

Suwannee River Water Management District

January 2019

2018 Land Management Report

9225 C.R. 49
Live Oak, FL 32060
386.362.1001

WATER FOR NATURE
WATER FOR PEOPLE



2018 Land Management Report
Suwannee River Water Management District

Governing Board

Virginia H. Johns, Chair
Alphonas Alexander, Vice Chair
Richard Schwab, Secretary/Treasure
Kevin W. Brown
Gary F. Jones
Virginia Sanchez
Donald J. Quincey, Jr.
Bradley Williams
Charles Keith

Executive Director

Hugh Thomas

CONTENTS

INTRODUCTION 1

GOALS OF THE 2018 DISTRICT LAND MANAGEMENT PLAN 3

SRWMD FY 2018 REPORT OF LAND MANAGEMENT PROGRAM ACTIVITIES 6

I. RESOURCE PROTECTION 6

II. PUBLIC USE.....14

III. COMMUNICATIONS.....16

IV. FISCAL RESPONSIBILITY19

APPENDIX A SRWMD STATUTORY SUMMARY24

Americans with Disabilities Act: The District does not discriminate upon the basis of any individual’s disability status. This nondiscrimination policy involves every aspect of the District’s functions including one’s access to, participation, employment, or treatment in its programs or activities. Anyone requiring reasonable accommodation as provided for in the Americans with Disabilities Act should contact the District at 386.362.1001 or 800.226.1066 (Florida only). The District’s fax number is 386.362.1056.

EXECUTIVE SUMMARY

The 2018 Land Management Report is an annual overview of management objectives and activities conducted on fee-simple title lands held by the Governing Board of the Suwannee River Water Management District (District) during Fiscal Year (FY) 2018. The report is used by the District during the Land Management Review Team (LMRT) annual review of District lands which is required by Section 373.591, Florida Statute (F.S.). The report summarizes objectives of the approved 2018 Land Management Plan and generally follows its organizational format addressing key topics that provide information as to whether District lands are being managed for the purposes for which they were acquired and in accordance with land management objectives.

The report indicates an ongoing effort by District's land management program staff to include and participate in water resource related projects on District lands. It provides details and accomplishments on natural community resource projects which are designed to maintain or improve natural communities, forest resources, rare species, cultural, historical resources, and aesthetic and visual resources. It addresses social and economic management goals and activities which are key components of the land management program and include public use, communications and fiscal responsibility.

INTRODUCTION

The District jurisdictional boundary includes approximately 7,640 square miles across all or part of 15 north-central Florida counties.

The District holds fee-simple title to approximately 160,300 acres in addition to approximately 127,111 acres of conservation easements (3.3% and 2.6% of the District's land area, respectively) as of October 1, 2018. The District also hold less-than-fee title to approximately 888 acres of access easements.

District management of these lands provides water resource benefits including:

- Preserving floodplain areas to maintain storage capacity, attenuate floodwaters, and prevent inappropriate development,
- Preventing contamination by maintaining low intensity land uses within the floodplain and high recharge areas,
- Preserving and/or restoring spring areas to maintain or improve ground and surface water,
- Preserving and/or restoring natural communities throughout the area to support or enhance populations of wetland-dependent native species, and
- Providing buffer zones to more intense land uses to protect water quality.

The majority of the parcels are conservation lands that are located along rivers and streams, headwaters, and recharge areas. The District also purchases parcels for specific water resource projects such as wellfields, flood storage, water management, aquifer recharge, water resource development, water supply development, and preservation. These project lands are managed for the specific purposes as identified in the acquisition.

Lands titled to the District are managed under a multiple-use policy that emphasizes water resource protection, maintenance and restoration of the land's natural state and condition, and provisions for public access and recreation. Planning land management activities and uses at the ownership level allow for efficient and effective implementation of Governing Board priorities and achievement of goals. The following four goals are outlined in the District Land Management Plan (DLMP).

- Resource Protection
- Public Use
- Communications
- Fiscal Responsibility

To ensure the District is meeting its four land management goals, the Excellence in Land Management Program (ELM) was established in 2004. This program uses quantifiable data to measure and track qualitative goals. ELM is used in conjunction with the statutorily required annual LMRT evaluation. LMRT participants use the ELM scorecard to determine whether land management is meeting the goals of the DLMP by scoring the strategies used to achieve those goals.

Additionally, LMRT participants evaluate if the District is achieving its statutory requirements (section 259.036, F.S.) by scoring the following questions. , the LMRT must evaluate:

- Are District lands being managed in a manner consistent with the purpose for which they were acquired, including public access?
- Are District land managers implementing the DLMP?

GOALS OF THE 2018 DISTRICT LAND MANAGEMENT PLAN

Goal 1: Resource Protection

Objectives - ensure District lands are managed for natural resource protection and maintain/restore lands using natural community Desired Future Condition (DFC) guidelines when practical and as referenced in Appendix A of the DLMP.

Water Resource Strategies

- Minimize structural floodplain management on District-managed conservation lands.
- Maintain ground and surface water quantity and quality during land management activities by using enhanced silviculture Best Management Practices (BMPs).
- Restore hydrologic regimes to the DFC where possible.
- Maintain water management structures so they achieve their intended function.
- Develop and maintain water resource projects on the lands to improve water quality and enhance water supply.

Soils, Topography, Ground Cover and Natural Community Strategies

- Minimize soil degradation (erosion, compaction).
- Manage and/or restore historic natural communities for a given site to DFC standards to the extent practicable.
- Reduce degradation of the existing native groundcover.
- Monitor the grass, herbaceous and shrub layers to detect if the resource falls within the DFC standard acceptable range.
- Reintroduce or supplement current native ground covers with local stock where needed to achieve ecosystem functions.
- Update and maintain current reference data.

Forest Resource Strategies

- Manage for natural community heterogeneity to attain a multi-aged and vertically diverse forest, including retaining dominant and/or old growth trees and snags.
- Maintain the dominant and co-dominant tree species within the DFC acceptable parameter range.
- Reforest within DFC standards using techniques that minimize damage to other natural resources.
- Ensure that commercial harvests provide the maximum financial returns that are possible with the consistent attainment of primary natural resource values.
- Maintain an accurate and current forest resource inventory.

Rare Species Resource Strategies

- Protect and manage biodiversity on District lands.
- Track rare species locations, status, and use rare species BMPs.
- Maintain and/or increase existing rare and imperiled species populations on District lands.

Cultural and Historic Resource Strategies

- Protect and prevent negative impacts to cultural and historical resources during all activities.

- Document location of significant cultural and historical resources on District-owned lands and share information with the Division of Historic Resources within the Florida Department of State.
- Monitor the condition of cultural and historical resources on District-managed lands.

Aesthetic and Visual Resource Strategies

- Maintain or enhance overall visual quality of District lands.
- Minimize or mitigate short-term negative appearances of land management activities.

Goal 2: Public Use

Objectives - provide resource-based public use opportunities.

Public Use Strategies

- Establishing and maintaining public use on District lands.
- Provide Special Use Authorizations (SUA) for compatible public use activities.
- Follow Governing Board Directives 90-2 and 92-1 for exclusive use requests.
- Provide hunting and fishing opportunities on District lands.
- Coordinate with law enforcement agencies to enforce Florida statutes and administrative rules on District-managed lands.
- During emergency situations staff will assist persons in danger and communicate response with appropriate agencies.

Goal 3: Communications

Objectives - encourage participation from outside agencies, organizations and private citizens when developing management plans for the lands under its stewardship.

Communications Strategies

- Obtain public and private stakeholders input in the management of District lands.
- Use applicable modes of communication to encourage and promote public recreation on District lands.
- Ensure public inquiries into management activities or public use are addressed.
- Complete an annual land management report and conduct the annual LMRT following the guidance of DLMP.

Goal 4: Fiscal Responsibility

Objectives - minimize the costs associated with land management by contracting with the private sector, partnering with other land management agencies and organizations, and submitting proposals for land management grant funding.

Fiscal Responsibility Strategies

- Ensure revenues are derived from operations conducted to achieve land management objectives.
- Minimize structural operational management approaches wherever practicable.
- Contract with the most cost effective and experienced firms to complete land management activities following District policies.

- Coordinate with other land management agencies and organizations to complete land management activities to reduce District costs.
- Attempt to locate and obtain grants to help fund projects on District lands.
- Assist with the surplus lands program to ensure funds derived from the disposals of unneeded land holdings are redirected to fund the purchase of higher value, water-resource lands.

SRWMD FY 2018 REPORT OF LAND MANAGEMENT PROGRAM ACTIVITIES

I. RESOURCE PROTECTION

Goal - protect, enhance and/or restore natural, archaeological, and historical resources on lands owned by the District.

1. Water Resources

District lands provide unique water resource opportunities because of their proximity to major rivers and their tributaries. At the tract level, there may be opportunities to impact altered water flows and water retention capacities to allow more natural buffering characteristics of the floodplain, such as flood attenuation, to be enhanced and provide protection to the receiving water body. At the site level, many facilities such as river access points, hydrologic facilities and roads require review, construction and maintenance to function in the floodplain without adverse water resource impacts. The objective of facilities' design is to make them transparent to high- and low-flow conditions within the floodplain.

Natural community and facility projects are generally implemented using silviculture BMPs as a minimum standard for implementation. Silvicultural practices, natural community restoration projects, hydrological improvements and road maintenance operations are planned to protect or enhance water resources.

Specific Governing Board-approved water resource projects may be initiated for flood control, water storage, water management, conservation and protection of water resources, aquifer recharge, water resource, and water supply development. These projects typically require engineered solutions and have project-specific goals and management. In many cases, the water resource benefits are designed to extend beyond the tract.

Active Water Resource Projects

- *Silviculture Water Yield Research Project*
This project was completed in FY 2018 by the University of Florida. It was part of a statewide effort to advance the understanding of the impact of forest management practices on water yield, and whether this water is held in surficial systems or makes it way to the aquifer. The project, within the SRWMD, has five plots on District-owned lands at the Little River Tract, and Troy Springs addition, one plot on adjacent private land and six plots near the Gainesville wellfield on private land and Gainesville Regional Utilities land. The District is coordinating with the researchers to determine how and to what extent the results could be incorporated into District land management activities and District-wide water resource project planning.

- *Steinhatchee Springs River Access Project*
In FY 2018 the District completed a facilities construction project at four river access recreation sites in the Steinhatchee Springs tract. The purpose of the work was to reduce degradation from public use at the access locations. District staff and the public recognized (in particularly during the FY 2016 LMRT) that over time, the public use at the access locations have made the areas susceptible to erosion. Most of the concerns

were considered small to medium in scale. Much of the project consisted of installing concrete steps, regrading and stabilizing dirt parking areas with eco-path products, redirecting vehicle traffic, sodding, and installing wood-board fencing. These minor facility improvements and other erosion control measures should help further protect the valuable water resources while maintaining public access to the Steinhatchee River.

- *Underwater Cave System Research*
Many of the District lands contain springs, karst windows and other geologically significant systems for north Florida. The District has issued 2 temporary ingress and egress SUAs (2013 and 2015) for underwater cave system mapping and research to private research firms. The SUAs are for 12 separate tracts of land and are re-issued each year as the research continues. This research is at no obligation of cost to the District and the information obtained is being shared with the District.
- *Hydrological Facility Restoration Projects*
A total of 15 culverts and two low water crossings were improved in FY 2018. In the Steinhatchee Springs and Steinhatchee Rise tracts 11 damaged or destroyed culverts were replaced and repaired 2 low water crossing were repaired to remedy erosion problems along roads and reconnect hydrological flow between existing wetlands. In the Mud Swamp tract four 4 damaged or destroyed culverts were replaced to remedy erosion problems and reconnect hydrological flow of a seepage slope along the entrance road.
- *Monitoring Well Improvement Plan*
In 2014, the divisions of Water Supply and Water Resources identified groundwater monitoring data gaps areas throughout the District and developed a monitoring well network improvement plan to close the gaps. This plan included the installation of 25 new monitoring wells. Closing these gaps is essential for groundwater modeling improvements and long-term trend monitoring assessments. Land Management staff continues to assist and support Water Supply and Water Resources divisions in the installation of monitoring wells. It is expected the Improvement Plan will be completed in FY 2019.
- *Pot Springs Environmental Restoration and Enhancement Project*
In 2017, Springs funding was approved to restore the site. Improvements will consist of bank stabilization, access to the springs and improvements to limit erosion from uplands. Funding for this project will come from Florida Department of Environment Protection (FDEP) through the Pot Springs Restoration contract and the District. Currently, the project to underway and should be completed by the end of FY 2019.

2. Soils, Topography, Ground Cover and Natural Community

The District plans and implements land management operations to maintain and enhance natural resources. The District uses existing DFC standards as a guide to plan, implement and track natural community management/restoration activities. These DFCs detail plant community structure, representative plant species, average hydrologic regime, and the frequency of fire that is required to maintain the plant community. By using DFCs, the District determines if management activities are needed to “restore or maintain the natural condition” as directed by statute.

District lands that meet the DFC structural standards are maintained by natural processes (e.g. flooding events) or passive management. Most floodplains and wetlands are in this category. Natural communities that do not meet standards may receive active management (e.g. installation of hydrologic structures, prescribed fire, timber harvest, and reforestation) to move the community towards the defined community standards. Most uplands and transitional areas are in this category.

Active Natural Community Management and Restoration Projects

- *Prescribed Fire*

Many of Florida's natural plant communities were historically influenced by fire. Of those fire-adapted natural communities, the District's prescribed fire program targets sandhills, upland pine, scrubby flatwoods, mesic flatwoods and wet flatwoods communities for maintenance and restoration purposes. Combined, these targeted communities make up approximately 59,594 acres or 71% of the total acres that were historically influenced by fire.

The remaining 29% of fire-influenced communities on District lands consist of wetland natural communities such as shrub bogs, depression marshes and dome swamps. These communities are not actively targeted for prescribed burning. Fire is allowed to spread into these areas from adjacent communities that are being burned, but only when the risk is minimal for long-term smoke-management problems, mortality to wetland vegetation and prolonged organic soil consumption. When necessary, containment firelines are installed and maintained in such a manner as to avoid adverse impacts to wetlands, water resources or the public.

Within the five targeted natural communities, the District focuses most of its efforts on designated core areas. Factors used to distinguish many of these core areas include:

- Areas with a history of successful prescribed burns.
- Vegetation within these areas can easily be burned without other inputs such as mechanical or chemical treatments.
- Areas have undergone management activities that require the use of prescribed fire for continued maintenance or to complete a management prescription.

The District uses DFCs to determine the Fire Return Interval (FRI) for each community. These intervals are derived from information provided by the Florida Natural Areas Inventory (FNAI). These intervals are the rotation or the number of years that occur between each scheduled prescribed burn. The District's goal is to increase the number of targeted core areas that are within their FRI (Table 1).

Table 2 provides natural community acreage information for all non-targeted and targeted core areas. Acreage for targeted core areas is further separated to identify FRI status. For areas out of their FRI, information is also provided to help identify some of the factors affecting this status.

Table 1. FY 2018 Fire Return Interval and Burn Acreages on District lands

	2018	2017	2016	2015	2014
% Targeted Core Areas within Fire Return Interval	57%	51%	54%	53%	59%
Acres Planned	15,000	13,000	12,000	12,750	11,800
Acres Burned	18,065	6,398	12,528	8,919	13,581
Acres Burned That Met Objective	18,001	5,901	12,289	8,088	12,996
Wildfire Acres	0	29	54	25	0

Table 2. Fy 2018 Acres of fire maintained natural communities by classification

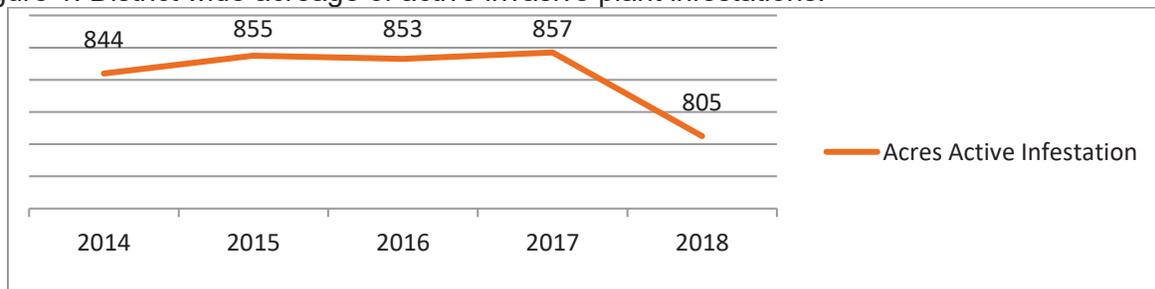
SRWMD Fire Maintained Communities	Acres	% of total
<i>Total Fire Maintained Natural Communities</i>	83,658	
Targeted Communities	59,594	71
Non-Targeted Communities	24,064	29
<i>Total Targeted Core Areas</i>	49,774	
Acres in FRI* (end of 2018)	28,493	57
Acres out of FRI (end of 2018)	21,281	43
<i>Total Acres Out Of FRI</i>	21,281	
Acres where pine density is too thick or stand age is too young to safely burn**	9,715	46
Acres within Mallory Swamp Wildlife Management Area	4,029	19
Remaining Acreage	7,537	35

*FRI is Fire Return Interval

**Stand age only applies to slash pine (*Pinus elliotii*)

- Invasive Plant Control (District staff):** In FY 2018, District staff monitored 133 invasive plant infestations; 84 of those infestations were treated with herbicides. Total infestation acreage decreased during FY 2018 (Figure 1). This decrease in acreage was the result of infestation areas decreasing in size after being re-surveyed by District staff. Fourteen infestations were reclassified from active to inactive which also decreased total acreage. Active infestations are reclassified as inactive when no remaining living plants are observed at/or within close proximity to the infestation for four consecutive years.

Figure 1. District wide acreage of active invasive plant infestations.



- *Invasive Plant Control (Contractors)*: Contractors are used to treat larger more complex areas of invasive plant infestations. Contracts for this work are either procured by District staff or through cooperating agencies when grants are pursued. Work completed in FY 2018 is listed in Table 3:

Table 3. FY 2018 Completed Invasive Plant Treatment Projects (Contractors)

<i>Work Location</i>	<i>County</i>	<i>Extent</i>	<i>Targeted Species</i>	<i>Contract Amount</i>	<i>Funding Source</i>
Lake Rowell	Bradford	76 acres	Japanese Climbing Fern, Chinese Tallow, Camphor tree	\$12,988.00	SRWMD
Edwards Bottomland	Bradford	32 acres	Japanese Climbing Fern, Chinese Tallow, Camphor tree	\$9,472.70	Grant from Florida Fish and Wildlife Conservation Commission

- *Vegetation Management (Mechanical)*
Mechanical treatments such as whole tree chipping, roller chopping, and woods mowing are used as tools to help meet natural community DFC objectives and prepare sites for reforestation. Work completed in FY 2018 is listed in Table 4.

Table 4. FY 2018 Completed Mechanical Vegetative Management Projects.

<i>Work Location</i>	<i>Work Type</i>	<i>Extent</i>	<i>Objectives</i>	<i>Funding Source</i>
Mallory Swamp	Roller Chop	908 acres	control woody vegetation; facilitate prescribed fire	Grant from Florida Forest Service
Jones Mill Creek	Mow	126 Acres	control woody vegetation; facilitate prescribed fire	SRWMD
Peacock Slough	Mow	99 Acres	control woody vegetation; facilitate prescribed fire	Grant from U.S Fish and Wildlife Service
Little Shoals	Mow	41 acres	control woody vegetation; facilitate prescribed fire	SRWMD
Ruth Springs	Mow	47 acres	control woody vegetation; release longleaf pine seedlings, facilitate prescribed fire	SRWMD

- *Vegetation Management (Chemical)*
The application of herbicides to control woody vegetation is a tool used to help meet natural community DFC objectives and prepare sites for reforestation. Work completed in FY 2018 is listed in Table 5.

Table 5. FY 2018 Completed Chemical Vegetative Management Projects

<i>Work Location</i>	<i>Work Type</i>	<i>Extent</i>	<i>Objective</i>	<i>Funding Source</i>
Mallory Swamp	Herbicide	189 miles	herbicide applied to ditch edges to control hardwood resprouts and facilitate prescribed fire by increasing fireline width.	SRWMD
Mattair Springs	Herbicide	332 acres	control hardwood resprouts; facilitate prescribed fire	SRWMD and Grant from U.S Fish and Wildlife Service

3. Forest Resources

- *Timber Harvests*

The District harvests timber resources to promote conditions that more closely resemble natural forests. Eight sales were offered; (Table 6) three stand conversion final harvests, two stand improvement pine thinnings, two timber salvage operations due to southern pine beetle infestations, and one sandhill restoration hardwood removal thinning.

Timber harvest objectives include:

- Reducing over story stocking to meet desired levels for the natural community,
- Improving forest health by removing poor health trees or stands, and
- Reducing species not native to the natural community.

Planning, advertising, contract oversight, timber sale security and financial reconciliation are part of this timber sale process.

Table 6. FY 2018 Acres of timber harvest and revenue as percent of reported sources.

	2018	2017	2016	2015	2014
# Acres Timber Sold	742	1,472	1,214	1,071	731
Total Value as a Percent of Published Florida Market Rate for Pine Products <i>(source: FL. Land Steward Newsletters)</i>	124%	115%	117%	114%	105%

- *Forest Resource Inventory*

Data was collected on 730 inventory plots during FY 2018. The data from these plots can be used to quantify the acres that have achieved their natural community goals and provide data for areas that could be improved by a timber harvest.

Additionally, during budget negotiations in FY 2018 District staff pursued project funding for needed improvements and updates to the forest resource inventory database. The Governing Board approved the implementation of this project at its December 2018 meeting.

4. Rare Species Resources

The District has procedures for identifying and avoiding detrimental impacts to imperiled species on its lands. Rare species are documented on District lands by surveys and opportunistic

observations. Species locations and rare species BMP information are maintained within a designated geodatabase.

To lower the potential for negative impacts on existing species occurrences, District staff consult the rare species GIS layer file and rare species BMPs before planning and conducting management activities. If potential impacts from management activities are identified, staff will locate and delineate occurrence areas to prevent potential conflicts. Management activities will also be adjusted if needed.

The District also conducts rare species survey and monitoring work on a periodic basis. This work is done to document the location of new species and to monitor the status of existing occurrences. In FY 2018, District staff conducted rare species survey and monitoring work on parts of the tracts listed in Table 7. All new occurrences documented in FY 2018 have been uploaded into the Districts rare species GIS layer file. All new occurrences documented in FY 2018 were listed as either state endangered, state threatened, or species of special concern.

Table 7. FY 2018 Rare Species Survey/Monitoring.

Survey Location	County	PLANT SPECIES		ANIMAL SPECIES	
		New Occurrences Added	Known Occurrences Monitored and Observed	New Occurrences Added	Known Occurrences Monitored and Observed
Peacock Slough	Suwannee	20	6	4	0
Steinhatchee Springs	Lafayette	29	0	0	0
Steinhatchee Falls	Taylor and Dixie	2	0	1	0

In FY 2018, The Florida Fish and Wildlife Conservation Commission also conducted Gopher Tortoise (*Gopherus Polyphemus*) line transect surveys on the Withlacoochee Quail Farm Tract in Madison County and the Little River Tract in Suwannee County. On the Withlacoochee Quail Farm Tract, 186 potentially occupied burrows were scoped, and tortoise density was determined to be 0.622/acre. Data for the Little River Tract was still not available and will be documented in the FY 2019 Report. All new occurrences documented during these surveys will be uploaded into the Districts rare species GIS layer file.

In addition to the rare species survey and monitoring work conducted in FY 2018, Special Use Authorizations were obtained from the District to conduct several types of biological research listed below in Table 8. Results of this research is still not available and will be documented in upcoming Land Management Reports.

Table 8. FY 2018 Biological Research Special Use Authorizations

<i>Research Location</i>	<i>County</i>	<i>Research Subject</i>	<i>Research Affiliation</i>
Double Run Creek tract	Bradford	The effect of land use changes on the dietary composition of bats	University of Florida
Mallory Swamp and Steinhatchee Springs tracts	Lafayette	Spotted Turtle (<i>Clemmys guttata</i>) population surveys	Florida Fish and Wildlife Commission
Mallory Swamp and Santa Fe Swamp tracts	Lafayette, Alachua, Bradford	Round-Tailed Muskrat (<i>Neofiber alleni ssp.</i>) population surveys	Florida Fish and Wildlife Commission

5. Cultural and Historical Resources

District lands have been reviewed for cultural and historical resources by a professional archaeologist. One hundred sixty-nine (169) known sites were found in the Florida Master Site Files of the Florida Department of State. Archaeological review determined that 26 sites should be classified as significant cultural sites due to the reported description of the site in the master site files. An additional 12 sites are monitored because of historical looting. Five (5) of these sites are monitored by cooperating agencies and are generally not inspected by District staff.

District staff attempts to monitor all 33 cultural resource sites annually (i.e. 23 significant sites and 10 historically looted sites) while working on other projects in the vicinity. Inspectors document any damaging impacts by recent looting or other activities. All documented impacts are provided to Florida Fish and Wildlife Conservation Commission (FWC) law enforcement. Table 9 indicates how many cultural sites were inspected by District staff and how many of those sites were recently damaged.

Table 9. FY 2018 Status of significant cultural resources sites.

Measures	2018	2017	2016
Number of 23 known significant cultural resource sites inspected	24**	12	7
Number of 12 known historically looted sites inspected	12	12	0*
Number recently damaged sites	2	6	1

*District staff did not document the inspection of these sites in FY 2016.

**District staff monitored 1 additional site located on lands managed by another agency.

The District follows "Protocol for Managing Cultural and Historical Resources on Suwannee River Water Management District Lands" to avoid damaging these resources. The most likely areas for cultural resources, based on the known sites, are classified "High Probability Zones" and are included as a GIS layer for planning purposes.

6. Aesthetic and Visual Resources

The consideration of the visual or aesthetic resources while managing property is a key component of the land management program. Every aspect from signs and facilities design to managing contractors and the public has visual impacts.

Key management strategies are to review every activity implemented on District lands and try to minimize short-term negative perceptions. Strategies included timing of the operation, minimizing debris or litter, utilizing timber that has been harvested and, in some cases, placing signs to explain the activity.

II. PUBLIC USE

Goal - to provide opportunities for high quality, compatible resource-based recreation and education programs to meet the public's needs while protecting water resources.

District lands provide many resource-based recreational opportunities. Of the 160,300 acres owned by the District, over 97% are open to the public for recreation. Planning for public uses and facilities takes into account the sensitivity of the site, the proximity of similar recreational opportunities, the time, and financial requirements to provide the use, and public demand for the use. Within the DLMP the District provides the public with a Public Use Standard which lists allowable recreational uses approved by the Governing Board by tract, including uses that require a Special Use Authorization (SUA).

Conservation lands not open to the public are tracts located in gated communities or where access is otherwise restricted, rendering them closed to the public. Also closed to the public are District fee-title lands that were purchased to develop infrastructure for water resource development projects. These tracts may not be open to the public for recreational activities due to the purpose for which the properties were purchased; however, public use may be allowed once the project is completed albeit only after a plan is made on the suitability of public use.

Recreation Resources

The District has developed facility standards that detail recreational facility, road and trail, sign and kiosk, and fence design, construction and maintenance procedures. These standards ensure that facilities provide a safe, aesthetically pleasing, outdoor environment for the public that can be effectively maintained, and minimizes potential impacts to water resources. District staff inspects public-use facilities, and schedules maintenance required to ensure longevity and continued safe use. Table 10 indicates the number of facilities for each type.

Table 10. FY 2018 Public-use facilities*

Facility Type	2018	2017	2016	2015	2014	2013	2012	2011
Trailheads	31	31	31	30	29	30	26	26
Docks & Boat Ramps	11	11	11	11	11	11	10	10
Hand & Canoe Launch Sites	19	19	19	19	19	19	27	27
Picnic Areas	22	22	22	21	14	17	16	16
Interpretive Sites	9	9	9	10	10	11	9	9
Restrooms	15	15	15	15	15	18	18	18
Miles Trails	228	232	232	237	226	242	203	190
Miles Driving Trails**	334	332	332	325	313	310	310	345

*Recreation facilities in GIS were reviewed and updated during the recreation guide upgrades on the web site. The review process allows staff to evaluate the facilities for changes or upgrades of use.

**Driving trails are drivable surfaces owned by the District or other entities that may or may not be maintain by the District.

Recreation Maintenance

- Land management staff continues to work with IT staff to upgrade and improve operational inspections and data collecting. Using iPads and ESRI online applications

land management staff have found the innovations to be a more efficient and effective than traditional methods.

- Suwannee Bicycle Association continues to make minor adjustments to the bicycle trails in the White Springs area.
- The Florida Trail Association continues to make re-routes and trail adjustments to enhance the trail user experience.
- The District continues to re-issue 3 SUAs to private individuals for equestrian trail maintenance on 2 District tracts. These trails are opened to the general public.

Special Use Authorizations

To protect sensitive resources and reduce management costs, it is necessary to limit some recreational opportunities and the use of certain roads or other access on District lands. Some uses, such as camping and other night uses, require a Special Use Authorization (SUA). The Public Use Standard in the DLMP provides recreational users a list of recreational activities that require a SUA. Examples of these activities include all-terrain vehicle (ATV) use, night-time access or persons with disabilities.

SUAs may also be issued for opportunities not listed in the Public Use Standard. Governing Board Program Directive 90-1 provides potential compatible activities not otherwise specified in the Public Use Standard. Examples include research and data collection, adventure races, trail maintenance, placement of bee hives and nuisance hog removal.

SUAs serve as an agreement between the District and user; it details terms, conditions, liability protection and time frame of the proposed use (Table 11). The District issues SUAs and reserves the right to refuse anyone an SUA if the proposed use threatens water resources, public safety or other natural resources on District lands.

Table 11. FY 2018 Number and types of Special Use Authorizations issued.

Recreation	Temporary Ingress and Egress¹	Mallory Swamp ATV Trail	Non-Recreational²	Goose Pasture Camping	Total
358	82	0	19	165	624

¹ Temporary Ingress and Egress SUAs may include recreational use on the Lukens tract in Cedar Key.

² Non-Recreational SUAs issued during the fiscal year include research and data collection, competitions, hog removal and apiary leases.

Requests for uses that are clearly or potentially exclusive require Governing Board consideration before any agreement, license or authorization is approved. Such uses may include legal conveyance of property rights, such as rights-of-way or access easements; tract closures for research or media projects; or exclusive use of resources as in resource harvesting. Governing Board Directives 90-2 and 92-1 set guidelines for District staff involved with land acquisition or surplus to respond to public requests for certain exclusive uses.

Hunting and Fishing

The District’s goal for public hunting is to provide high-quality hunting opportunities. The District meets annually with the FWC to review opportunities for public hunting on District lands. Public hunting on District lands is offered through management agreements with FWC and the United

States Fish and Wildlife Service. Fishing is allowed on District tracts subject to FWC fishing regulations (Table 12).

Table 12. FY 2018 Hunting and fishing access.

	2018	2017	2016	2015	2014	2013	2012
# acres open to public hunting	108,298	108,292	104,945	104,945	105,019	105,131	105,016
# fishing access locations	111	109	109	107	103	101	130

In FY 2018, the District partnered with the Suwannee River Strutters – NWTF, the Gator Gobblers – NWTF and Jefferson County King of Springs to conduct special opportunity hunts with youth and women in the outdoors on the Peacock Slough tract (1,159 acres), Mud Swamp (837 acres), Santa Fe River Ranch (469 acres) and Cuba Bay tract (1,946 acres).

Law Enforcement

The District relies on FWC and county sheriffs' offices to enforce Florida statutes and administrative rules on District-managed lands. FWC and counties perform regular patrols on District lands as part of their normal operations. The District also manages interagency contracts with FWC and various counties to utilize enhanced law enforcement services. The contracts allow the District to pay off-duty officers for enhanced patrols in areas with chronic violations or during periods of intensive use such as holiday weekends at high-use areas.

In FY 2018, the FWC officers who participated in the enhanced law enforcement program spent 546 hours patrolling District lands and the Suwannee County Sheriff's Office 56 hours patrolling Suwannee and Falmouth Springs, and Jefferson County Sheriff's Office. 56 hours patrolling Goose Pasture. The Sheriff's officers patrol on Memorial Day, Independence Day and Labor Day holidays.

Emergencies

Staff encourages the public to dial 911 when emergencies arise on District lands. During emergencies involving facilities, natural disturbances or hazard materials the District's land management staff play an integral role. The District maintains a Continuity of Operations Plan (COOP) required by the Florida Department of Emergency Management and has an active District Staff Safety Team that is organized internally.

The COOP addresses coordinated post-disaster response and recovery, rapid deployment, and pre-deployment of resources, communications, and warning systems, and presents annual exercises to determine the District's ability to respond to an emergency. The essential role for Land management staff during emergencies is associated with facilities and field operations and the safety of District lands for public access.

Prior to Hurricane Michael making landfall the COOP was activated by the Governing Board. During the days before and after landfall District land management staff fully supported District emergency operations. A major component for land management in response to a natural disaster is ensuring the safety of District lands for public access.

The District has Tract Closing Procedures which is followed during events that require COOP activation (e.g. hurricanes) or when conditions become unsafe for public access (e.g. flooding).

Table 13 identifies all District tracts, facilities or roads that were closed in FY 2018 due to emergencies or other extreme weather events.

Table 13 FY 2018 District Land Closures

Tract, Facilities or Roads	County	Closure Date	Event
Devil's Hammock	Levy County	7/24/2018	River Flooding
LA Bennett Grade Bridge	Lafayette County	7/24/2018	River Flooding
Steinhatchee Falls	Taylor County	7/24/2018	River Flooding
47 Bridge	Gilchrist County	7/24/2018	River Flooding
Steinhatchee Falls	Taylor County	8/3/2018	River Flooding

III. COMMUNICATIONS

Goal – to coordinate with public and private stakeholders in the management of District lands.

The District encourages public and private stakeholder input in the management of District lands. Communication opportunities and public inquiries into management activities and recreation is facilitated through a variety of applications including but not limited to, phone calls, mail, print materials, press releases, outreach activities, social media, website, and other electronic applications. Additionally, the discussions during the Land Management Review Team and comments received during the ELM process are important communication opportunities the staff utilizes to determine management effectiveness each year.

FY 2018 Land Management Review Team

District staff conducted a LMRT meeting and tour on April 3, 2018. The reviews focused on activities that were conducted during FY 2018. Areas of review included water resources, natural resource management, public use and facilities on representative areas. The LMRT was asked to score whether the District was achieving its objectives using the following scores:

- 0 – not meeting objectives;
- 1 – meeting objectives; and
- 2 – exceeding objectives.

The review was conducted in the Middle Suwannee River basin in Suwannee and Lafayette Counties. The area encompasses 15,571 acres of fee lands (36 individual tracts) and 5,301 acres of Conservation Easement lands.

Nine objectives from the DLMP were scored on the inspection ranging from a low of 1.06 for rare species resources to a high score of 1.78 for public use. Water resource objectives were scored 1.61. The overall average score of the nine objectives was 1.54 signifying that the activities were both meeting and exceeding the Governing Board's objectives. The overall average score of 1.54 was slightly lower than last year's LMRT. The average score for "managed for purposes acquired" was slightly lower than last year (1.61 compared to 1.68). The average score for "in accordance with Management Plan" was also lower than last year (1.56 compared to 1.80). The scores indicate substantial acceptance with the programmatic achievement of the objectives set by the Governing Board. Questions and responses to the statutory component of this review are summarized in Table 14.

Table 14. Questionnaire responses from the District's LMRT meeting.

Question 1 # of Responses	Are District lands being managed in a manner consistent with the purpose for which they were acquired, including public access?
0	SRWMD is not in compliance.
7	SRWMD compliance is adequate and acceptable.
11	SRWMD exceeds compliance regularly.
Question 2 # of Responses	Does SRWMD land management implement the goals identified in the District Land Management Plan?
1	SRWMD is not in compliance.
6	SRWMD compliance is adequate and acceptable.
12	SRWMD exceeds compliance regularly.

Note: Total scores may differ due to non-response on questionnaire.

District Land Management Plan

In FY 2018, District staff reviewed the 2011 DLMP came to the conclusion that to continue to move forward with plans, projects, and to establish general maintenance parameters for our lands and recreational sites that revisions were needed to the DLMP. In FY 2018 the Governing Board adopted an updated DLMP which essentially retains the goals and guidance of the 2011 DLMP and added a new section. This new section outlines the minimum requirements for operational activities and facility maintenance or construction. The new section is meant to further improve our communication with interested parties about management activities, provide reliable information to users, improve land management continuity and help staff achieve ELM program goals. The draft 2018 DLMP was presented at the January 9, 2018 Lands Committee public meeting and emailed to all the Governing Board members. Feedback was received and incorporated into the draft plan. The 2018 DLMP was adopted by the Governing Board on March 13, 2018 during a regularly scheduled public meeting.

Land Management Communication Initiatives

- Staff provided the communications staff with current status and information of District lands during Hurricane Michael.
- Staff now places all Annual Land Management Reports on the District's website.
- The Governing Board approved District Land Management Plan is now available on the District's website.
- Staff continues to provide images and text for District's social media outreach efforts including Facebook and Twitter.
- Staff continues to use the "Important Notices" feature on the District web page to provide information to the public regarding flooding, tract closures and management activities that may affect public use.
- Staff has completed five new kiosk panels.
- Staff updated and printed the Suwannee River Wilderness Trail Boat Ramp & Canoe Launch Map and a 24"x36" poster.

Regional Resource Group Participation

District staff participates in regional groups in order to understand issues that affect District lands and their management, and to provide input to other managers of recreation and natural resources regarding water resource issues.

- North Florida Prescribed Fire Council
- San Pedro Bay Landowners Association
- FWC - Invasive Plant Management Section's Weed Control Project
- USFS/Florida Trail Association Florida National Scenic Trail
- Suwannee Bicycle Association
- UF Conserved Forest Ecosystem: Outreach and Research Cooperative
- FWC Wildlife Management Areas and Management Plan
- Fire Adapted Communities, Baker County

IV. FISCAL RESPONSIBILITY

Goal – to protect resources and manage District lands in an efficient manner within the District's annual budget.

District staff minimizes the costs associated with land management by contracting with the private sector, partnering with other land management agencies and organizations, and submitting proposals for land management grant funding.

Facility Construction and Maintenance

- In FY 2014, the District reduced road coverage, revised management practices and added a progressive review and approval process for general road maintenance. The culmination of this effort was a new general road maintenance plan that centers on a three-year rotation for all roads deemed necessary for public access. In FY 2018, the District completed approximately 42 miles of total road maintenance on Steinhatchee Springs, Steinhatchee Falls, Steinhatchee Rise, Mud Swamp, Santa Fe River Ranch, Lake Rowell, Hunter Creek, Roline and Manatee Springs (Usher Landing). Of the 42 total miles of roadwork completed in FY 2018 approximately 8 miles were associated with timber harvests. FY 2018 maintenance was hindered by wet weather conditions.
- A new access road (0.5 mile) was constructed on the Hunter Creek Tract to improve recreational access. The new road allows vehicles to access the property without the need of an SUA.
- The District has a five-year rotation plan to mark and paint District land boundaries. The District has approximately 1,000 miles of boundary lines. One hundred seventy-four (174) miles were marked or painted in FY 2018.

Cooperative Management Agreements

The District enters into cooperative management agreements and/or leases with government agencies to reduce the cost of management to the District (Table 15), while providing similar management and protection and public access.

Table 15 Agencies managing District lands.

Managing Agency	Tracts	Acres
<i>No Cost Management Agreements</i>		
Alachua County	2	222
City of Lake City	1	27
City of Newberry	1	1
City of White Springs	1	7
Columbia County	2	96
Department of Environmental Protection	9	1,980
Florida Fish and Wildlife Conservation Commission	2	862
Florida National Guard	2	2,687
Gilchrist County	1	513
Hamilton County	3	17
Jefferson County	1	22
Levy County	1	4,274
University of Florida	2	738
US Fish and Wildlife Service	5	1,635
No Cost Management Total Acres:		13,081
<i>Shared Revenue Agreements</i>		
Florida Forest Service	13	12,444
Shared Revenue Total Acres		12,444
Total		25,525

Under a lease agreement the Florida Forest Service (FFS) manages approximately 12,444 acres of District lands as part of the Twin Rivers State Forest. As part of the lease, the District has agreed to reimburse the State for expenses each year. In FY 2018, there were a total of \$140,000 State expenses, which were reimbursed by the District.

Additionally, the District has a cooperative management agreement with FFS for lands not under lease at Twin Rivers State Forest. This agreement is used primarily to allow FFS to manage and conduct fire-line installation and prescribe fires on District lands. This agreement reduces District costs since the FFS rate for prescribed burning is less than the District's private contractor's rates. No work was completed in FY 2018 under this agreement because of FFS staffing shortfalls.

Public hunting is provided on 108,298 acres (68%) of District-owned lands in cooperation with FWC and USFWS. These agencies manage hunting dates and limits and provide law enforcement at no cost to the District. No fees for hunting are charged by the District.

The District has agreements with private and public entities to provide trail maintenance for 162 miles (70%) of the bike, horse and multi-use trails on District lands. These trails are maintained at no cost to the District and available for use by the general public.

Grant Applications and Awards

In FY 2018, the District received several sources of grant funding to help reduce the cost of natural community management work listed in Table 11

Florida Forest Service Prescribed Fire Enhancement Program:

- The District received \$86,527.95 to complete the following work: roller chopped approximately 310 acres on the Mallory Swamp tract in Lafayette County; prescribed burned approximately 1,282 acres on the Mallory Swamp tract in Lafayette County. This work was done to help reduce fuel loads, facilitate the use of prescribed fire, and help meet natural community DFC objectives.

U.S. Fish and Wildlife Service Partner's for Fish and Wildlife Program:

- The District received \$16,076.50 for herbicide application work on the Mattair Springs tract in Suwannee County. This work was done in association with a sandhill natural community restoration project on this site. Herbicide was applied on approximately 87 acres to control hardwood re-sprouts and help facilitate the use of prescribed fire.

U.S. Fish and Wildlife Service Partner's for Fish and Wildlife Program:

- The District received \$24,930.00 to conduct heavy woods mowing on the Peacock Slough tract in Suwannee County. This work was done in association with an upland pine natural community restoration project on this site. Mowing was applied to approximately 99 acres to control the encroachment of woody vegetation and help meet natural community DFC objectives.

Revenues and Expenditures

The District has opportunities to generate revenues while implementing its natural resource management activities. Timber sales generate the vast majority of revenue from land management activities, Table 16.

Table 16. FY 2018 Land resources revenues.

Category	FY 2018
Timber	\$538,697
Land Use (Apiary Leases)	\$750
Grants	\$162,952
State Appropriation (Operations)	\$1,777,210
Total	\$2,479,609

In FY 2018, the District sold an estimated 40,500 tons of pine timber in 8 sales on 742 acres. These sales were stand conversion clearcuts, pine thinnings, bark beetle infestation salvage operations, and sandhill restoration hardwood removal. Total gross revenues are estimated (since all sales have not been completed as of October 1, 2018) to be \$ 1,031,555.

Expenditures in the land management program are divided into categories for budgeting as follows, Table 17:

- Natural Resource Management – includes water resource projects, reforestation, timber sales, and protected species management.
- Invasive Plant Management - includes the costs associated with invasive plant treatments including hiring private contractors and staff time/field supplies needed to conduct in-house treatments.
- Prescribed Fire – includes FFS and private contractor costs for prescribed burning and fire-line establishment and maintenance.
- Public Use – includes expenses for maintaining site-based and dispersed recreation activities, developing new sites, signs, maps, brochures, and sanitation.
- Facility and Equipment Management – includes costs for maintaining roads, hydrologic structures, boundaries and gates.
- Administration and Planning - includes expenses for planning, GIS, training, real-estate activities, management plans and reviews, and interagency coordination.

Table 17. FY 2018 Land resources expenditures.

Category	FY 2018
Natural Resource Management	\$451,900
Exotic Invasive Management	\$13,052
Prescribed Fire	\$489,346
Public Use	\$197,196
Facility & Equip. Management.	\$331,711
Administration and Planning*	\$51,030
Total	\$1,534,235

**Does not include Payments in Lieu of Taxes, Twin River State Forest Agreement Expenditures and salaries/benefits*

Payments in Lieu of Taxes (PILT)

When the District purchases lands in fee simple (all ownership rights), the lands are taken off the county ad valorem tax roll. The Legislature established a payment in lieu of taxes program in 1992 to reimburse local governments for the loss of revenue. To qualify for this program, the county must have a population of less than 150,000. Payments were made to counties in the amount of \$355,265. The State appropriated the District’s \$352,909 for PILT in FY 2018.

Surplus Lands

Disposing of lands that are not needed for water-resource protection allows the District to redirect funds to higher value, water-resource lands or reduce land management costs. Land management staff participates in the review process of any potential surplus parcels and provides feedback to the Executive Office and Governing Board. The surplus lands indicated in Table 18 were conveyed in FY 2018.

Table 18. Surplus lands sold or conveyed.

Surplus Parcels	Acres	County	Disposition Date	Transaction	Proceeds
Branford Bend	167	Suwannee	07/10/2018	Conveyance to Suwannee County School Board	\$0.00
Falmouth Spring Solid Waste Transfer Site	4.86	Suwannee	07/11/2017	Conveyance to Suwannee County	\$0.00
Suwannee Springs Solid Waste Transfer Site	5.77	Suwannee	07/11/2017	Conveyance to Suwannee County	\$0.00
Alligator Lake	43.20	Columbia	07/18/2017	Conveyance to Columbia County	\$0.00

APPENDIX A**SRWMD STATUTORY SUMMARY**

December 2018

Land Acquisition and Management**Section 373.139(2) F.S. Acquisition of Real Property.**

- “Flood control
- Water storage
- Water management
- Conservation and protection of water resources
- Aquifer recharge
- Water resource and water supply development
- Preservation of wetlands, streams and lakes.”

Section 373.1391 F.S. Management of Real Property.

- (1a) “Managed and maintained, to the extent practicable, in such a way as to ensure a balance between public access, general public recreational purposes, and the restoration of their natural state and condition. Except when prohibited by a covenant or condition in s. 373.056(2) F.S., lands owned, managed, and controlled by the district may be used for multiple purposes including, but not limited to, agriculture, silviculture, and water supply, as well as boating and other recreational uses.”
- (b) “Whenever practicable, such lands shall be open to the general public for recreational uses. General public recreational purposes shall include, but not be limited to, fishing, hunting, horseback riding, swimming, camping, hiking, canoeing, boating, diving, birding, sailing, jogging, and other related outdoor activities to the maximum extent possible considering the environmental sensitivity and suitability of those lands. These public lands shall be evaluated for their resource value for the purpose of establishing which parcels, in whole or in part, annually or seasonally, would be conducive to general public recreational purposes. Such findings shall be included in management plans which are developed for such public lands.”
- (5) “The following additional uses of lands acquired pursuant to the Florida Forever program and other state-funded land purchase program shall be authorized, upon a finding by the governing board, if they meet the criteria specified in (a) – (e): water resource development projects, water supply development projects, storm-water management projects, linear facilities, and sustainable agriculture and forestry. Such additional uses are authorized where:
- (a) Not inconsistent with the management plan for such lands;
 - (b) Compatible with the ecosystem and resource values of such lands;
 - (c) The proposed use is appropriately located on such lands and where due consideration is given to the use of other available lands;
 - (d) The using entity reasonably compensates the titleholder for such use based upon an appropriate measure of value; and
 - (e) The use is consistent with the public interest.”

Section 373.591 F.S., Management review teams.

(1) To determine whether conservation, preservation, and recreation lands titled in the names of the water management districts are being managed for the purposes for which they were acquired and in accordance with land management objectives, the water management districts shall establish land management review teams to conduct periodic management reviews. The land management review teams shall be composed of the following members:

- (a) One individual from the county or local community in which the parcel is located.
- (b) One employee of the water management district.
- (c) A private land manager mutually agreeable to the governmental agency representatives.
- (d) A member of the local soil and water conservation district board of supervisors.
- (e) One individual from the Fish and Wildlife Conservation Commission.
- (f) One individual from the Department of Environmental Protection.
- (g) One individual representing a conservation organization.
- (h) One individual from the Department of Agriculture and Consumer Services' Florida Forest Service.

(2) The management review team shall use the criteria provided in s. 259.036 in conducting its reviews.

(3) In determining which lands shall be reviewed in any given year, the water management district may prioritize the properties to be reviewed.

(4) If the land management review team finds that the lands reviewed are not being managed in accordance with their management plan, prepared in a manner and form prescribed by the governing board of the district and otherwise meeting the timber resource management requirements of s. 253.036 F.S., the land managing agency shall provide a written explanation to the management review team.

(5) Each water management district shall, by October 1 of each year, provide its governing board with a report indicating which properties have been reviewed and the review team's findings.

Section 259.036 F.S., Management Review Teams.

(3) "In conducting a review, the land management review team shall evaluate the extent to which the existing management plan provides sufficient protection to threatened or endangered species, unique or important natural or physical features, geologic or hydrologic functions or archaeological features. The review shall also evaluate the extent to which the land is being managed for the purposes for which it was acquired and the degree to which actual management practices, including public access, are in compliance with the adopted management plan."

Section 253.036 F.S., Forest Management.

"All land management plans described in s.253.034(5) F.S., which are prepared for parcels larger than 1,000 acres shall contain an analysis of the multiple-use potential of the parcel, which analysis shall include the potential of the parcel to generate revenues to enhance the management of the parcel. The lead agency shall prepare the analysis, which shall contain a

component or section prepared by a qualified forester which assesses the feasibility of managing timber resources on the parcel for resource conservation and revenue generation purposes through a stewardship ethic that embraces sustainable forest management practices if the lead management agency determines that the timber resource management is not in conflict with the primary management objectives of the parcel.” ”All additional revenues generated through multiple-use management or compatible secondary use management shall be returned to the lead agency responsible for such management and shall be used to pay for management activities on all conservation, preservation and recreation lands under the agency’s jurisdiction. In addition, such revenue shall be segregated in an agency trust fund and shall remain available to the agency in subsequent fiscal years to support land management appropriations.”



January 2018

For additional information please contact
Suwannee River Water Management District
9225 CR 49, Live Oak, FL 32060
386.362.1001
www.mysuwanneeriver.com