Adams-Wilk. Service Forester

Forester Number: 00446 Organization: MFC

Street Address: 75C Carthage Point Rd. City, State, Zip: Natchez, MS 39120

Contact Numbers: Office Number: 601-442-0472

Fax Number:

E-mail Address: cwellborn@mfc.state.ms.us

PROPERTY LOCATION

County: Adams Total Acres: 427 Latitude: -91.62 Longitude: 31.23

Section: 11 Township: 3N Range: 5W

DISCLAIMER

This information was derived from a small sampling of the forest resources. It reflects a statistical estimation that is only intended to be accurate enough for the purposes of making decisions for the short-term management of these resources. Events and circumstances may occur within the survey area that will physically alter the forest resources and therefore will not be reflected in this plan.

INTRODUCTION

This Forest Stewardship Management Plan will serve as a guide for accomplishing the goals and objectives for your property. In addition to addressing your specific goals and objectives, this plan includes recommendations for maintaining soil and water quality and protecting your forest from insects, disease, and wildfire. Recommendations are based on observation and assessment of the site.

OBJECTIVES

Timber Production

The goal is to produce high quality sawtimber. This will be accomplished through reforestation and timber stand improvement practices such as herbicide applications, prescribed burning, thinning at specified intervals, and other silvicultural practices. Forestry Best Management Practices will be implemented to prevent erosion and protect water quality.

Wildlife Management - General

The goal is to provide a diversity of habitats suitable for a variety of game and non-game wildlife species. Habitat management will focus on developing a variety of food, cover, water, and space. This will be accomplished by establishing and maintaining access roads and firelanes, providing openings within the forest, and the management of trees located within the Streamside Management Zone.

PROPERTY DESCRIPTION

General Property Information

This section, containing approximately 427 acres, is in the extreme southern portion of the county in the flood plain of the Mississippi River. Access is through Wilkinson County and Fort Adams. Subject to periodic river flooding, access is limited and sometimes restricted due to high water. A public road leads to and through the section.

The terrain, being in the flood plain, is basically flat with numerous sloughs and depressions that hold water much of the year on these heavy clay soils which are poorly drained. With nearly level terrain, logging conditions are good during the drier periods of the year. However, due to flooding as previously stated, access is limited and at times impossible.

History - The last regular timber sale was a select thinning on 320 acres in 1982-83. Approximately 38 acres of open fields were planted in 1991 with Nuttall oak and ash. A salvage sale was made on 50 acres (Stand 17) east of Kienstra Lake. The following year, cypress and green ash were planted on 50 acres and all cull trees and undesirable species were chemically injected. Boundary lines were painted in 1999.

Archeological or Cultural Resources

No arecheological or cultural resources were identified during a reconnaissance of this property.

Water Resources

The Mississippi River is the west boundary of the section and approximately 71 acres of sloughs, drains and lakes are inside the boundaries of this section. Intermittent streams and drains identified will be managed in accordance with Mississippi's Best Management Practices.

Timber Production

The goal is to maximize the production of high quality timber. This will be accomplished through the application of timely thinning and other silvicultural practices designed to enhance timber quality and growth. Forestry Best Management Practices will be implemented to prevent erosion and protect water quality.

Threatened and Endangered Species

No threatened and endangered species were identified during the reconnaissance and evaluation of your property.

Interaction with Surrounding Property

Prescribed practices should be carried out in a manner that will minimize adverse impacts on surrounding properties. Consideration should be given to potential air, water, visual, and other impacts. In addition, practices carried out should have positive effects on the surrounding community such as improved wildlife habitat and soil stabilization.

Soils General

Soils were evaluated on the property to determine the suitability of the site for the proposed activities. Forest practices were planned so as to minimize erosion or other adverse effects on the soil. The following soils are identified for this property:

SOIL TYPES

Water

Generated brief soil descriptions are created for major soil components. The Water area is a miscellaneous area.

Commerce

The Commerce component makes up 90 percent of the map unit. Slopes are 0 to 1 percent. This component is on flood plains. The parent material consists of loamy alluvium. Depth to a root restrictive layer is greater than 60 inches. The natural drainage class is somewhat poorly drained. Water movement in the most restrictive layer is moderately high. Available water to a depth of 60 inches is very high. Shrink-swell potential is moderate. This soil is occasionally flooded. It is not ponded. A seasonal zone of water saturation is at 33 inches during January, February, March, April, December. Organic matter content in the surface horizon is about 2 percent. Nonirrigated land capability classification is 5w. This soil does not meet hydric criteria.

Sharkey

The Sharkey component makes up 44 percent of the map unit. Slopes are 0 to 2 percent. This component is on backswamps. The parent material consists of clayey alluvium. Depth to a root restrictive layer is greater than 60 inches. The natural drainage class is poorly drained. Water movement in the most restrictive layer is low. Available water to a depth of 60 inches is moderate. Shrink-swell potential is very high. This soil is frequently flooded. It is not ponded. A seasonal zone of water saturation is at 12 inches during January, February, March, April, December. Organic matter content in the surface horizon is about 2 percent. Nonirrigated land capability classification is 5w. This soil meets hydric criteria.

The calcium carbonate equivalent within 40 inches, typically, does not exceed 3 percent. The Tunica component makes up 33 percent of the map unit. Slopes are 0 to 2 percent. This component is on alluvial plains. The parent material consists of clayey alluvium derived from sedimentary rock over loamy alluvium derived from sedimentary rock. Depth to a root restrictive layer is greater than 60 inches. The natural drainage class is poorly drained. Water movement in the most restrictive layer is low. Available water to a depth of 60 inches is moderate. Shrink-swell potential is moderate. This soil is frequently flooded. It is not ponded. A seasonal zone of water saturation is at 27 inches during January, February, March, April. Organic matter content in the surface horizon is about 2 percent. Nonirrigated land capability classification is 5w. This soil meets hydric criteria.

Crevasse

The Crevasse component makes up 90 percent of the map unit. Slopes are 0 to 2 percent. This component is on flood plains. The parent material consists of sandy alluvium deposits. Depth to a root restrictive layer is greater than 60 inches. The natural drainage class is excessively drained. Water movement in the most restrictive layer is high. Available water to a depth of 60 inches is very low. Shrink-swell potential is low. This soil is frequently flooded. It is not ponded. A seasonal zone of water saturation is at 57 inches during January, February, March, November, December. Organic matter content in the surface horizon is about 1 percent. Nonirrigated land capability classification is 5w. This soil does not meet hydric criteria.

Convent

The Convent component makes up 41 percent of the map unit. Slopes are 0 to 2 percent. This component is on natural levees, flood plains. The parent material consists of alluvium. Depth to a root restrictive layer is greater than 60 inches. The natural drainage class is somewhat poorly drained. Water movement in the most restrictive layer is moderately high. Available water to a depth of 60 inches is very high. Shrink-swell potential is low. This soil is frequently flooded. It is not ponded. A seasonal zone of water saturation is at 33 inches during January, February, March, April, December. Organic matter content in the surface horizon is about 2 percent. Nonirrigated land capability classification is 5w. This soil meets hydric criteria. The calcium carbonate equivalent within 40 inches, typically, does not exceed 3 percent. The Bruin component makes up 31 percent of the map unit. Slopes are 0 to 2 percent. This component is on flood plains. The parent material consists of silty alluvium deposits. Depth to a root restrictive layer is greater than 60 inches. The natural drainage class is moderately well drained. Water movement in the most restrictive layer is moderately high. Available water to a depth of 60 inches is very high. Shrink-swell potential is low. This soil is frequently flooded. It is not ponded. There is no zone of water saturation within a depth of 72 inches. Organic matter content in the surface horizon is about 2 percent. Nonirrigated land capability classification is 5w. This soil meets hydric criteria.

GENERAL PROPERTY RECOMMENDATIONS

Forest Protection

A healthy vigorously growing stand is the best defense to an attack from a variety of forest insects, plants and pathogens.

Insects and Diseases

Trees are subject to attack from insects and diseases. Different insects and diseases affect trees according to the age, species, and condition of the trees. Planted stands of pines and pure stands of hardwoods are particularly susceptible to attack. Since there are many different insects and diseases, no attempt will be made here to explain all of them. The property should be inspected at least annually for possible signs of insect and disease activity. Some things to look for are:

- · Unseasonable leaf fall
- Discoloration of leaves or needles
- Pitch pockets on pine trees
- · Heavy defoliation of hardwood leaves
- · Groups of three or more dying trees within a stand

This list does not cover all instances of insect or disease attacks. If anything unusual is noticed, report it to a forester. In most cases, insect and disease problems can be controlled if discovered early.

Fire Protection

Your forest should be protected from wildfire at all times. The best way to protect your investment is by establishing and maintaining firebreaks around the property. Guidelines for establishment and maintenance of firebreaks may be found in Mississippi Forestry Commission publication #107, *Mississippi's Best Management Practices*.

Grazing

Tree seedlings should be protected from grazing until such time as the terminal bud of the sapling is beyond reach of livestock. Domestic livestock should be denied access to the tree planting area.

Boundary Lines

It is the responsibility of the landowner to ensure that all property lines and boundaries designating areas to receive forestry work are clearly identified and visible to all contractors.

Boundary lines are scheduled to be painted in FY 2014, 2017, and 2020.

Note: Some forest practices may cause temporary adverse environmental or aesthetic impacts. These practices will only cause short-term adverse impacts where they are installed. Special efforts will be made to minimize adverse effects when carrying out any of the practices. Examples include: site preparation, planting, prescribed fires, firebreak installation and maintenance, road installation and maintenance, pesticide applications and timber harvesting.

Water Quality Protection

The objective of the landowner is to protect, preserve and enhance all water sources on or transecting the property. This can best be achieved by implementation of Best Management

Practices in all aspects of the management of the property.

Wildlife Management General

The goal is to provide a diversity of habitats suited for a variety of game and non-game wildlife species. Habitat management will focus on providing a variety of food, cover, water, and space. This will be accomplished, in part, by establishing and maintaining access roads and firelanes, providing openings within the forest, and leaving mast producing and den trees.

Timber Management

Timber management goals for this property are to manage timber resources in such a manner as to maximize timber production throughout the life of the stand.

STRATA

Strata 1

Strata Description

Strata 1: Stand 17

Acres: 40

This area was planted with Nuttall oak and green ash seedlings in 1991. The area was previously open field. Other species such as cottonwood, sycamore, hackberry, and pecan have also become established. Due to flooding, these trees have not grown as well as expected.

Stand Recommendations

This stand will be managed for mixed hardwood production on a 55-year rotation. During this time, management activities such as thinning to remove poor quality trees and improve growth, and controlling undesirable species will be done to keep stands at full production.

Activity Recommendations

Technical

This stand should be inspected for a thinning in 2016.

Strata 2
Strata Description

Strata 2: Stand 21

Acres: 63

After flooding killed many trees in this area, a salvage sale was conducted. Undesirable species were injected and green ash and cypress seedlings were planted in 1996. Along

with some natural pecan regeneration, stocking is adequate. This area is low and flat and is flooded more than the rest of the section.

Stand Recommendations

This stand will be managed for mixed hardwood production on a 55-year rotation. During this time, management activities such as thinning to remove poor quality trees and improve growth, and controlling undesirable species will be done to keep stands at full production.

Strata 3
Strata Description
Strata 3: Stand 27

Acres: 152

The overstory of this stand is made up of mostly pecan, cottonwood, sycamore, hackberry and ash. The midstory is made up of mainly hackberry, ash, pecan and miscellaneous hardwood. The trees are mostly pulpwood size in fair to poor condition. This is a riverfront site and it is the best site on the section. However, the lake and a string of sloughs that run parallel to the river, prevent access to the area except during the driest weather.

Stand Recommendations

This stand will be managed for mixed hardwood production on a 55-year rotation. During this time, management activities such as thinning to remove poor quality trees and improve growth, and controlling undesirable species will be done to keep stands at full production.

Activity Recommendations

Harvest

An intermediate cut or thinning should be conducted in FY 2013 to maintain the growth of the stand. This would be a thinning from below where most of the trees to be cut would come from the lower crown classes. The large cottonwood would be removed since they are short lived. Most of the reserve and preferred growing stock would be left to grow.

Strata 4
Strata Description
Strata 4: Stand 22

Acres: 48

A well stocked stand of willow running parallel to the river occupies this strata. Since this stand is immediately adjacent to the river, it is the most frequently flooded and therefore is the most difficult to manage. This stand will be managed as a SMZ and may be thinned in conjunction with sales on Strata 3.

Stand Recommendations

This stand will be allowed to grow for the length of this plan and possibly some trees might be removed during sales on adjacent stands. It will managed as a streamside management zone (SMZ).

S11, T3N, R5W, ADAMS COUNTY- LEGEND



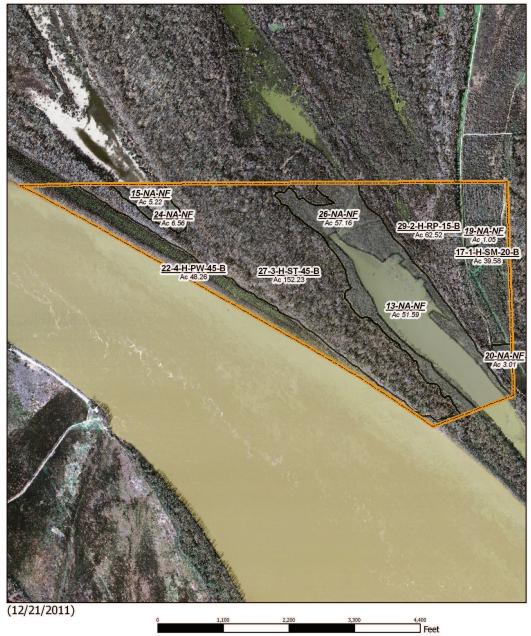


NATCHEZ-ADAMS SCHOOL DISTRICT



NATCHEZ-ADAMS SCHOOL DISTRICT
S11, T3N, R5W, ADAMS COUNTY, MISSISSIPPI
2012 to 2021
427 +/- ACRES





Stand Activity Summary for Natchez-Adams School District 11 3N 5W

Filters Applied: County: Adams

Client Class:
District:

Client: Natchez-Adams School Dis

STR: 11 3N 5W

Activity:

Year: 2012 Through 2021

STR	Strata	Stand	Activity	Acre	Est. Cost	Est. Revenue		
2013								
11 3N 5W	3	27	Harvest, Mechanical, Thin, Machine, Misc Hardwood	152	\$3,805.75	\$24,356.80		
			Yearly Totals	152	\$3,805.75	\$24,356.80		
2016								
11 3N 5W	1	17	Technical, Maintain, Update, Hand, Management Plan	40	\$120.00	\$0.00		
			Yearly Totals	40	\$120.00	\$0.00		
			Grand Totals	192	\$3,925.75	\$24,356.80		