

# Calhoun County 2014 Storm Water Management Program Report



Prepared for:

**Calhoun County Commission  
1702 Noble Street  
Anniston, Alabama 36201**

Prepared by:



**Engineering. Environmental. Answers.**

**417 Martling Road  
Albertville, Alabama 35951**

**P.O. Box 2079  
Albertville, Alabama 35950  
(256) 891-3458**

**March-2015**

# **Calhoun County 2014 Storm Water Management Program Report**

Prepared for:

**Calhoun County Commission  
1702 Noble Street  
Anniston, Alabama 36201**

Prepared by:

**CDG Engineers & Associates, Inc.  
417 Martling Road  
Albertville, Alabama 35951  
P.O. Box 2079  
Albertville, Alabama 35950  
(256) 891-3458**

**March-2015**

## Table of Contents

1. Certification.....	3
2. Introduction: .....	4
2.1 Location.....	5
2.2 Responsible Party.....	6
3.0 Storm Water Management Program Requirements.....	7
3.1 Public Education and Outreach.....	7
Television.....	7
Newspaper .....	7
Stormwater Webpage .....	8
Earth Day Activities .....	8
Public Presentations.....	9
Workshops (Public and County Staff).....	10
Measure of Success .....	10
3.2 Public Involvement and Participation .....	11
Involvement of General Public, Civic Organizations, Clubs and Associations.....	11
Free Landfill Day Program .....	12
Storm Drain Marking Program .....	13
Webpage .....	14
3.3 Illicit Discharge Detection Elimination (IDDE) .....	15
The County has no Legal Prohibition and Enforcement authority under state law.....	15
Storm Sewer System Map.....	16
Illicit Discharge Ordinance.....	17
Stormwater Outfall Reconnaissance.....	17
Illicit Discharge Reporting Form .....	17
Other IDDE Initiatives.....	17
3.4 Construction Site Storm Water Runoff Control .....	18
Erosion and Sediment Control Plan Review Procedures and Permitting Process .....	19
Procedures for Notifying ADEM of Non-Compliant Sites.....	19
Procedures for Receipt of Information Submitted by the Public.....	22
3.5 Post Construction Site Storm Water Management.....	22
Non-Structural BMPs.....	22
Structural BMPs.....	24



2014 Calhoun County Storm Water Management Report

3.6 Pollution Prevention and Good Housekeeping for Municipal/County Operations ..... 24

- Stormwater Management Training..... 25
- Certified Pesticide Applicators ..... 25

APPENDIX ..... 27

- TV-24 MS4 Segment..... 28
- Free Dump Day Ad ..... 29
- Calhoun County Stormwater Webpage..... 33
- Calhoun County MS4 Programing ..... 34
- MS4 Presentation “What is MS4?” ..... 38
- CAC Anniston Star Public Announcement ..... 44
- Calhoun County MS4 Survey..... 45
- Calhoun County Survey Results ..... 48
- Calhoun County Stakeholders Meeting..... 49
- Earth Day Celebration ..... 66
- Rain Barrel Program..... 68
- Renew Our Rivers, Choccolocco Creek ..... 69
- Choccolocco Creek Water Shed Alliance..... 71
- Protecting Our Waters, Coosa River Basin..... 83
- Fall Fest..... 98
- Blue Thumb Word Search..... 100
- 2014 Calhoun County MS4 Activities..... 101
- Erosion and Sediment control Inspection Report Form..... 103
- BMP Inspection Checklist..... 104
- Standard Operating Procedures #: ID-1 & 2 ..... 106
- Calhoun County Outfall Map..... 111
- Alabama Low Impact Development Handbook..... 112
- Watershed Structure Inspection Report ..... 114
- Safety/MS4 Crew Meeting Signup Sheets..... 124



## 1. Certification

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Base on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Name

Mr. Chris Gann, EIT

Title

Storm Water Manager

---

Signature

---

Date



## 2. Introduction:

On November 16, 1990, the U.S. Environmental Protection Agency (EPA) promulgated regulations, under the Water Quality Act of 1987, setting forth application requirements for National Pollutant Discharge Elimination System (NPDES) storm water permits.

In 1999, EPA promulgated regulations establishing Phase II of the NPDES storm water program. The Phase II program extends coverage of the NPDES storm water program to regulated “small” MS4s. A regulated “small” MS4 is located within an “urbanized area” as defined by the Census Bureau or as designated by the NPDES permitting authority.

The Alabama Department of Environmental Management (ADEM) administers the storm water program for the State of Alabama. In 2014 Calhoun County submitted a revised Storm Water Management Program Plan and Implementation Schedule to the ADEM. The information included in this Storm Water Management Program (SWMP) Plan was revised to update changes and the revised scheduling of a number of aspects of the 2014 Plan. The County’s SWMP Plan describes how the County will work to maintain compliance with the NPDES General Permit ALR040004. The plan will be further revised and updated as needed to reflect the county’s MS4 activities.

During previous audits by the ADEM of the county’s MS4 associated activities prior to the 2014 reporting period, of the implementation of the Plan, ADEM noted a number of deficiencies. The County has made concerted efforts to implement those recommendations made by ADEM and fulfil the requirements of the SWMP Plan. In 2014 the Calhoun County Commission hired Mr. Chris Gann who has the responsibility of operational oversight of SWMP Plan.

This 2014 report is intended to document the results of the SWMP for the Municipal Separate Storm Sewer System (MS4) Phase II General Permit for the Calhoun County urbanized area. The original permit was jointly issued for Calhoun County, and includes the City of Anniston, the City of Jacksonville and the City of Oxford. Calhoun County is submitting a standalone 2014 report documenting the activities which took place within the urbanized area of the county outside the jurisdiction of the cities listed above. Some of the activities were conducted in conjunction with the above mentioned municipalities. It is understood that the cities of Anniston, Oxford and Jacksonville will file reports for each individual municipality. This permit, with the designated NPDES number ALR040004 became effective February 1, 2011. The SWMP according to Part IIIA of the general permit is to reduce the discharge of pollutants from the county’s MS4 to the maximum extent practicable.

The County Commission and the major cities within the county have made efforts during the 2014 period combining their efforts and resources in a number of areas to achieve the scheduling and best management practices set out in the SWMP Plan. The County has particularly focused a

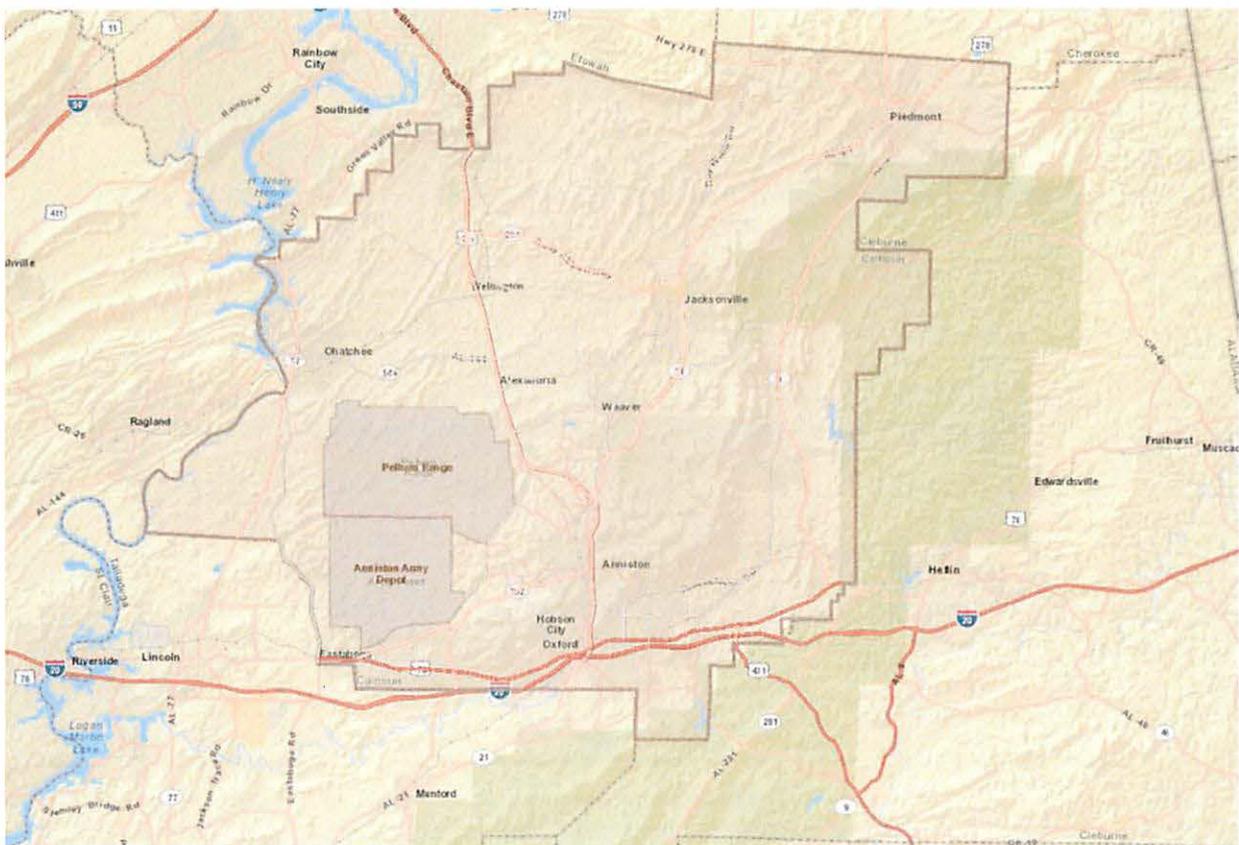


portion of its efforts on the urbanized area which are located outside the incorporated portions of the county which are the jurisdiction of its city's municipalities.

Outlined in this report are those actions and methods the County has used to address specific areas under the Plan during 2014. The six minimum control measures that are required by the permit to reduce the discharge of pollutants to comply with the Clean Water Act are: **Public Education and Outreach; Public Involvement and Participation; Illicit Discharge Detection and Elimination (IDDE); Construction Site Storm Water Runoff Control; Post Construction Storm Water Management and Pollution Prevention and Good Housekeeping for Municipal Operations.** The details of these measures can be found in Part IIIB of the permit.

## 2.1 Location

Calhoun County is located mainly north of Interstate 20 and southeast Interstate 59. Birmingham lies approximately 50 miles to the west and Atlanta is 80 miles to the east. The population of Calhoun County is approximately 117,000 according to the 2013 census. Significant urbanized areas within the county are the cities of Anniston, Jacksonville and Oxford.



Map of Calhoun County



## 2.2 Responsible Party

The Calhoun County Commission is the responsible entity for the MS4 program for the urbanized areas outside the City's jurisdictions. Mr. Chris Gann administers the MS4 program for the Calhoun County Commission and began work in August, 2014. Mr. Gann has the responsibility of oversight of the SWMP and compliance with Phase II Storm Water Permit. Various departments and individuals working within the county share and assist in the responsibility for public involvement and participation, residential and commercial construction and conducting the erosion and sediment control inspections. Calhoun County has established a baseline of water quality from previous stormwater sampling events; the County has public education and outreach programs; and assisted the various partner organizations and municipalities with other outreach programs. The following individuals should be contacted to address questions or concerns regarding the county's MS4 program.

Commission District 1; Commissioner **Fred Wilson**  
Commission District 2; Commissioner **Tim Hodges**  
Commission District 3; Commissioner **Don Hudson**  
Commission District 4; Commissioner **John "JD" Hess**  
Commission District 5; Commissioner **Lee Patterson**

### Commission Office

1702 Noble Street  
Suite 103  
Anniston, AL 36201  
Phone: 256-241-2800  
[ccc@calhouncounty.org](mailto:ccc@calhouncounty.org)

### Mr. Chris Gann

160 Seaton Drive  
Anniston, AL 36205  
Phone: 256-237-4657  
Fax: 256-237-2009

### Mr. Randy Hubbard

Sub Division Inspections



### **3.0 Storm Water Management Program Requirements**

The County submitted its Storm Water Management Program Plan for the NPDES Permit ALR040004 in 2011 and updated the Plan in 2013 and revised the plan in 2014. The County is committed in achieving the conditions of the permit, which will provide improved water quality through the reduction of pollutants in stormwater discharged to the waters of the State. The County has committed personnel and financial resources to support the execution of the plan. As stated above there are six minimum control measures which the county must address in its Storm Water Management Program plan are:

- 1. Public Education and Outreach on Storm Water Impacts**
- 2. Public Involvement/Participation**
- 3. Illicit Discharge Detection and Elimination (IDDE)**
- 4. Construction Site Stormwater Runoff Control**
- 5. Post-Construction Stormwater Management in New Development and Redevelopment**
- 6. Pollution Prevention/Good Housekeeping for Municipal Operations**

#### **3.1 Public Education and Outreach**

The residents of Calhoun County for the most part have a general lack of understanding of what actions negatively impact water bodies in the county. Calhoun County is therefore committed to informing and educating the general public, businesses and the municipal employees of the importance of the measures to be taken to reduce pollution of storm water. The county developed a number of BMPs that were used during the 2014 reporting period to educate the general public, businesses, homeowners, landscapers, contractors, developers, municipal staff and others.

##### **Television**

The county has continued to utilize television for fact distribution to the public in 2014. Mr. Chris Gann was interviewed by TV-24 in Anniston, Alabama. Mr. Gann discussed the county's "When It Rains It Drains" Campaign, and mentioned some of the county's efforts to inform the public of the issues concerning pollution in stormwater runoff. A synopsis of the interview is presented in the Appendix.

##### **Newspaper**

Calhoun County also utilized the resources of the Anniston Star newspaper. The County advertised the Free Dump Day at the landfill letting its citizens know that "When it Rains It Drains" reinforcing the idea it is important to prevent debris and contaminants for reaching the streams and rivers in the county. Documentation of the ad is presented in the Appendix.



### **Stormwater Webpage**

Stormwater information is provided on the county's webpage. Citizens often go to the Calhoun County website to obtain information on items of community interest. The website is accessible 24 hours a day and serves the citizens that can't meet with the county's staff during normal working hours. The county uses a portion of its webpage to deliver messages about the county's storm water program. The information is under the County Home Page and Highway Department's tab. (<http://www.calhouncounty.org/highway/stormmain.html>). An Example of the Webpage is presented in the Appendix.

There are some useful links on the page pertaining to the County's MS4 program:

**Calhoun County Storm Water Plan** (*Adobe pdf document*)  
<http://www.calhouncounty.org/highway/stormplan.pdf>

**Phase II Information** - <http://www.calhouncounty.org/highway/stormphase2.html>

**Urbanized map for Calhoun County** (*Adobe pdf document*)  
<http://www.calhouncounty.org/highway/stormphase2.html>

**Alabama Low Impact Development Handbook** - <http://www.aces.edu/natural-resources/water-resources/watershed-planning/stormwater-management/LID.php>

**Alabama Handbook for Erosion Control, Sediment Control and Stormwater Management on Construction Sites and Urban Areas** - [http://swcc.alabama.gov/pages/erosion\\_handbook.aspx](http://swcc.alabama.gov/pages/erosion_handbook.aspx)

Calhoun County will continue to use the webpage to deliver important information concerning the county's SWMP during 2015. The webpage will inform the public of information pertaining to storm water policies; updated storm water sample data, links to design manuals and links to storm water related sites will be available to the public. The County plans to continue to update the Phase II Stormwater webpage to provide new or updated information of interest concerning stormwater related issues within the county. The Phase II Stormwater webpage reaches a general public target audience. A link to the 2014 Storm Water Management Report will be added to the Webpage sometime in April, 2015.

### **Earth Day Activities**

Earth Day is a great event in the county. The County Commission has created and continues to utilize environmental activities and events aimed at educating citizens of all ages on the importance of protecting our environment. An example of this type of event is Calhoun County Earth Day Celebration 2014. This event was sponsored in part by the Alabama County Extension Service and targets the participants with information on a variety of topics including stormwater management techniques, policies and practices within the county. The county will continue to



provide Earth Day activities during the course of the 2015 permit cycle. Earth Day activities primarily reach a general public and school children target audience.

### Public Presentations

During the 2014 reporting period, the Alabama County Extension Service (ACES) sponsored/assisted with a number of programs for the general public in which portions dealt with stormwater runoff and pollution. The County Extension Service provided education and outreach to several thousand adults and children during various programs, festivals, and training sessions throughout the county. Water quality and the environment are a recurring theme that the ACES includes in many of the programs and training which it offers. An abbreviated (edited) list of some of the programs and the attendance numbers which included educational information which also included stormwater related topics was provided Dr. David West and Ms. Lisa Sosebee with the Calhoun County Extension Service and is presented in the **Appendix**.



The Alabama County Extension Service for Calhoun County provided an invaluable resource during the 2014 reporting period. Dr. David West and his staff will be counted on in 2015 to provide awareness training and classes which will help keep the general public informed of the water quality issues in the county.

Additional public presentations, workshops and seminars were conducted in Calhoun County which presented important information concerning topics pertaining to stormwater, pollution and the importance of a healthy watershed. Stormwater awareness and water quality were presented in a number of forums by environmentally conscious organizations working in the county. The target audience for public presentations varied depending upon the organization participating in the gathering. Target audiences for presentations could include schools, environmental stakeholder groups, local civic groups and homeowners. Examples of the organizations include:

**Chocolocco Creek Watershed Alliance; Watershed Workshop and the Renew our Rivers  
Rain Barrel Workshop; Camp Cane Creek**



**Rain Barrel Workshops; Fall Fest,  
4H Club; Earth Day, Cane Creek Community Garden  
Alabama Clean Water Partnership  
Calhoun County Master Gardener Work Days**

**Workshops (Public and County Staff)**

In order to provide training for its county staff, Calhoun County conducted a training session at the Calhoun County Highway Department facility on 160 Seaton Drive in October 2014. The presentation explains some of the terminology of the MS4 program, some of the problems faced by the county in dealing with stormwater run-off, the County's permit requirements, the County's role in dealing with stormwater issues and how county staff can assist in meeting the requirements of the permit. The County's goal is to use its periodic staff meetings during 2015 as an opportunity to educate and update its staff on the methods and techniques which can be used to implement the county's stormwater plan in conjunction with the services it provides.

The training program was attended by more than 50 of the county's staff during 2014. Documentation for the training sessions is presented in the Appendix. The presentation is attached as part of the report's Appendix. During 2015, the County Commission will continue to work with its employees during regularly scheduled meetings and as the budget allows.

**Measure of Success**

Overall success of our public education and outreach program is gauged by the awareness of the public and the general water quality in our lakes and streams. The water quality is in turn gauged by the results from our water quality monitoring program. The county is reviewing its options concerning dry weather sampling points within the county as a means to evaluate the effectiveness of the MS4 program. The comparison of historic and recent sampling will provide a measure of the success of the County's efforts.

The level of awareness in the community, regarding the county's stormwater management program, is somewhat difficult to determine. Specific components and measureable goals within the public education and outreach portions of the program will be reviewed and evaluated as to effectiveness and recommendations will be made to update the County's evolving SWMP Plan. Questionnaires returned to the commission during the 2014 reporting period were tabulated and the results are attached (Appendix). The limited number of responses received to the 2014 survey did show that there is an understanding by the public for the need to protect water quality and that their daily activities can affect the county's water quality. Revised questionnaires will be distributed during 2015 events and will be used as a way to gauge the public's awareness of the MS4 program, evaluate the program's effectiveness and areas where the plan can be improved.



### **3.2 Public Involvement and Participation**

The public involvement and participation control measures along with public education and outreach are dependent on each other for their success. It is hard to determine which is more critical. The county believes that educating and informing the public will be the cornerstone that will make the SWMP a success while public involvement and participation in the program will be the mortar that holds these two together. The county is aware that making available the information concerning the importance of managing storm water pollution is paramount in attracting the public's attention and interest in participating in the county's MS4 program.

During August of 2014, Calhoun County along with representatives from the City of Anniston, City of Jacksonville, and the City of Oxford met and agreed to form the Calhoun County Stormwater Cooperative. The Cooperative continued to meet during 2014 to discuss stormwater issues (8-27, 9-2, 9-24, 10-1, 11-5, and 12-3). Agendas, meeting minutes and signup sheets from the meetings are presented in the Appendix.

A Stormwater Citizens Advisory Committee was formed during September 2014. The Cooperative met with the Citizens Advisory Committee which is part of the East Alabama Planning Commission and formed a Stormwater Citizens Advisory Committee. Documents pertaining to the meetings and attendance are presented in the Appendix.

A listing of the County's Public Education Activities and Public Involvement Activities held during the 2014 reporting period is presented in the Appendix along with examples of the meeting minutes of the various groups. During the upcoming 2015 reporting period the county will continue to actively partner with the cities of Jacksonville, Oxford, Anniston and Jacksonville State University whenever possible to share the limited resources and advance this control measure.

#### **Involvement of General Public, Civic Organizations, Clubs and Associations**

The county participated in a number of activities with several civic organizations to advance the county's public education and public involvement efforts with the various groups targeted by the MS4 Program in the county. Several organizations were involved with both the education measures and pressing their membership to become involved in a number of the activities in the county. These groups participated in several of the programs which were also sponsored by the Calhoun County Extension Service and its workshops and training sessions, portions of which also dealt with stormwater.

**Choccolocco Creek Watershed Alliance**  
**Calhoun County Master Gardener Program**  
**Fall Fest**



**4H Club**

**Alabama Clean Water Partnership  
Calhoun County Stormwater Cooperative  
Stormwater Citizens Advisory Committee**



Choccolocco Creek Rain Barrel Projects

Choccolocco Watershed Cleanup

In 2015, the county will continue to reach out to these stakeholder organizations to increase the awareness of how to participate in preventing storm water pollution within the county. These organizations have a vested interest in preserving the water quality of Calhoun County and will be pursued to work with and participate in the county’s MS4 program. The county will continue to participate in, support, and work closely with, these organizations. These organizations have core values of preserving the watersheds and have the potentially to reach large portions of the Plan’s target audiences.

**Free Landfill Day Program**

The free landfill day involves the general public in becoming more knowledgeable concerning the county’s needs to prevent stormwater pollution; the county encourages the residents to participate in removing litter and debris which potentially will reach the watersheds within the county. The county advertised its Free Dump Day with the theme “When it Rains, It Drains” in the Anniston Star (Appendix). The general public is encouraged to bring materials collected within the county to the landfill and properly dispose of the materials free of charge. During the October 2014 event there was a significant increase in the vehicle traffic delivering debris to the landfill which could have potentially reached the waterways of the county.



## Calhoun County Litter Patrol



PH: 256-241-2942  
FAX 256-231-1747

In addition to the Free Days at the Calhoun County Landfill, the Calhoun County Commission has a regular Litter Patrol to remove debris and limb and leaf material from the ditches which could ultimately make its way into the county surface water bodies. During 2014, the Litter Patrol recovered and disposed of almost 150 tons of material, which could have otherwise made its way into the streams and surface water bodies in the county.

### Storm Drain Marking Program

The County paid to have several metal “Drains To River” marking templets for storm drain and outfall identification and have been used at some outfall locations. These marking templets will continue to be utilized as part of the county’s MS4 program in 2015.



The county’s GIS staff (Robert Sheitlin) has the county’s watershed and outfalls input on the mapping system for the county. A scalable copy of the current Outfall Map is in development for the public and will be linked to the Stormwater Webpage when completed. A copy of the current map is presented in the Appendix. The map provides county staff access to the water shed drainage patterns and associated outfalls. As part of the county’s MS4 program, the county will continue to upgrade the map in 2015 and will implement its marking and warning sign program



along the drainage ways and outfalls. The program will inform the public of the potential consequences of dumping near the outfall areas.

The county will continue the marking and mapping program as part of its efforts to inform the public. The outfall map will allow environmental groups active in the county to assist with the collection of debris which could affect the county's various watersheds. The county will work with these organizations to assist with an annual Outfall Clean-Up. Two such events were hosted this year by the Choccolocco Creek Watershed Alliance:

### **Renew Our Rivers Clean-Up: March 22, 2014**



On March 22, 98 volunteers met at 6 different sites along lower Choccolocco Creek to pick up trash of all kinds from the waterways and roadways. This year's cleanup was the largest to date, tripling previous volunteer's numbers and picking up even more trash: 145 bags of trash, 56 tires, 1 La-Z-Boy recliner, BBQ grill and multiple TVs. Good work volunteers!

### **Watershed Academy Workshop Jan 16 & 17, 2014**



Watershed Academy was a fantastic 2-day workshop taking place along the beautiful Cane Creek at Cane Creek Community Gardens at Fort McClellan. Over the 2 days, participants learned about hydrology, streamside ecology, water quality monitoring, stream restoration and in-field stream assessments.

#### **Webpage**

In an effort to provide the general public with an additional means of reporting potential storm water concerns and access information on the MS4 program, the county provides contact information on its webpage. Citizens can find contact information to comment on the current storm water program, information on methods for identifying suspected illicit discharges, registering a complaint of suspected illicit discharge or the methods for providing recommendations for improvements to the existing plan. Any information received is forwarded to the Storm Water Manager and an investigation is initiated when appropriate. The webpage information is a valuable tool for assisting county personnel in responding to citizen concerns. The website is available and is primarily for engaging the general public target audience.

<http://www.calhouncounty.org/highway/stormwater.html>



The screenshot shows the Calhoun County Alabama website. The header includes the county name and a navigation menu with links for Home, Offices, Government, Employment, and Links. The main content area is titled "Calhoun County Storm Water Information". The text explains that Calhoun County is designated by the United States Environmental Protection Agency (USEPA) and the Alabama Department of Environmental Management (ADEM) as an owner/operator of a Phase II municipal separate storm sewer system (MS4). It details the implementation of Phase II Stormwater Regulations in March 2003 and the current permit (ALR040004) issued on January 31, 2011, which was revised on February 24, 2012. The permit coverage expires on January 31, 2016. The intent of the regulations is to reduce adverse impacts to water quality and aquatic habitat by instituting controls on unregulated sources of stormwater discharges. The county must satisfy six "minimum control measures," including:

- Public Education and Outreach
- Public Participation/Involvement
- Illicit Discharge Detection and Elimination
- Construction Site Runoff Control
- Post-Construction Stormwater Management
- Pollution Prevention/Good Housekeeping

Useful Links section includes:

- Calhoun County Storm Water Plan (Adobe pdf document)
- Phase II Information
- Urbanized map for Calhoun County (Adobe pdf document)
- Alabama Low Impact Development Handbook

Other resources listed include Alabama DOT and US DOT. Contact information for the Calhoun County Highway Department is provided at the bottom left of the page.

### Calhoun County Webpage Information

#### 3.3 Illicit Discharge Detection Elimination (IDDE)

**The County has no Legal Prohibition and Enforcement authority under state law.**

EPA recognizes that some permittees may have limited authority under State, Tribal or local law to establish and enforce an ordinance or other regulatory mechanism prohibiting illicit discharges. In such a case, the permittee is encouraged to obtain the necessary authority, if possible. The county will involve those municipalities where such ordinances are in effect and the city has jurisdiction.

The **Calhoun County Environment and Enforcement Office** was established on January 1, 2000 by the Calhoun County Commission. The initial purpose for establishing this office was to provide Calhoun County with a work force "Litter Control" to remove unsightly litter, and illegal dumps from the county highways, byways, and public areas. Over the years, the office has expanded its duties into areas similar to that of code enforcement in other counties. The office is responsible for



Environmental Enforcement regarding Alabama's Solid Waste Laws, Criminal littering, Calhoun County's "Public Nuisance Law", Mosquito Control, and the processing and assignment of Court Ordered Community Service. The County Commission is investigating the possibility of utilizing the Enforcement Office in cooperation with Stormwater Manager to monitor illicit discharges within the county.

The county's illicit discharge detection and elimination (IDDE) program is coordinated by the Stormwater Manager to actively locate, identify and correct illicit discharges to the MS4 during the permit cycle. During 2014, the County Highway Department's staff received training for Illicit Discharge, Detection and Elimination as part of a Safety and training meeting held in October 2014. The county will continue to update and train staff in IDDE during the 2015 reporting period. The county continues to manage, enforce and expand its IDDE program where possible and utilize local and state agencies to enforce illicit discharges where practicable.

The County adopted two Standard Operating Procedures dealing with IDDE. SOP#-ID-1 and SOP#-ID-2. The SOPs deal with the identification of outfall IDDE and Construction site IDDE. The SOPs are attached in the Appendix along with Inspection Sheets and Reporting Forms.

The overall success of the county's IDDE program will ultimately be gauged by having accurate an updated storm sewer system drainage maps, the reduction in illicit discharges, and the level of public awareness of the importance of reporting illicit discharges. Specific components and measureable goals within the county's IDDE program will consist of following the best management practices (BMPs).

A Storm Sewer Outfall Map is now available to county staff and updated through the year. County staff is encouraged to be familiar with the coverage area. Familiarity with the outfalls and the drainage areas will assist in identifying potential sources of stormwater pollution. IDDE is very critical and until public knowledge on the sources, and the cause and effect of storm water pollution has taken hold, it is even more important.

### **Storm Sewer System Map**

The county completed the initial mapping of its storm sewer system in 2003. The mapping is maintained in a Geographical Information Systems (GIS) Database. Detailed information on pipe size, pipe material, flow direction, inlets, manholes, bridges, box culverts, detention ponds and headwalls continue to be updated on the map. The county will continue to work and update the storm sewer system outfall maps during each permit cycle. The stormwater Outfall Map is presented in the **Appendix**.



### **Illicit Discharge Ordinance**

Section 3(B), Paragraph 3(a)(iii) of the NPDES General Permit Number ALR04004 states “To the extent allowable under State and local law, effectively prohibit, through ordinance, or other regulatory mechanism, non-stormwater discharges into your storm sewer system.....and implement appropriate enforcement procedures and actions.”

As previously mentioned above, the county has no authority to implement an ordinance to enforce through law the Illicit Discharge of Material into the county’s MS4. The county will use whatever means necessary to monitor and document the illicit discharge and report illicit discharges to the Calhoun County Environmental Enforcement Office and ADEM for follow up actions.

As described previously the county has in place SOPs for identifying and reporting illicit discharges and will continue its efforts to identify and act on reported illicit discharges. The Storm Water Manager will notify the affected municipalities where appropriate and follow up with notification of the State where required or where further action is needed. The County Storm Water Manager will prepare a follow up report of the actions taken based on the reported information.

### **Stormwater Outfall Reconnaissance**

In 2014, the Storm Water Manager implemented a program based on two SOPs for the inspection of Outfalls and Construction site IDDEs. Forms are available for county staff to use in conducting the inspection of storm water outfalls documenting location and conditions at the storm water outfall and inspecting construction sites. The county staff will assist with the documentation of illicit discharges as well as potential, likely and possible illicit discharges. The goal is to prioritize those areas of illicit discharge for regular inspection as timely and efficiently as possible within the current budget and staffing. The inspection program will affect all of the target audiences.

### **Illicit Discharge Reporting Form**

In 2014, the Storm Water Manager developed an illicit discharge reporting form that residents can download complete and then e-mail back to the Stormwater Manager upon discovering a potential illicit discharge. The County plans to provide 24-hour access to this form through the county’s webpage. This form assists the county in tracking and responding to illicit discharges. The county will continue to use this reporting form during this permit cycle. The Illicit Discharge Reporting Form generally affects all of the target audiences.

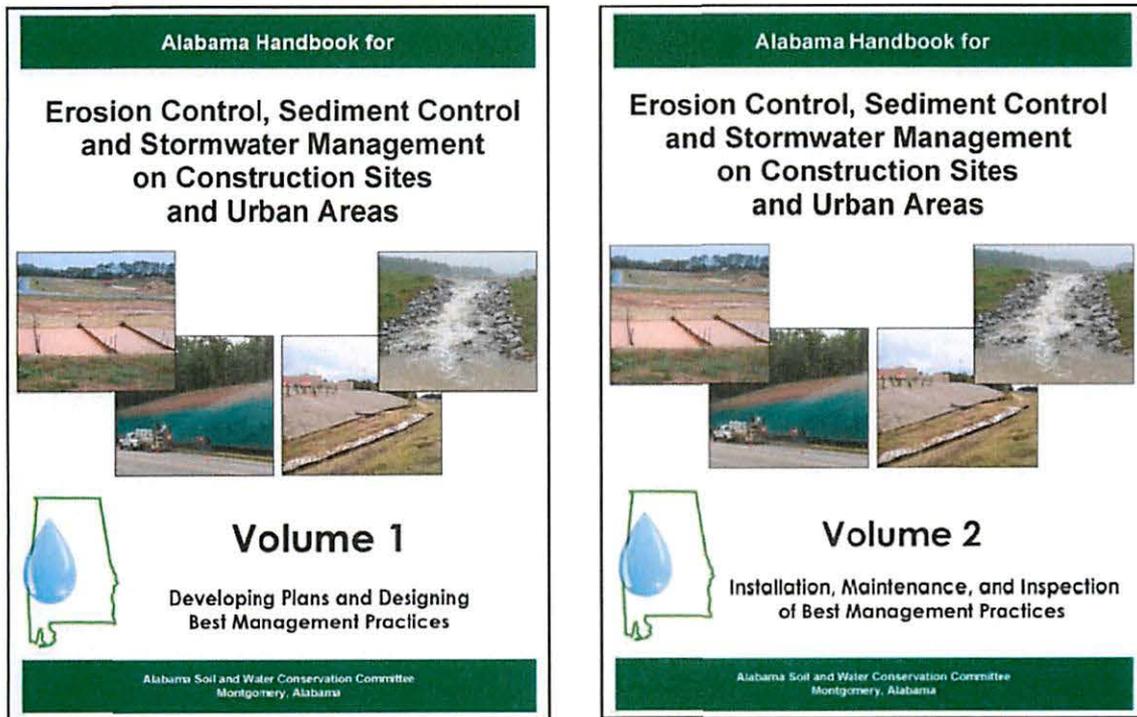
### **Other IDDE Initiatives**

The county will actively pursue new and innovative programs to help eliminate illicit discharges and will work to implement programs that are likely to be successful in the community. In the past the county has conducted limited stormwater sampling at randomly selected outfall points which can be used to target discharge locations and will continue this practice at times in the future to



gauge the effectiveness of the program.

### 3.4 Construction Site Storm Water Runoff Control



[Alabama Handbook for Erosion Control, Sediment Control and Stormwater Management on Construction Sites and Urban Areas -](http://swcc.alabama.gov/pages/erosion_handbook.aspx)

[http://swcc.alabama.gov/pages/erosion\\_handbook.aspx](http://swcc.alabama.gov/pages/erosion_handbook.aspx)

ADEM Administrative Code 335-6-12 implements a state-wide construction storm water regulatory program consistent with the NPDES requirements for construction storm water control.

The County's construction site storm water runoff control program is used to effectively manage construction site storm water. The county's Storm Water Manager continued to manage, enforce and expand its construction site storm water runoff control program during this permit cycle. Overall management and implementation of the county's storm water construction site storm water runoff control program will continue to be the responsibility of the County's Building Inspector.

The county uses Qualified Credentialed Inspectors (QCI) as part of the municipal and county departments for construction area inspections that qualify under the stormwater regulations. Annual training is required to maintain good standing as a QCI. During 2014 the following inspectors received QCI Refresher Training on December 11, 2014:



Jeff Clendenning  
Rusty Gann  
Todd Gauntt  
Vann Hollingsworth  
Randy Hubbard  
Rodney McCain  
Brian Rosenbalm  
Joel Thrash  
Michael Hosch

The county will continue to hold annual workshops for refresher training, copies of the completed QCI forms are on file at the Calhoun County Highway Department.

### **Erosion and Sediment Control Plan Review Procedures and Permitting Process**

Plan review procedures, as well as the construction site permitting process, for developments in the county are outlined in the Alabama Handbook for Erosion Control, Sediment Control and Stormwater Management on Construction Sites and Urban Areas (Alabama Handbook) is available at the County's Engineering Department. Access to the two volumes is also available at the Soil & Water Conservation Committee website at: [http://swcc.alabama.gov/pages/erosion\\_handbook.aspx](http://swcc.alabama.gov/pages/erosion_handbook.aspx) and County webpage: <http://www.calhouncounty.org/highway/stormwater.html>

The county has standardized on the use of the Alabama Handbook for the design, construction and installation of proper erosion and sediment control best management practices on developments within the County. Developers, Contractors and Engineers operating within the county are required to utilize the practices in the Handbook to manage stormwater at construction sites. Additional information is also provided in Alabama County Extension Service ACES, Alabama Low Impact Development Handbook: <http://www.aces.edu/natural-resources/water-resources/watershed-planning/stormwater-management/LID.php>. See Appendix.

### **Procedures for Notifying ADEM of Non-Compliant Sites**

As part of the county's enforcement procedures, the county will notify ADEM, either by phone or email, of any construction sites where a possible violation of the Clean Water Act has occurred. Possible violations could include, but are not limited to: releases of sediment to a Water of the State/U.S. and/or failure to adhere to the county's corrective action request following an inspection. Presented below are the forms under consideration for inspection and reporting:



**BMP INSPECTION REPORT**

Client \_\_\_\_\_ Project name \_\_\_\_\_ and Reg. no. \_\_\_\_\_

Inspected By \_\_\_\_\_ Date and Time \_\_\_\_\_ Page \_\_\_ of \_\_\_

A. Phase of Development: Initial Site Grading \_\_\_ Building and Construction \_\_\_ Punch List \_\_\_

B. BMPs Applied (check all that apply)	Condition of BMPs (check one)			Comments
	Good	Fair	Poor	
<input type="checkbox"/> Construction Exit	___	___	___	
<input type="checkbox"/> Barrier-Class ___ Silt Fence	___	___	___	
<input type="checkbox"/> Check Dams	___	___	___	
<input type="checkbox"/> Diversion	___	___	___	
<input type="checkbox"/> Grass Swale	___	___	___	
<input type="checkbox"/> Inlet Protection	___	___	___	
<input type="checkbox"/> Outlet Protection	___	___	___	
<input type="checkbox"/> Sediment Basin	___	___	___	
<input type="checkbox"/> Temporary Seeding	___	___	___	
<input type="checkbox"/> Permanent Seeding	___	___	___	
<input type="checkbox"/> Groundskeeping	___	___	___	

C. Additional BMPs needed (potential practice and location):

D. Additional Comments:

E. Sampling: Instream sampling necessary to evaluate the effectiveness of BMP implementation based on evaluation of qualified credentialed professional Yes \_\_\_ No \_\_\_

F. Significant rainfall events since last inspection (date and amounts):

G. Inspection report reviewed with responsible owner/operator  
 Inspector \_\_\_\_\_ Date \_\_\_\_\_  
 Responsible owner/operator \_\_\_\_\_ Date \_\_\_\_\_

Figure 4-1 BMP Inspection Report Form



**ADEM FIELD OPERATIONS DIVISION – NPDES CONSTRUCTION, AND NONCOAL MINING LESS THAN 5 ACRES STORMWATER INSPECTION REPORT AND BMP CERTIFICATION**

RESPOND WITH "N/A" AS APPROPRIATE. FORMS WITH INCOMPLETE OR INCORRECT ANSWERS, OR MISSING SIGNATURES WILL BE RETURNED AND MAY RESULT IN APPROPRIATE COMPLIANCE ACTION BY THE DEPARTMENT. IF SPACE IS INSUFFICIENT, CONTINUE ON AN ATTACHED SHEET(S) AS NECESSARY. **PLEASE TYPE OR PRINT IN INK.**

Complete this form, attach additional information as necessary, and send report to the nearest ADEM office

**Item I**

Registrant Name		Facility Site Name	
NPDES AL	County	Facility Contact and Title	
Facility Latitude & Longitude (decimal or deg.min.sec)		Facility Street Address or Location Description	
Township(s), Range(s), Section(s)		City	State      Zip
Phone Number	Fax Number	E-Mail Address	

**Item II**

List name of current ultimate receiving water(s) (indicate if through MS4) and the number of disturbed acres which drain through each treatment system or BMP.

Receiving Water	Disturbed Acres	Receiving Water	Disturbed Acres

**Item III**

Any Discharge Sampling Data Attached   
  Any Instream Sampling Data Attached.   
  Any Photographs attached  
 Based on this site evaluation which a QCI, QCP, or a qualified person under the direct supervision of a QCP conducted, discharge and/or instream sampling is not necessary to properly evaluate the effectiveness of BMP implementation to ensure compliance with this registration. I understand that it is the responsibility of the registrant to know and effectively evaluate the quality of the stormwater being discharged. Lack of knowledge regarding the requirements of ADEM Administrative Code Chapter 335-6-12, stormwater discharge or instream water quality, shall not constitute a valid defense with regard to deficiencies in BMP implementation and maintenance, or negative impacts to water quality.

**Item IV**

INSPECTION RESULTS (Describe current activities, deficiencies, proposed corrective action(s) and compliance schedule, etc.)

---



---



---

"Based upon the inspection of (date & time) \_\_\_\_\_ by the QCP, QCI, or a qualified person (list \_\_\_\_\_) under the direct supervision of the QCP identified below conducted, the QCI or QCP identified below certifies that effective structural and non-structural BMPs have been fully implemented and regularly maintained to the maximum extent practicable for the prevention and minimization of all sources of pollution in stormwater and authorized related process wastewater runoff, **except for those deficiencies noted above**, in accordance with the facility's CBMPP, good sediment, erosion, and other pollution control practices, and the requirements of ADEM Administrative Code Chapter 335-6-12. I certify that discharges have been tested or evaluated for the presence of non-stormwater and non-authorized process wastewaters. I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fines and imprisonment for knowing violations."

Name & Designation of QCI or QCP	Signature	Date
----------------------------------	-----------	------

Name & Title of Registrant Responsible Official	Signature	Date
---	-----------	------

Figure 4-2 ADEM Form 500 1-03 FOD Stormwater Registration Inspection Report Page 1 of 1



### **Procedures for Receipt of Information Submitted by the Public**

The county's webpage provides contact information where the general public can provide information regarding potential erosion and sediment control concerns. The general public can also report potential concerns by contacting the County's Storm Water Manager at the following address: Mr. Chris Gann, 160 Seaton Drive, Anniston, AL 36201 Phone: 256-237-4657 Fax: 256-237-2009. The county responds to each concern in a timely and efficient manner.

### **3.5 Post Construction Site Storm Water Management**

The NPDES permit ALR040004 states that the permit holders are to develop, implement and enforce a program to address storm water runoff from new and re-development projects that fall under any imposed ordinances or that qualify for permitting under ADEM storm water runoff for qualifying sites.

The county utilizes and recommends the methods and designs from Alabama Handbook to control and improve post-construction stormwater runoff from new development and redevelopment during the permit cycle. Potential benefits of effectively controlling post-construction stormwater runoff include: water quality improvements, minimization of stream erosion and effective control of potential flooding impacts. The county encourages post-construction storm water management utilizing the methods laid out in the Alabama Handbook designed to address storm water pollution from nutrients, sediments and pathogens.

The strategy for the target audiences described above will vary depending on the type of audience and the potential risk and impact of pollutant contribution from post-construction storm water runoff. Overall management and implementation of the county's post-construction storm water management program will be the responsibility of the County's Storm Water Manager.

Overall success of the post-construction storm water management program will primarily be gauged through water quality monitoring as well as visual observations of stream erosion and flooding impacts. The county emphasizes the use of specific components and measureable goals within our post-construction storm water management program. Current construction designs use well developed structural and non-structural controls to manage storm water at all qualifying construction sites for the duration of use for the particular piece of property. The particular controls designed for each construction site are maintained in order to restore runoff to the original or better quality of runoff before construction began to minimize volume and velocity of runoff to the highest extent practicable.

### **Non-Structural BMPs**

#### **Engineering Design and Construction Manuals**

The county utilizes the Alabama Handbook in its construction projects and requires Developers, Contractors and Engineers to follow the guidelines of the Handbook. Web links to the manuals are



listed on the county's website on the Stormwater tab. These methods are known to effectively address stormwater runoff. Using the Handbook identifies project requirements and specifications for new stormwater infrastructure.

The Storm Water Manager utilizes the Handbook that includes engineering design criteria for sewer and water infrastructure, as well as stormwater BMPs for water quality protection such as rain gardens and storm water wetlands.

The county will continue to use the Handbook as a guide for the design and construction of appropriate BMPs to effectively manage post-construction stormwater runoff during each permit cycle.

### **Conservation Subdivision Regulations**

The Stormwater Manager began work on the development of conservation subdivision regulations to aid in the protection of local water resources. The subdivision stormwater design guidelines are expected to be completed in 2015. The timeline for the implementation is listed below:

Feb. 27th – First Review back from the County Attorney

Apr. 15th – Public Hearing with comments from Builders, Surveyors, etc.

May 15th – Review and Revision

June 15th – Final Revisions

July 23th – Tentative Passage Date

The regulations promote water resource protection through the setting aside of open space, concentrating development away from water resources and promoting low impact development concepts.

The County continues to promote the use of stormwater conservation subdivision guidelines. These conservation subdivision guidelines primarily affect a target audience that includes engineers, developers, contractors and homebuilders. Included in stormwater guidance documents being prepared by the county are the management practices and controls designed to achieve runoff control goals that have been set.

The proposed guidelines include information on practices such as placement of drainage structures and establishment of permanent vegetation to assist in runoff management. Site approval and inspections processes is addressed in the guidance and inspection intervals are in line with minimum inspections as set forth through the ADEM's existing regulations and procedures. Tracking of all qualifying projects will be administered using the same GIS system used in the IDDE section control measure BMP. A scheduled annual review and evaluation of all sites will be conducted approximately one year after project completion.



## **Structural BMPs**

### **Detention Pond Inspections**

Projects undertaken by the county engineering staff and other department are rarely large enough to incorporate or utilize the design of a detention pond. On sites where there are existing detention ponds, periodic inspections to evaluate the maintenance and operation of these vital components of the county's drainage system and can often identify potential problems. When needed the Storm Water Manager is tasked with performing annual inspections of all detention ponds (public and private) listed in the county's stormwater inventory. Upon inspection, the owner of the pond is notified of any corrective actions needed. Enforcement measures will be taken if the owner does not address the items listed in the report. Examples of 2014 inspection reports are provided in the Appendix.

### **Design Guidelines for Structural BMPs**

The county utilizes the Alabama Handbook as its guideline for the design, construction, installation and maintenance of stormwater BMPs. These guidelines primarily affect a target audience of engineers, developers and contractors.

### **Long-Term Maintenance of BMPs**

Long-term maintenance of structural BMPs is a critical component to ensure that these BMPs continue to function as originally designed. The county will implement requirements for a maintenance agreement that ensures the long term maintenance of these structures.

The county is continuing to work to issue and update standard agreements or other mechanisms for developers, homeowner associations, and other groups to ensure the long-term maintenance of structural BMPs.

### **3.6 Pollution Prevention and Good Housekeeping for Municipal/County Operations**

The county has developed a program of education and training employees about spill prevention and storm water management and pollution prevention. This periodic training includes, storm water management, potential contaminant sources and best management practices as well as quick response techniques for spills and accidents at all facilities. During the 2014 reporting period, county staff was provided training utilizing through a MS4 power-point presentation presented by the Stormwater Manager, Mr. Chris Gann. A copy of the presentation is provided in the Appendix.

Training and education in 2015 will include presentations of instructional videos:

**Oil and Water**; "Do Not Mix", Spill Prevention Control and Countermeasures

**IDDE**; "A Grate Concern", Illicit Discharge Detection and Elimination

**Ground Control**; Stormwater Pollution Prevention for Construction Sites

**Rain Check**; Stormwater Pollution Prevention for MS4s



The county's program is intended to reduce storm water pollution and promote good housekeeping measures in municipal operations. The county will continue to expand upon and work to improve its training and education programs during each permit cycle. Potential benefits from an effective pollution prevention/good housekeeping program for municipal operations include: reduced storm water pollution from municipal operations and increased employee awareness regarding the effect of their daily activities on storm water management.

### **Stormwater Management Training**

The county Staff attends and participates when possible, in a workshops and seminars where storm water/water quality related issues and information is provided. The Storm Water Manager attended training in Montgomery in 2014. Training provided information and resources utilized by the Storm Water Manager and other county departments on using methods for implementing site control measures on construction projects. County personnel also attend training opportunities including ADEM conferences and workshops, regional conferences and national conferences when available. County Staff attends conferences such as the 25<sup>th</sup> Annual Nonpoint Source Conference, held January 22<sup>th</sup> 2014 to stay current on stormwater management information.

County Staff receives updated information and reminders as part of their periodic Safety and Information meetings. The staff is reminded of the importance of controlling stormwater run-off along county roads and the importance of spill cleanup at the county facilities. In the past the county has utilized a number of videos to make staff aware of the stormwater issues and will continue to use the aids as part of their training information.

Documentation and the program's sign-up sheet are located in the **Appendix**. The Storm Water Manager reviews the SPCC Plan with county staff in conjunction with other scheduled meetings and training sessions. A number of informal workshops held during the year target county employees who deal with fuels and chemicals on a daily basis and provide basic information on the proper management, handling and disposal of potentially hazardous chemicals. The county will continue to create, offer and encourage storm water management training for county employees during the each permit cycle.

### **Certified Herbicide Applicators**

The Calhoun County Highway Department maintains trained and certified personnel in the application of herbicides, including both restricted use and non-restricted use herbicides. County personnel attend various training events to maintain their certification. By obtaining certification, applicators become knowledgeable of the proper use and application of fertilizers and herbicides to maintain county right-of-ways. The staff uses the best management practices which are intended to reduce the need for herbicides, fertilizers and water. The county will continue to maintain certified personnel in trained in the application of herbicides.





**APPENDIX**



## MS4: When It Rains It Drains Campaign

Tuesday, September 2, 2014

Calhoun County launches a campaign to keep its municipal separated storm waters sewer system clean and healthy. The campaign, loosely titled M-S-4 was inspired by a big problem found in other cities. The problem was the pollution of area waters due to trash, debris from leaves, and fertilizer. Calhoun County Assistant Engineer, Chris Gann, says that he watches over the county's storm water runoff. And he sees M-S-4 as an educational opportunity to teach citizens the slogan: When it rains it drains. Gann adds that the city's aging storm water system is especially vulnerable in local urbanized areas because of the high concentration of pollutants found in the water's discharges. The Calhoun County Highway Department says that the pollutants can substantially increase damage to surfaces, such as city streets, driveways, parking lots, and sidewalks. Gann said that people need to realize that commonly used fertilizer can result in destruction. The M-S-4 When it Rains it Drains campaign urges people to help protect waterways and keep public health at its best. The Calhoun County Highway department has created Public Service Announcements that will air on your local radio and television stations. The department will also attend special events in the county for further promotion. For more information on the campaign, visit [calhouncounty.org](http://calhouncounty.org) and go to the highway department tab.



## TV-24 MS4 Segment

**PURCHASE REQUISITION**

REQUISITION NUMBER

**9924520**

**CALHOUN COUNTY COMMISSION**  
 1702 Noble Street, Suite 103  
 Anniston, Alabama 36201-3889

<b>SUGGESTED VENDOR</b>	<b>VENDOR NUMBER</b>
THE ANNISTON STAR P.O. BOX 2234 ANNISTON, AL 36202	2375

<b>REQUESTING ORGANIZATION</b>	
<b>NAME</b>	CALHOUN COUNTY HWY DEPT ENGINEERING
<b>ACCOUNT NUMBER</b>	111-53100-253
<b>AMOUNT</b>	\$696.00

QUANTITY	DESCRIPTION	UNIT PRICE	TOTAL
1.00	COST OF MS4 NEWSPAPER AD TO RUN ON 10/15/2014 >>> COPY OF AD ATTCHD <<<	\$696.00	\$696.00
<b>TOTAL AMOUNT</b>			\$696.00

*PO # 15-91*

<b>SHIP TO</b>			
CALHOUN COUNTY HWY DEPT 160 SEATON DRIVE ANNISTON, AL 36205			
<b>BUILDING</b>	<b>ROOM</b>	<b>PHONE</b>	
<b>INSTRUCTIONS</b>			
Requisitions must be typed. Complete all information items. Forward copy to Commission Office. Sufficient funds must be available in the account listed. Check all prices and additions. If vendor source not known, call County Commission 241-2800. If additional space is required to list items to be purchased, attach (in duplicate) additional items on plain paper. Use above format.			

<b>REQUESTED BY</b>	CHRISTOPHER H GANN
<b>BUDGET MANAGER</b>	10/01/2014
<b>DATE</b>	

<b>REMARKS</b>
LH



**WHEN IT RAINS, IT  
DRAINS!!**

The Calhoun County Commission invites you to the **FREE DUMP DAY** at the Calhoun County Landfill on October 18, 2014. Limbs, yard debris, and litter in ditches are problems for everyone. Please use this opportunity to help us keep the drainage ways and ditches clean of yard debris and litter.



# CALHOUN COUNTY COMMISSION

24520  
PURCHASE ORDER

2014 Calhoun County Storm Water Management Report

CALHOUN COUNTY HIGHWAY DEPT  
160 SEATON DRIVE

1702 NOBLE STREET  
ANNISTON, ALABAMA 36201-3889  
PHONE (256) 241-2800  
FAX (256) 241-2790

10/03/14  
DATE

15-0000091-001  
No.

ANNISTON

AL 36205

VENDOR NO. 2375

PURCHASE ORDER NUMBER MUST APPEAR ON ALL INVOICES, SHIPPERS, BILL OF LADING AND CORRESPONDENCE. —  
SUBMIT ALL INVOICES IN DUPLICATE TO ADDRESS ABOVE.

V  
E  
N  
D  
O  
R  
CONSOLIDATED PUBLISHING CO.,  
INC.. DBA..  
THE ANNISTON STAR  
PO BOX 2234  
ANNISTON AL 36202

F.O.B.	VIA
DELIVERY REQUIRED	TERMS
10/31/2014	

QUANTITY	QUANTITY RECEIVED	UNIT	DESCRIPTION	UNIT COST	TOTAL COST
1.00	.00	EA	COST OF MS4 NEWSPAPER AD TO RUN ON ON 10/15/2014 ***COPY OF AD ATTCHD*** 111-53100-253 \$696.00	696.00	696.00

MARLEY DIRECT INQUIRIES TO

X SIGNATURE

*Jim Hodges*

696.00

### IMPORTANT INSTRUCTIONS

- CALHOUN COUNTY COMMISSION RESERVES THE RIGHT TO REFUSE OR RETURN SHIPMENT UNLESS INSTRUCTIONS ON THIS PURCHASE ORDER ARE FOLLOWED.
- PURCHASE ORDER NUMBER MUST BE SHOWN ON ALL CORRESPONDENCE, SHIPPING NOTICES, PACKING SLIPS, CARTONS, AND INVOICE.
- ALL CORRESPONDENCE AND INVOICE IN DUPLICATE MUST BE DIRECTED TO COMMISSION OFFICE.
- EACH PURCHASE ORDER MUST BE INVOICED SEPARATELY.
- ALL SHIPMENTS MUST BE ACCOMPANIED BY ITEMIZED PACKING SLIPS.
- STATE INSTITUTION: ALL TAXES EXEMPT.
- FREIGHT PREPAY & BILL

VENDOR COPY

2014 Calhoun County Storm Water Management Report

Consolidated Publishing Co., Inc.  
PUBLISHERS OF:

THE ANNISTON STAR (AS)      THE DAILY HOME (DH)  
THE OXFORD SUN (OS)      THE ST. CLAIR TIMES (SCT)  
THE JACKSONVILLE NEWS (JN)      THE HOMETOWN MARKETPLACE (HTM)  
THE CLEBURNE NEWS (CN)      THE COOSA MARKETPLACE (CSM)  
THE PIEDMONT JOURNAL (PJ)      THE COOSA VALLEY ADVANTAGE (CVA)

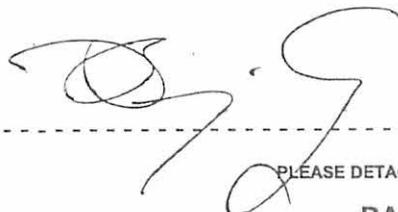
ADVERTISING INVOICE and STATEMENT

BILLED ACCOUNT NUMBER	BILLING DATE	TOTAL AMOUNT DUE	STATEMENT NUMBER
105189	10/31/2014	\$696.00	291891
BILLING PERIOD	TERMS OF PAYMENT	PAYMENT DUE	PAGE #
10/01/2014 - 10/31/2014	Net 30	11/30/2014	1 of 1
ADVERTISER/CLIENT NUMBER	ADVERTISER/CLIENT NAME		
105189	CALHOUN COUNTY HIGHWAY DEPT		
CURRENT	30 DAYS	60 DAYS	OVER 90 DAYS
\$696.00	\$0.00	\$0.00	\$0.00

CALHOUN COUNTY HIGHWAY DEPT  
160 SEATON DR  
ANNISTON, AL 36205

Account Summary	
Previous Balance	\$0.00
Payments on Account	\$0.00
New Charges, Debits	\$696.00
Credit Adjustments	\$0.00
Finance Charges	\$0.00
<b>Total Amount Due</b>	<b>\$696.00</b>

DATE	NEWSPAPER REFERENCE	DESCRIPTION - OTHER COMMENTS / CHARGES	SAU SIZE BILLED UNITS	TIMES RUN RATE	NET AMOUNT
09/30/2014		Previous Balance			0.00
10/15/2014	Ad #610156	A SECTION	3 x 8 I	1	
	Order #205435	PO: 15-91	24 I	29.00	
		Anniston Star			696.00
10/31/2014		Balance Due			696.00



PLEASE DETACH AND INCLUDE WITH YOUR PAYMENT

PAYMENT COUPON

STATEMENT NUMBER	BILLING DATE	TERMS OF PAYMENT	PAYMENT DUE	ADVERTISER/CLIENT NUMBER	ADVERTISER/CLIENT NAME
291891	10/31/2014	Net 30	11/30/2014	105189	CALHOUN COUNTY HIGHWAY DEPT

Please send your payment to :

CONSOLIDATED PUBLISHING CO., INC  
THE ANNISTON STAR  
PO BOX 2234  
ANNISTON, AL. 36202

105189  
CALHOUN COUNTY HIGHWAY DEPT  
160 SEATON DR  
ANNISTON, AL 36205

TOTAL AMOUNT DUE	AMOUNT ENCLOSED
\$696.00	

# Calhoun County Alabama



[Home](#) | [Offices](#) - [Government](#) - [Employment](#) - [Links](#)

Home | Highway Department | Storm Water

**About Us**

[Our New Location](#)

[Bridge Information](#)

[Road Information](#)

[Storm Water Info](#)

[FAQ](#)

[Forms and Maps](#)

[Department Home](#)



**OTHER RESOURCES**

[Alabama DOT](#)

[US DOT](#)

**Calhoun County Highway Department**  
160 Seacor Drive  
Anniston, AL 36205  
Phone: 256-237-4657  
[highway@calhouncounty.org](mailto:highway@calhouncounty.org)

## Calhoun County Storm Water Information

---

Calhoun County is designated by the United States Environmental Protection Agency (USEPA) and the Alabama Department of Environmental Management (ADEM) as an owner/operator of a Phase II municipal separate storm sewer system (MS4). The USEPA's Phase II Stormwater Regulations, which were implemented in March 2003, require operators of regulated Phase II MS4s to obtain a National Pollutant Discharge Elimination System (NPDES) permit and to develop a stormwater management program designed to protect water quality and to prevent harmful pollutants in stormwater runoff from being washed into the MS4. The County received its current Phase II Stormwater NPDES permit (ALR040004) on January 31, 2011. ADEM revised and reissued this permit on February 24, 2012. The current permit coverage will expire on January 31, 2016.

The intent of the Phase II regulations is to reduce the adverse impacts to water quality and aquatic habitat by instituting the use of controls on the unregulated sources of stormwater discharges. In order to comply with these regulations Calhoun County must satisfy six "minimum control measures," including:

- Public Education and Outreach
- Public Participation/Involvement
- Illicit Discharge Detection and Elimination
- Construction Site Runoff Control
- Post-Construction Stormwater Management
- Pollution Prevention/Good Housekeeping

**Useful Links**

[Calhoun County Storm Water Plan \(Adobe pdf document\)](#)

[Phase II Information](#)

[Urbanized map for Calhoun County \(Adobe pdf document\)](#)

[Alabama Low Impact Development Handbook](#)

## 2015 Calhoun County Webpage

<http://www.calhouncounty.org/highway/stormmain.html>

## 2014 Calhoun County Storm Water Management Report

### **Environmental Programming in Calhoun County 1/1/2014 – 12/31/2014**

#### Water & Water Cycle

2/20/14 Anniston Middle School, 6th grade (129)  
6/10/14 CVYS Attention (13)  
6/18/14 Camp Cane Creek (15)

#### Career Exploration – Neely Henry Dam/Water Quality

3/11/14 Camp Lewis Academy (23)

#### Water Quality & Critters / Floating the Creek

5/8/14 Tree Amigos 4H Club (15)  
5/21/14 WEE Environmental 4H Club (35)

#### Reduce, Reuse, Recycle – Importance of a Clean Environment

3/5/14 Randolph Park Elementary, 5th Grade (36)  
3/6/14 Constantine Elementary, 5th grade (19)  
3/12/14 Golden Springs 5th grade (30)  
3/19/14 Cobb Elementary, 5th grade (24)  
4/17/14 Anniston Middle School, 6th grade (129)  
10/28/14 Wellborn Elementary (100)  
11/7/14 Pleasant Valley Elementary (75)  
11/13/14 Ohatchee Elementary (75)  
11/18/14 Coldwater Elementary (40)  
11/25/14 Coldwater Elementary (40)

#### JSU Recycling Drive

11/12/14 Jacksonville State University (approx. 250)

#### Chamber of Commerce Recycling Drive

11/14/14 Quintard Mall Parking lot, Oxford (approx. 200)

#### Enviroscape – Watersheds and Water Pollution

3/20/14 Anniston Middle School 6th grade (129)  
4/9/14 Earth Day/Calhoun County 4th grade (407)  
4/10/14 Earth Day/Calhoun County 4th grade (405)  
4/23/14 Earth Day/Kitty Stone Elementary K5 (110)  
7/23/14 Camp Cane Creek (16)

## 2014 Calhoun County Storm Water Management Report

### Drinking Water Management

4/9/14 Earth Day/Calhoun County 4th grade (407)  
4/10/14 Earth Day/Calhoun County 4th grade (405)

### Water Cycle Bracelets

6/18/14 Camp Cane Creek (15)

### Watershed Academy – Principles of Water Quality, Planning & Restoration

1/16-17/14 Cane Creek Gardens at McClellan (30)

### Cookie Mining (Mining & It's Impacts on the Environment)

5/16/14 CVYS Attention (9)  
7/21/14 Camp Cane Creek (16)

### Dirty Bird (Oil Spill Disaster)

6/24/14 Camp Cane Creek (15)

### Swim Suitable (Hazardous Swimming)

6/24/14 Camp Cane Creek (15)

### To Fertilize or Not to Fertilize?

6/24/14 Camp Cane Creek (15)

### All Tied Up (Litter)

6/24/14 Camp Cane Creek (15)

### Why Recycle?

7/8/2014 CVYS Attention (11)  
7/14/14 Camp Cane Creek (16)  
7/16/14 Camp Cane Creek (16) \*made recycled ornaments  
7/25/14 Camp Cane Creek (16) \*made recycled glitter globes

### What a Waste!! (Waste Management)

7/14/14 Camp Cane Creek (16)

### Trash Flash through Time

7/14/14 Camp Cane Creek (16)

## 2014 Calhoun County Storm Water Management Report

### Trash Patrol, EPA & Proper Disposal

7/14/14      Camp Cane Creek (16)

### We're Down in the Dumps (Landfills)

7/14/14      Camp Cane Creek (16)

### Water Quality

7/16/14      Camp Cane Creek (16)

### Edible Aquifers

7/22/14      Camp Cane Creek (16)

### Daily Camp Cane Creek Activities (2 wks in June & 2 wks in July)

- Creek walk to observe environment, habitats & creatures.
- Observe chick eggs hatching.
- Weather Station.
- Gardening – weeding & watering.
- Observe terrarium & aquarium.

### Educational Videos Shown During Camp (2 wks in June & 2 wks in July)

- “Wall E”
- “Magic School Bus: Under the Sea”
- “Planet Earth”

### Classroom in the Forest: Forest in the Classroom

7/23/14      Camp Cane Creek (16)  
10/23/14      DeArmanville Elementary, 2nd grade (300)  
10/24/14      White Plains Elementary, 5th grade (135)  
10/30/14      Calhoun County 4H Homeschool Club (18)

### Water Conservation / Rain Barrel Workshop

5/17/14      Cane Creek Gardens, McClellan (23)

### Zero Waste & Water Quality

9/20/14      Fall Festival (approx. 500 participants)

### Recycling & Composting

10/14/2014      Anniston Public Library (30)

2014 Calhoun County Storm Water Management Report

Recycled Crafts

12/2/14 Wellborn Elementary (50)

12/11/14 Wellborn Elementary (50)

Talladega Co. Electronics Recycling

12/9/14 Munford Middle School (approx. 100)

### What is MS4?

Municipal separate storm sewer means a conveyance or system of conveyances that are owned or operated by State , City, Town, or County.

---

---

---

---

---

---

---

---

### What is a conveyance system?

- A conveyance system is a man-made system that carries storm water from one location to another.
- Storm sewers, storm drains, curbs, gutters, streets, ditches, flumes, etc.

---

---

---

---

---

---

---

---

### When it rains, it drains!



---

---

---

---

---

---

---

---

### Let's Talk About...

- ◆ What storm water is and why it can be a problem in our community.
- ◆ What our community is doing to manage storm water and how these activities will benefit us.

---

---

---

---

---

---

---

### What is Storm Water?

- ◆ Rain events



- ◆ Other surface runoff



---

---

---

---

---

---

---

### Where Does Storm Water Go In Our Community?

- ◆ Travels Over Land
- ◆ Carried through municipal separate storm sewer systems (MS4)
- ◆ Discharges into creeks, streams, and rivers

---

---

---

---

---

---

---

### A "Point" of Confusion: Point Source vs. Nonpoint Source

- ♦ POINT source
  - Travels through a conveyance system
  - Regulated under the permit program
- ♦ NONPOINT source
  - Runoff that is not a point source
  - Addressed through voluntary programs

---

---

---

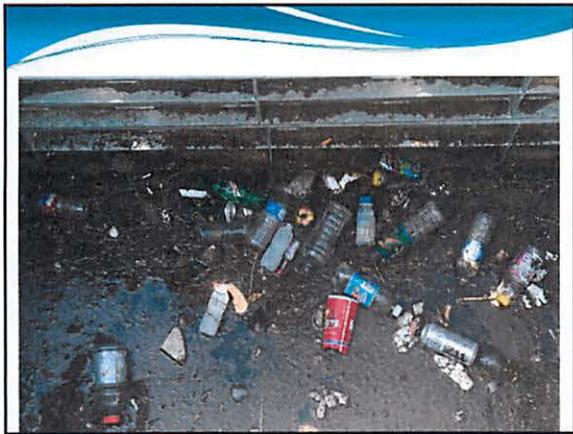
---

---

---

---

---



---

---

---

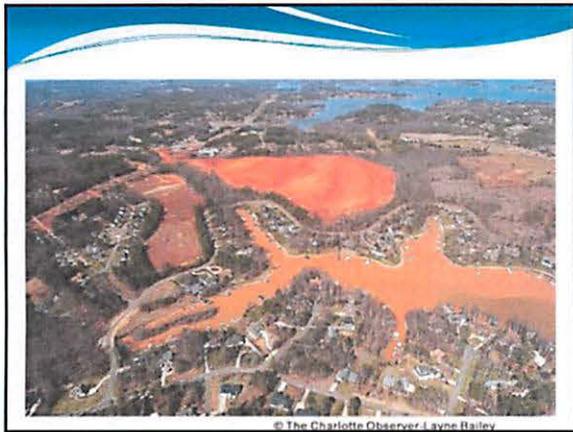
---

---

---

---

---



---

---

---

---

---

---

---

---

### Why is Storm Water a Problem?

- ◆ Problem: Decrease in quality
- ◆ Problem: Increase in quantity
- ◆ Cause: Developed and disturbed land



---

---

---

---

---

---

---

---

### Why is Storm Water a Problem?

- ◆ Problem: Non-storm water discharges enter systems
- ◆ Cause: Illicit discharges
- ◆ Cause: Illicit connections



---

---

---

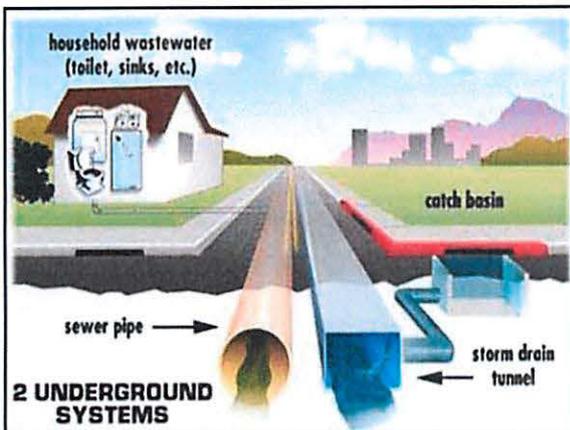
---

---

---

---

---



---

---

---

---

---

---

---

---

**Storm Water Pollutants**

- Sediment
- Trace Metals
- Nutrients
- Toxic Chemicals
- Bacteria
- Chlorides
- Oxygen Demand
- Thermal Impacts
- Oil and Grease

---

---

---

---

---

---

---

**Now We Know About Storm Water and Its Impacts on Our Community....**

**But What Are We Doing About It???**

---

---

---

---

---

---

---

**Storm Water Permit Program for Small Communities**

- New federal regulation requires permits for our community.
- ADEM created a state permitting program to meet federal regulations.

---

---

---

---

---

---

---

### What Does Our Permit Require?

- ♦ Implementation of storm water management program
- ♦ Tracking of our progress towards goals
- ♦ An annual report on our progress

---

---

---

---

---

---

---

---

### Our Storm Water Program

- ♦ Public Education
- ♦ Construction Site Runoff Management
- ♦ Illicit Discharge Detection and Elimination
- ♦ Public Involvement
- ♦ Post-Construction Storm Water Management
- ♦ Good Housekeeping and Pollution Prevention

---

---

---

---

---

---

---

---

QUESTIONS?

---

---

---

---

---

---

---

---

Perhaps equally important, the virtual labs were able to accommodate more students and proved less expensive to operate.

A typical introductory biology course might include eight lab classes with 192 students, said Robert Desharnais, a biology professor at the campus who directs Cal State's Virtual Courseware Project. Virtual labs have allowed the university to double the number of sessions offered while using the same number of instructors and rooms, Desharnais said.

Helping students enroll in required classes sooner in their academic careers and move on to graduation is a key objective for California's public colleges, which lost billions in state

iversity can save money, so it makes sense." Some researchers worry that cash-strapped colleges are too ready to embrace

**JAY ROLLINS HEATING & AIR CONDITIONING**

**Rheem**

For high efficiency sales and service call Jay Rollins Heating and Air Conditioning (256) 835-3109

The membership of the Citizens Advisory Committee (CAC) of the Calhoun Area Metropolitan Planning Organization (MPO) is published annually as required by the Federal Highway Administration and the Federal Transit Administration by MAP-21 (Moving Ahead for Progress in the 21<sup>st</sup> Century Act) and as required by Section 5 of the Public Involvement Procedures adopted by the Calhoun Area MPO on June 14, 1994, updated in April 2008 and replaced by the "2013 Public Participation Plan" adopted August 15, 2013. Members of the CAC serve 4 year terms, unless reappointed. All CAC meetings are open to the general public. If you have any questions, please contact: Jack Plunk, Principal Planner, at (256) 237-6741, Fax (256) 237-6742, [jack.plunk@earpdc.org](mailto:jack.plunk@earpdc.org) or PO Box 2186, Anniston, AL 36202 or visit: [www.earpdc.org/Programs](http://www.earpdc.org/Programs)

**CITIZENS ADVISORY COMMITTEE (CAC)**

November 2014

**ANNISTON**

- Bob Jackson
- Ed Kimbrough
- Joan McKinney
- Carl Neuman
- Vacant
- Carloa Woodward
- Dr. Mike Kimberly
- Telesa Stanford Allen
- Marcus Boykin
- John Wheeler
- Phillip Kelth
- Judy Myers
- Kumira Lemon

**CALHOUN COUNTY**

- Bill Gann
- Floyd Tredaway
- Shirley Miller
- Robert Pyles
- Dennis Reeves, CAC Chairman
- Richard Stubbs
- Carol Hagan
- Charles J. Freeman
- Charles Doster
- Dr. David West

**WEAVER**

- Phillip Smith
- Andrew Nelson
- Pattie Fuester

**ALDoT**

- Vacant, Multi-Modal Section

**HOBSON CITY**

- Patricia Green
- Joe L. Cunningham
- Rev. Deborah Hunter

**OXFORD**

- Vacant
- Randy Cosper
- Vacant
- Vacant
- Brandon Freeman
- Marshall Shaddix
- Vacant
- Robert Dark
- Lavoy Jordan
- Jack W. Brim
- Vacant
- Vacant
- Vacant

**JACKSONVILLE**

- Nelson Coleman
- David Thompson
- Karen Davis
- Chief T. L. Thompson
- Lamar Sims
- Kyle Warmack
- Jamie "Red" Etheridge

**ANNISTON ARMY DEPOT**

- Mike Mathews
- Vacant
- Len Hearnon

Anniston State 11/23/14

**Give.**  
To help  
me live.



Show your support for St. Jude Children's Research Hospital® by donating in our stores today.



Thanks and Giving®

© 2014 AL CAC/St. Jude Children's Research Hospital

## Calhoun County Wants Your Help With Illicit Discharges

---

### What is an illicit discharge?

An illicit discharge is a discharge of pollutants or non-stormwater materials such as sanitary wastes, yard debris, and auto fluids into a stormwater drainage system.

### What are types of illicit discharges?

Non-stormwater discharges include: sanitary wastewater including pet waste, paint, herbicides, pesticides, yard waste, automotive fluids, soaps, roadway accident spills, concrete washout water, and sediment.

### What is Calhoun County doing to prevent illicit discharges?

The county is educating the public with brochures, pamphlets, and information on [www.calhouncounty.org](http://www.calhouncounty.org). The county is also using a citizen's advisory board composed of business owners and professionals throughout many different industries. The county is also educating the people that work for or with the county through meetings and on-site training.

### What can you do to help?

- Never dump anything down a stormdrain.
- Dispose of yard and pet wastes properly.
- Avoid excess use of lawn fertilizers.
- Wash your car on your lawn instead of the street or other impervious paving.
- Wash your car at car wash facility.
- Be aware of stormdrains that have flow during dry conditions, and report flows that have noticeable odor, discoloration, or oily sheens.
- Make sure your sanitary, laundry, carwash, or industrial wastewaters do not drain to a storm drain.
- Report any concerns, suspicious activities or incidents of illegal dumping to Calhoun County at 256-237-4657.

## Calhoun County Stormwater Cooperative Awareness Survey

*The survey is intended to identify the target audience and its understanding of stormwater issues in Calhoun County.*

Mark all that apply:

- Resident
- Business Owner
- Contractor
- Engineer

**How would you finish this sentence?**

***Rinsing out a paint brush or washing your car on the street....***

- is okay, because the water flows into the storm sewer or ditch.
- is not a good idea, because the water flows into the nearest creek or pond.
- I have no idea.

**Rate each of the following (from 1-5, where 1 is a serious problem and 5 is considered a problem):**

***How much of a water quality problem for local streams and rivers do you feel each of the following pose?***

- Garden fertilizers running off yards?
- Garden pesticides running off yards?
- Pet waste?
- Automobile maintenance items such as oil and anti-freeze?

2014 Calhoun County Storm Water Management Report

**Which of the following types of products have you or a contractor used during the past growing season for pest control?**

- Household products (soap-based sprays)
- Weed Killer (Round-Up)
- Insecticides (Sevin)
- Broadcast weed/fertilizer products (i.e. Weed and Feed)
- Biological Agents (i.e. Lady bugs, Bt)
- Did not use Pesticides
- Products labeled for organic farmers
- Don't have a yard

**In the past year have you seen anyone living near you or in your neighborhood dumping items into a stream, creek, open ditch, or a storm drain?**

- Yes, I have seen someone dumping items into storm drainage areas.
- No, I have not seen someone dumping items into a storm drainage areas.

**Which of the following would be the FIRST information source you would look to for information about water quality?**

- Newspaper
- Utility Bill Insert
- Public Library
- Sierra Club/ or Organization Mailing
- County/City Web Page
- Channel 24
- EPA Web Page
- Other (Please Specify) \_\_\_\_\_

2014 Calhoun County Storm Water Management Report

Calhoun County Stormwater Cooperative Awareness Survey  
Total Responses - 14

Type of Responder	Responses					Unresponsive	Comments
Resident	14						
Business Owner	3						
Contractor	1						
Engineer	1						
<b>Finish the Sentence: <i>Rinsing out a paint brush or washing your car on the street....</i></b>							
is okay, because the water flows into the storm sewer or ditch.	13						
is not a good idea, because the water flows into the nearest creek or pond.	1						
I have no idea.	1						
<b>Rate from 1-5, where 1 is a serious problem and 5 is considered a problem</b>							
<b>How much of a water quality problem for local streams and rivers do you feel each of the following pose?</b>							
	<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>	<b>5</b>		
Garden fertilizers running off yards?	2	1	3	2	1	5	
Garden pesticides running off yards?	3	1	2	1	1	5	
Pet waste?		1	3		6	4	
Automobile maintenance items such as oil and anti-freeze?	6	3	1			4	
<b>Which of the following types of products have you or a contractor used during the past growing season for pest control?</b>							
Household products (soap-based sprays)	8					1	
Weed killer (Round-Up)	12					1	
Insecticides (Sevin)	7					1	
Broadcast weed/fertilizer products (i.e. Weed and Feed)	5					1	
Biological Agents (i.e. Lady bugs, Bt)	1					1	
Did not use Pesticides						1	
Products labeled for organic farmers						1	
Don't have a yard						1	
<b>In the past year have you seen anyone living near you or in your neighborhood dumping items into a stream, creek, open ditch, or a storm drain?</b>							
Yes, I have seen someone dumping items into storm drainage areas.	1					1	
No, I have not seen someone dumping items into a storm drainage area.	12					1	
<b>Which of the following would be the FIRST information source you would look to for information about water quality?</b>							
Newspaper	7					1	
Utility Bill Insert	8					1	
Public Library	1					1	
Sierra Club/or Organization Meeting						1	
County/City Web Page	3					1	
Channel 24	2					1	
EPA Web Page						1	
Other (Please Specify)	1					1	ADEM

**CALHOUN COUNTY HIGHWAY DEPARTMENT  
MS4 STAKEHOLDERS COMMITTEE MEETING AUGUST 27, 2014**

NAME	SIGNATURE	AGENCY	ADDRESS	PHONE
Phillip T. Burgett	<i>Phillip T. Burgett</i>	Anniston Water	931 Noble Street, PO Box 2268 Anniston, AL 36202-2268	256-241-2000
Stanley Carr	<i>Stanley Carr</i>	City of Jacksonville	320 Church Ave Jacksonville	(256) 435-3582
Jeremy Cruse	<i>Jeremy Cruse</i>	Oxford Water Dept.	600 Perry St. Oxford, AL 36823	256-239-7183
MICHAEL HOSCH	<i>M. Hosch</i>	CALHOUN COUNTY	160 SEATON DRIVE, ANNISTON, AL	(256) 237-4657
Rodney McClain	<i>Rodney McClain</i>	CALHOUN County	160 SEATON DR ANN AL	(256) 237-4657
CHRIS GANN	<i>Chris Gann</i>	CALHOUN COUNTY	160 SEATON DR. ANNIS, AL	(256) 237-4657
JAMES H. GREEN	<i>James H. Green</i>	COA	1128 GURNEE AV. <sup>Anniston</sup> AL 36206	256-231-7790
Kevin Ashley	<i>Kevin Ashley</i>	COA	1128 Gurnee Ave <sup>Huntsville</sup> AL 36205	256-231-7750
BRIAN ROSENBAUM	<i>Brian Rosenbaum</i>	CALHOUN Co	160 SEATON DR. ANNISTON, AL	256 237 4657

2014 Calhoun County Storm Water Management Report

**CITIZENS ADVISORY COMMITTEE**  
 OF THE  
 CALHOUN AREA METROPOLITAN PLANNING ORGANIZATION (MPO)  
 East Alabama Regional Planning and Development Commission  
 Conference Room

September 24<sup>th</sup>, 2014  
 10:00 am

**SIGN-IN SHEET**

Name	City	Email
Richard Stubbs	Calhoun County	rdstubbs@cableone.net
Marshall Head	Oxford	
Michael Smith	Wetumpka	
John E. Brown		EAC/MPO
Patricia Green	Hobson City	
Karen Davis	Jville	Kedavis1990@cableone.net
David Thompson	JSU	
Tommy Thompson	Jville	
Lamar Smith	Jville	
Samie Ethelge	"	
Carol Hagan	cc	carol@carolhagan.com
Josh W. Brin	Oxford	
Joe Cunningham	Hobson City	
NEWMAN CLEMAN	JVILLE	
Chris GANN	CALHOUNCOUNTY	cgann@calhouncount.org
Dennis Reaves	Cal Co.	
BRIAN ROSENBLUM	CALHOUN CO	

**CITIZENS ADVISORY COMMITTEE**  
OF THE  
CALHOUN AREA METROPOLITAN PLANNING ORGANIZATION (MPO)  
East Alabama Regional Planning and Development Commission  
Conference Room

**September 24<sup>th</sup>, 2014**  
**10:00 am**

**SIGN-IN SHEET**

**Name** \_\_\_\_\_ **City** \_\_\_\_\_ **Email** \_\_\_\_\_

*Quinn Jones*

*CALHOUN COUNTY*

## **AGENDA**

### **CITIZENS ADVISORY COMMITTEE OF THE CALHOUN AREA METROPOLITAN PLANNING ORGANIZATION (MPO)**

East Alabama Regional Planning and Development Commission 3<sup>rd</sup> Floor Conference Room

**10:00 am**

**Wednesday, September 24<sup>th</sup>, 2014**

- I. Call to Order**
- II. Introductions**
- III. Old Business**
  - a. Review of CAC minutes for July 23<sup>rd</sup>, 2014
  - b. Approval of CAC minutes for July 23<sup>rd</sup>, 2014
  - c. CAC Appointments and Welcome of New Members
  - d. TBA
- IV. New Business**
  - a. Review of FY 2012-2015 TIP Update and MPO Projects (Handout)
  - b. Review and Comments Final 2040 Long Range Transportation Plan (LRTP)
  - c. Additional Public Meeting for Review of 2040 LRTP – September 30th
  - d. Dual Storm Water Management Plan Review Committee – Brian Rosenbalm, Calhoun County Engineer
  - e. TBA
- V. Other Business**
  - a. Other current transportation projects
  - b. Anniston Express and ADA Para-Transit Ridership
  - c. Next CAC Meeting
  - d. TBA
- VI. Adjourn**

**MINUTES**  
**CITIZENS ADVISORY COMMITTEE (CAC)**  
of the Calhoun Area Metropolitan Planning Organization (MPO)  
Wednesday, July 23, 2014  
10:00 a.m.

Those attending:

Bill Gann	Calhoun County
Richard Stubbs	Calhoun County
Marshall Shaddix	Oxford
Tommy Thompson	Jacksonville
Jack Plunk	EARPDC / MPO
Andy Hatley	Anniston
Phillip Keith	Anniston
Dennis Reaves	Calhoun County
Patricia Green	Hobson City
Shirley Miller	Calhoun County
Carol Hagan	Calhoun County
Joe Cunningham	Hobson City
Dr. Mike Kimberly	Anniston
Jack Brim	BR Williams Trucking

The meeting was called to order by Mr. Dennis Reaves, Chairman.

**OLD BUSINESS:**

Minutes of the CAC meeting of May 21, 2014, were approved on a motion by Dr. Mike Kimberly and seconded by Mr. Bill Gann. Motion carried.

Chairman Reaves called for the discussion of CAC appointments. Mr. Plunk explained that there are seven appointments still needed for the City of Oxford. He appealed to the CAC members to contact him or the respective Mayors if you have a friend or neighbor who may want to serve on the CAC. Chairman Reaves suggested sending a letter to the Mayor with a copy to the Council President, Mr. Waits.

**NEW BUSINESS:**

Chairman Reaves called for Review of the FY 2012-2015 TIP Update and MPO projects. Mr. Plunk briefly reviewed the spreadsheet, that was given as a handout, with the members. He explained that the projects that are highlighted in green have been authorized by the ALDoT to proceed. The most recent changes to the TIP is to add project #3 resurfacing the Chief Ladiga Trail for the City of Weaver and also to add additional funds to project #12 Greenbrier Rd. safety improvements for the

City of Anniston and to the RoW for Lenlock Lane Intersection and McIntosh Rd. projects. The project highlighted in pink will be funded with ATRIP funding for the City of Jacksonville. The money the MPO has allocated for the Jacksonville AL 21 project will be refunded back to the MPO in FY 16.

Next, Chairman Reaves called for the discussion of the report titled "An Economic Analysis of Infrastructure Investment". Mr. Plunk gave the members a report that was prepared by the National Economic Council and the President's Council of Economic Advisors and briefly reviewed it with them. He stated that the news is that the Highway Trust Fund will run out of money September 30<sup>th</sup>, and the last time this happened the ALDoT operated through a continuous resolutions from the Congress for sixty to ninety days at a time. If the Highway Trust Fund gets renewed, ideally it will be for five years of funding. Mr. Plunk pointed out the table on page 3 in the handout stating that 65% of America's major roads are rated less than good condition, 25% of our bridges require significant repair or can't handle today's traffic and 45% of Americans lack access to transit. He also stated that on page 15, there is a graph showing that motorists spend an additional \$601 yearly in maintenance on their vehicles in Birmingham, AL due to sub-par road conditions. Mr. Plunk also pointed out the tables on pages 19, 21, and 24 to review.

Chairman Reaves continued with New Business by calling for the discussion of Pedestrian Safety. Mr. Plunk gave the members a handout titled "Fear on Foot" from the American Planning Association, and briefly reviewed it with them stating that the most at risk groups are the elderly and the Hispanic population. There is also a graph showing that cities in the south are not very pedestrian friendly. On the backside of that article is another article titled "Walking for Health-in Healthy Communities" by Jay Walljasper for review.

#### **OTHER BUSINESS:**

There was a list of current local construction projects and ALDoT sponsored projects in the agenda packet for review. Mr. Plunk briefly reviewed the lists with the members.

Chairman Reaves called for the report on Anniston Express and ADA Para-Transit Ridership. Mr. Plunk also gave the Anniston Express and ADA Para-transit Ridership. There were a total of 10,747 riders for June. For the ADA Paratransit Ridership for June; Anniston had 867 one-way trips, Jacksonville had 184 one-way trips, 34 for Weaver, and Oxford had 190 one-way trips. For the Urbanized area 458 one-way trips and 202 one-way trips for the Rural area.

The next CAC meeting is scheduled for Wednesday, September 24, 2014, at 10:00 a.m. in the EARPDC 3<sup>rd</sup> floor Conference Room.

There being no further business, the meeting was adjourned.

Chairman Reaves then opened the Draft 2040 Long Range Transportation Plan Public Review and Input Meeting. He gave the members a handout with an overview of the 2040 LRTP and briefly reviewed it with them. Mr. Plunk stated that the Long Range Transportation Plan must cover a

twenty year planning period and be updated every five years. He said that urban area is divided into eleven planning areas to better determine land use changes and increases in total households over the next twenty-five years because all trips start at a household every day. An electronic model utilizes number of households to generate trips and assign them to a classified road network. The model also determines the level of service for future road networks and the socio-economic data. The trip assignments by the model determine highway segments on which vehicle trips exceed capacity to show where the deficiency are or will be in the future. Mr. Plunk gave the members a handout which included a map of the urbanized area to show the deficiencies. Next, he gave the members a comment sheet that they can fill out and a copy of the announcement of a formal public involvement meeting to review the Draft 2040 LRTP scheduled for July 31<sup>st</sup> at 2:00 p.m. The public review meeting adjourned.

CAC Members - March 2014				
	<u>Name</u>	<u>Telephone #</u>	<u>Jurisdiction</u>	<u>Company or Interest</u>
1	Bob Jackson	237-4033	Anniston	Tri-Co Supply/CoC Liason to MPO
2	Ed Kimbrough	820-3455	Anniston	New
3	Joan McKinney	235-3995	Anniston	First AL Bank
4	Carl Neumann	403-6561	Anniston	New
5	Andy Hatley	238-8528	Anniston	New
6	Dr. Mike Kimberly	820-4933	Anniston	CDC
7	Carlos Woodward	282-5235	Anniston	New
8	Telesa Stanford Allen	473-4344	Anniston	New
9	Marcus Boykin	453-3358	Anniston	New
10	John Wheeler	237-8279	Anniston	Wakefields
11	Phillip Keith	283-3364	Anniston	New
12	Judy Myers	835-5052 or 225-7135	Anniston	New
13	Kumira Lemon	499-1399	Anniston	New
14	Nelson Coleman	782-2829	Jacksonville	Citizen
15	David Thompson	782-5455	Jacksonville	JSU
16	Karen Davis	435-5243	Jacksonville	Citizen
17	T L Thompson	435-6448	Jacksonville	Chief JPD
18	Lamar Sims	365-5833 or 453-7467	Jacksonville	New
19	Kyle Warmack	435-9483	Jacksonville	New
20	Jamie 'Red' Etheredge	435-0023	Jacksonville	New
21	Bill Gann	236-6225	Calhoun County	Citizen
22	Floyd Tredaway	435-6139	Calhoun County	Citizen
23	Shirley Miller	241-2825	Calhoun County	Citizen
24	Robert Pyles	831-6683	Calhoun County	Chamber of Commerce
25	<b>Dennis Reaves, Chairman</b>	835-0714	Calhoun County	Citizen
26	Richard Stubbs	820-4155	Calhoun County	Citizen
27	Carol Hagan	782-2866	Calhoun County	Citizen
28	Charles J. Freeman	236-5607	Calhoun County	Citizen
29	Charles Doster	237-2755	Calhoun County	Citizen
30	Dr. David West	237-1621	Calhoun County	Citizen
31	<b>Curtis Simpson</b>	236-8229	Oxford	Resigned
32	<b>Bill Watson</b>	236-5966	Oxford	Died August 2014
33	Jack W. Brim	831-5580	Trucking Issues	BR Williams Trucking Co.
34	Brandon Freeman	231-5900	Oxford	Banker
35	<b>Bobby Spendlove</b>	831-8342	Oxford	Deceased
36	Randy Cosper	831-0511	Oxford	Citizen
37	Marshall Shaddix	831-0486 & 591-8225	Oxford	Citizen
38	<b>Lester Boling</b>	835-1844	Oxford	Has Not Attended
39	Robert Dark	831-4645	Oxford	Citizen
40	<b>Alan Hubbard</b>	831-4166	Oxford	Resigned/ Employed in Wedowee
41	<b>Vacant</b>			<b>3 New Positions Based on 2010</b>
42	<b>Vacant</b>			<b>Population Increase</b>
43	<b>Vacant</b>			
44	Phillip Smith	369-7171	Weaver	New
45	Pattie Fuester	847-8491	Weaver	New
46	Andrew Nelson	820-2162	Weaver	Citizen
47	<b>Ray Road</b>	235-4640	Anniston Army Depot	AOD Has Not Attended
48	Mike Matthews	235-4148 & 310-0739	Anniston Army Depot	AOD Civilian Ex. Assistant
49	Len Hearron	240-3092	Anniston Army Depot	AOD
50	Patricia Green	831-5068	Hobson City	New
51	Joe L. Cunningham	831-7720	Hobson City	Citizen
52	Rev. Deborah Hunter	835-2571	Hobson City	Citizen
53	<b>Vacant</b>	(334) 353-6468	ALDoT Multi-Modal	ALDoT Safety Operations

BOLD = Need To Be Filled or Replaced

JAN. 21<sup>ST</sup> 10:00 AM  
CAC MEETING

## AGENDA

### CITIZENS ADVISORY COMMITTEE OF THE CALHOUN AREA METROPOLITAN PLANNING ORGANIZATION (MPO)

East Alabama Regional Planning and Development Commission 3<sup>rd</sup> Floor Conference Room

10:00 am

Wednesday, November 26<sup>th</sup>, 2014

**I. Call to Order**

**II. Introductions**

**III. Old Business**

- a. Review of CAC minutes for September 24<sup>th</sup>, 2014
- b. Approval of CAC minutes for September 24<sup>th</sup>, 2014
- c. CAC Appointments and Welcome of New Members
- d. Annual Publication of CAC Membership List
- e. TBA

**IV. New Business**

- a. Review of FY 2012-2015 TIP Update and MPO Projects (Handout)
- b. Review Projects Authorized in FY 14 (Handout)
- c. Preview of Projects for FY 15
- d. TBA

**V. Other Business**

- a. Other current transportation projects
- b. Anniston Express and ADA Para-Transit Ridership
- c. Transportation & Transit in Denver, CO (Slideshow)
- d. Next CAC Meeting
- e. TBA

**VI. Adjourn**

**MINUTES**  
**CITIZENS ADVISORY COMMITTEE (CAC)**  
**of the Calhoun Area Metropolitan Planning Organization (MPO)**  
**Wednesday, September 24, 2014**  
**10:00 a.m.**

Those attending:

Richard Stubbs	Calhoun County
Marshall Shaddix	Oxford
Tommy Thompson	Jacksonville
Jack Plunk	EARPDC / MPO
Karen Davis	Jacksonville
David Thompson	JSU
Dennis Reaves	Calhoun County
Patricia Green	Hobson City
Lamar Sims	Jacksonville
Carol Hagan	Calhoun County
Joe Cunningham	Hobson City
Dr. Mike Kimberly	Anniston
Jack Brim	BR Williams Trucking
Jamie Etheredge	Jacksonville
Nelson Coleman	Jacksonville
Chris Gann	Calhoun County Engineer
Brian Rosenbalm	Calhoun County Engineer
Jerome Freeman	Calhoun County
Ed Kimbrough	Anniston

The meeting was called to order by Mr. Dennis Reaves, Chairman.

**OLD BUSINESS:**

Minutes of the CAC meeting of July 23, 2014, were approved on a motion by Mr. Marshall Shaddix and seconded by Mr. Jack Brim. Motion carried.

Chairman Reaves called for the discussion of CAC appointments. Mr. Plunk explained that there are eight appointments still needed for the City of Oxford. He mailed a letter to the Mayor with a copy to the Council President, Mr. Waits about the needed appointments. Most other member governments are up to date.

**NEW BUSINESS:**

Chairman Reaves called for Review of the FY 2012-2015 TIP Update and MPO projects. Mr. Plunk briefly reviewed the spreadsheet, that was given as a handout, with the members. He explained that

the projects that are highlighted in green have been authorized by the ALDoT to proceed. The most recent changes approved by the MPO was to increase the RoW for project #6 McIntosh Road Realignment and #7 Lenlock/Saks Rd. Intersection. Also, after a formal amendment process with a public hearing on Sept. 9<sup>th</sup>, a RoW allocation was added to project #11 Snow Street Drainage and Resurfacing. The Chief Ladiga RoW acquisition for the City of Anniston was increased to \$250,000, three new bicycle/ped projects were added for Anniston (#36, 37 & 38) and the CN allocation for Snow Street Resurf/Drainage was increased to \$1,505,350. Last month, the CN allocation for project #12 Greenbrier Road Safety Improvements was increase to \$1.5 million. The project highlighted in pink will be funded with ATRIP funding for the City of Jacksonville. The money the MPO has allocated for the Jacksonville AL 21 project will be refunded back to the MPO in FY 16. At the next MPO meeting, projects that did not move forward in this fiscal year will need to be moved into FY 15 with the added 4% to the allocations.

Next, Chairman Reaves called for the Review and Comments on the Final 2040 Long Range Transportation Plan (LRTP). Mr. Plunk explained that a full copy of the LRTP was passed out at the last CAC meeting and public review and comments are still being excepted at this time. An additional meeting has been scheduled for September 30<sup>th</sup> in the 3<sup>rd</sup> Floor Conference Room at EARPDC from 2:00-5:00 p.m. A flyer is in the agenda packet for review.

#### **OTHER BUSINESS:**

There was a status report for the current ALDoT sponsored projects in the agenda packet for review. Mr. Plunk briefly reviewed the lists with the members.

Chairman Reaves called for the report on Anniston Express and ADA Para-Transit Ridership. Mr. Plunk also gave the Anniston Express and ADA Para-transit Ridership. There were a total of 12,075 riders for August, which was the highest ridership ever for the system. For the ADA Paratransit Ridership for August; Anniston had 734 one-way trips, Jacksonville had 152 one-way trips, 28 for Weaver, and Oxford had 219 one-way trips. For the Urbanized area 471 one-way trips and 215 one-way trips for the Rural area.

Next, Chairman Reaves called for the presentation from Mr. Brian Rosenbalm, Calhoun County Engineer, on being a dual Storm Water Management Plan Review Committee. He explained that this program is to educate the public on where storm water goes and what happens to it, and the engineers would like to meet two or three times each year. Mr. Chris Gann gave the members a couple of handouts to review with a PowerPoint presentation, on Storm Water Management.

The next CAC meeting is scheduled for Wednesday, November 26, 2014, at 10:00 a.m. in the EARPDC 3<sup>rd</sup> floor Conference Room.

There being no further business, the meeting was adjourned.

<b>CAC Members - November 2014</b>				
	<b>Name</b>	<b>Telephone #</b>	<b>Jurisdiction</b>	<b>Company or Interest</b>
1	Bob Jackson	237-4033	Anniston	Tri-Co Supply/CoC Liason to MPO
2	Ed Kimbrough	820-3455	Anniston	New
3	Joan McKinney	235-3995	Anniston	First AL Bank
4	Carl Neumann	403-6561	Anniston	New
5	<del>Andy Hatley</del>	<del>238-8628</del>	Anniston	Resigned 11/21
6	Dr. Mike Kimberly	820-4933	Anniston	CDC
7	Carlos Woodward	282-5235	Anniston	New
8	Telesa Stanford Allen	473-4344	Anniston	New
9	Marcus Boykin	453-3358	Anniston	New
10	<del>John Wheeler</del>	<del>237-8279</del>	Anniston	Resigned 11/24
11	Phillip Keith	283-3384	Anniston	New
12	Judy Myers	835-5052 or 225-7135	Anniston	New
13	Kumira Lemon	499-1399	Anniston	New
14	Nelson Coleman	782-2829	Jacksonville	Citizen
15	David Thompson	782-5455	Jacksonville	JSU
16	Karen Davis	435-5243	Jacksonville	Citizen
17	T L Thompson	435-6448	Jacksonville	Chief JPD
18	Lamar Sims	385-6633 or 453-7467	Jacksonville	New
19	Kyle Warmack	435-9483	Jacksonville	New
20	Jamie 'Red' Etheredge	435-0023	Jacksonville	New
21	Bill Gann	236-8225	Calhoun County	Citizen
22	Floyd Tredaway	435-8139	Calhoun County	Citizen
23	Shirley Miller	241-2825	Calhoun County	Citizen
24	Robert Pyles	831-6683	Calhoun County	Chamber of Commerce
25	<b>Dennis Reaves, Chairman</b>	835-0714	Calhoun County	Citizen
26	Richard Stubbs	820-4155	Calhoun County	Citizen
27	Carol Hagan	782-2866	Calhoun County	Citizen
28	Charles J. Freeman	236-5607	Calhoun County	Citizen
29	Charles Doster	237-2755	Calhoun County	Citizen
30	Dr. David West	237-1621	Calhoun County	Citizen
31	<del>Curtis Simpson</del>	<del>334-8329</del>	Oxford	Resigned
32	<del>Bill Watson</del>	<del>236-6966</del>	Oxford	Died August 2014
33	Jack W. Brim	831-5580	Trucking Issues	BR Williams Trucking Co.
34	Brandon Freeman	231-5900	Oxford	Banker
35	<del>Bobby Spondlove</del>	<del>831-8312</del>	Oxford	Deceased
36	Randy Cospser	831-0511	Oxford	Citizen
37	Marshall Shaddix	831-0486 & 591-8225	Oxford	Citizen
38	<del>Lester Belling</del>	<del>835-1844</del>	Oxford	Has Not Attended
39	Robert Dark	831-4645	Oxford	the ann
40	Lavoy Jordan	831-4747 or 225	Oxford	New
41	<b>Vacant</b>			<b>3 New Posttions Based on 2010</b>
42	<b>Vacant</b>			<b>Population Increase</b>
43	<b>Vacant</b>			
44	Phillip Smith	369-7171	Weaver	New
45	Pattie Fuester	847-8491	Weaver	New
46	Andrew Nelson	820-2162	Weaver	Citizen
47	<del>Ray Read</del>	<del>236-4610</del>	Anniston Army Depot	AOD Has Not Attended
48	Mike Matthews	235-4148 & 310-0739	Anniston Army Depot	AOD Civilian Ex. Assistant
49	Len Hearron	240-3092	Anniston Army Depot	AOD
50	Patricia Green	831-5068	Hobson City	New
51	Joe L. Cunningham	831-7720	Hobson City	Citizen
52	Rev. Deborah Hunter	835-2571	Hobson City	Citizen
53	Vacant	(334) 353-6468	ALDoT Multi-Modal	ALDoT Safety Operations

BOLD = Need To Be Filled or Replaced

**MINUTES**  
**CITIZENS ADVISORY COMMITTEE (CAC)**  
**of the Calhoun Area Metropolitan Planning Organization (MPO)**  
**Wednesday, September 24, 2014**  
**10:00 a.m.**

Those attending:

Richard Stubbs	Calhoun County
Marshall Shaddix	Oxford
Tommy Thompson	Jacksonville
Jack Plunk	EARPDC / MPO
Karen Davis	Jacksonville
David Thompson	JSU
Dennis Reaves	Calhoun County
Patricia Green	Hobson City
Lamar Sims	Jacksonville
Carol Hagan	Calhoun County
Joe Cunningham	Hobson City
Dr. Mike Kimberly	Anniston
Jack Brim	BR Williams Trucking
Jamie Etheredge	Jacksonville
Nelson Coleman	Jacksonville
Chris Gann	Calhoun County Engineer
Brian Rosenbalm	Calhoun County Engineer
Jerome Freeman	Calhoun County
Ed Kimbrough	Anniston

The meeting was called to order by Mr. Dennis Reaves, Chairman.

**OLD BUSINESS:**

Minutes of the CAC meeting of July 23, 2014, were approved on a motion by Mr. Marshall Shaddix and seconded by Mr. Jack Brim. Motion carried.

Chairman Reaves called for the discussion of CAC appointments. Mr. Plunk explained that there are eight appointments still needed for the City of Oxford. He mailed a letter to the Mayor with a copy to the Council President, Mr. Waits about the needed appointments. Most other member governments are up to date.

**NEW BUSINESS:**

Chairman Reaves called for Review of the FY 2012-2015 TIP Update and MPO projects. Mr. Plunk briefly reviewed the spreadsheet, that was given as a handout, with the members. He explained that

the projects that are highlighted in green have been authorized by the ALDoT to proceed. The most recent changes approved by the MPO was to increase the RoW for project #6 McIntosh Road Realignment and #7 Lenlock/Saks Rd. Intersection. Also, after a formal amendment process with a public hearing on Sept. 9<sup>th</sup>, a RoW allocation was added to project #11 Snow Street Drainage and Resurfacing, The Chief Ladiga RoW acquisition for the City of Anniston was increased to \$250,000, three new bicycle/ped projects were added for Anniston (#36, 37 & 38) and the CN allocation for Snow Street Resurf/Drainage was increased to \$1,505,350. Last month, the CN allocation for project #12 Greenbrier Road Safety Improvements was increase to \$1.5 million. The project highlighted in pink will be funded with ATRIP funding for the City of Jacksonville. The money the MPO has allocated for the Jacksonville AL 21 project will be refunded back to the MPO in FY 16. At the next MPO meeting, projects that did not move forward in this fiscal year will need to be moved into FY 15 with the added 4% to the allocations.

Next, Chairman Reaves called for the Review and Comments on the Final 2040 Long Range Transportation Plan (LRTP). Mr. Plunk explained that a full copy of the LRTP was passed out at the last CAC meeting and public review and comments are still being excepted at this time. An additional meeting has been scheduled for September 30<sup>th</sup> in the 3<sup>rd</sup> Floor Conference Room at EARPDC from 2:00-5:00 p.m. A flyer is in the agenda packet for review.

#### **OTHER BUSINESS:**

There was a status report for the current ALDoT sponsored projects in the agenda packet for review. Mr. Plunk briefly reviewed the lists with the members.

Chairman Reaves called for the report on Anniston Express and ADA Para-Transit Ridership. Mr. Plunk also gave the Anniston Express and ADA Para-transit Ridership. There were a total of 12,075 riders for August, which was the highest ridership ever for the system. For the ADA Paratransit Ridership for August; Anniston had 734 one-way trips, Jacksonville had 152 one-way trips, 28 for Weaver, and Oxford had 219 one-way trips. For the Urbanized area 471 one-way trips and 215 one-way trips for the Rural area.

Next, Chairman Reaves called for the presentation from Mr. Brian Rosenbalm, Calhoun County Engineer, on being a dual Storm Water Management Plan Review Committee. He explained that this program is to educate the public on where storm water goes and what happens to it, and the engineers would like to meet two or three times each year. Mr. Chris Gann gave the members a couple of handouts to review with a PowerPoint presentation, on Storm Water Management.

The next CAC meeting is scheduled for Wednesday, November 26, 2014, at 10:00 a.m. in the EARPDC 3<sup>rd</sup> floor Conference Room.

There being no further business, the meeting was adjourned.

**CALHOUN COUNTY STORMWATER COOPERATIVE**

**November 5, 2014 10:00-11:00**

**Calhoun County Highway Department  
160 Seaton Drive, Anniston, AL 36205**

**Those Present: Chris Gann, Kevin Ashley, James Green, Brian Rosenbaum, Eddie May, and Heidi Richards**

**Everyone introduced themselves. Ashley and Gann explained where they were in regards to the MS4 Permit.**

**Gann provided a copy of their Storm Water Management Plan and gave the website information where it is located ([www.calhouncounty.org](http://www.calhouncounty.org) Click on Storm Water Information Link at bottom right). As goals were discussed and planned, Gann reminded us to keep in mind the 6 ADEM mandated points and that individual activities need to meet as many as possible. (Richards will print out the 6 Points for next meeting. This will allow us to start placing goals under each item).**

**Activities that were discussed were: 1.) Water Festival to be held sometime in 2015.**

**General conversation: \*to hold event at JSU**

**\*possibly during the week of Thanksgiving**

**\*5-6K for busing**

**\*T-Shirts seem to be a great advertisement. Maybe, a \$200-\$250 minimum to have donors name on back.**

**2.) Storm Water Drainage Stenciling. (Gann has already ordered 3 templates and willing to share with Ashley and Green.)**

**3.) Low Impact Development Workshop. Gann felt like this was a much needed workshop. (Richards has held a workshop of this nature in the past and will do homework to provide more input at next meeting)**

**May with the Coosa Valley Resource Conservation and Development Council spoke about the grants they offer. Grants are accepted April 1<sup>st</sup>-July 15<sup>th</sup>.**

**May also suggested bringing some other organizations to the table to provide input and assistance: Fred Couch (River Trails); David West (ACES), a representative from the SWCD; NRCS representative; AFC representative; Christy Claes with the Choccolocco Creek Initiative; and a representative from ALFA.**

**Next Meeting: Wednesday, December 3, 2014 at 10:00 at the Calhoun County Highway Department. Gann, be sure to invite Racheal Brinks.**

***\*ITEMS IN RED DENOTE FOLLOW-UP ITEMS FOR NEXT MEETING***





About Extension · County Offices · Calendar · Publications · News · Multimedia Resources  
Alabama A&M University · Auburn University · Extension Units & Departments  
Staff Directory · Employment Opportunities · Weather · Related Websites · Español

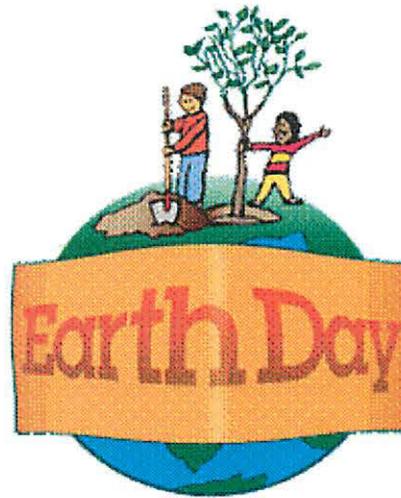


- 4-H & Youth Development
- Agriculture
- Disasters
- Economic Development
- Family & Health
- Home & Garden
- Natural Resources
- Urban

menu options

### Upcoming Events:

- 02/10 - Today's Parent at Lewis Academy
- 02/11 - 2015 Calhoun County Master Gardener Volunteer Intern Class
- 02/12 - 4-H Club Meeting - Ohatchee Elementary - Closed Meeting
- 02/14 - 4-H Archery Club
- 02/16 - Calhoun County Staff Conference
- 02/17 - Today's Parent at Lewis Academy
- 02/17 - 4-H Club Meeting - Coldwater Elementary - Closed Meeting
- 02/18 - 2015 Calhoun County Master Gardener Volunteer Intern Class
- 02/18 - 4-H Club Meeting - Coldwater Elementary - Closed Meeting
- 02/23 - Calhoun County Staff Conference



## EARTH DAY 2014

***Earth Day is an annual event that involves over 800 students, teachers and volunteers. Held each year at Cane Creek Community Garden, the event is tied to the students' classroom curriculum and includes learning stations such as "Camouflage in the Outdoors", "Farm Life", "Skins & Skulls", "Ms. Bacteria (food safety)", "Recycling & Water Quality", "Play it Safe Around Electricity", and enjoyed a hayride, and a play called "The Lorax. Many thanks to our sponsors and volunteers.***

***Here are some scenes from April 9th & 10th:***



**Anniston, AL**

**50 °F / 10 °C**

**Clear**

at 01:53 PM



***This year, Kitty Stone Elementary K5 enjoyed a day of learning outdoors on April 23rd. Special thanks to Commissioner Rudy Abbott and Downings General Store.***



[Back](#)

Copyright © 1997 - 2015 by the Alabama Cooperative Extension System  
All rights reserved - Legal Disclaimer - webmaster@aces.edu

[click here for more...](#)



September 12, 2014

**Rain, Rain.. Don't Let it Get Away!**

Posted by Terri Daulton under [Clean Water](#), [conservation](#), [Farming](#), [Farmland](#), [Information](#), [land conservation](#) | Tags: [agriculture](#), [Alabama](#)

[Land Trust](#), [aquatic biodiversity](#), [Calhoun County](#), [farmland](#), [free Rain Barrel](#), [water quality](#) |

[Leave a Comment](#)

Save Money and the planet with a FREE! rain barrel workshop.

The Alabama Land Trust is sponsoring a free Rain Barrel Workshop for the Calhoun County Chamber of Commerce. Class participants will learn, make and take; learn about how much water you can save with a rain barrel, make one yourself and then take one home.

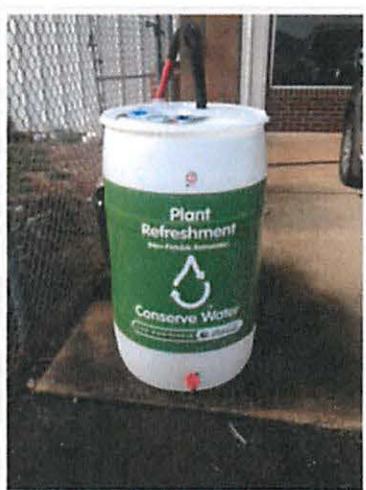
The barrels and kits are being provided by our partners at Coca Cola and their River Network Partnership. The class will take place at the Red Cross facility at 1514 West 10th Street in Anniston at 10 am to 11:30 am on September 19th.

Only 20 places are available, so register early! Light refreshments will be served. Please wear workshop clothes and closed-toed shoes.

When: September 19th, 10 am -11:30 am

Where: 1514 West 10th Street, Anniston

Register: [cclaes@allandtrust.org](mailto:cclaes@allandtrust.org)



Finished Rain Barrel Project

**Home Page**

Alabama Land Trust, Inc. & Georgia Land Trust, Inc.

**Disclaimer**

This blog is sponsored by the Chattowah Open Land Trust, Inc., Alabama Land Trust, Inc. and Georgia Land Trust, Inc. for the purpose of discussing issues related to the land trust movement and environmentalism generally. Though it may feature opinions of these organization's staff members, those opinions are not to be construed as representative of the land trusts'.

**Affiliates**

- ▶ [Chattahoochee Valley Land Trust](#)
- ▶ [Lula Lake Land Trust](#)

**Our Partners**

- ▶ [Alabama Department of Conservation and Natural Resources](#)

# Rain Barrel Program

## **Renew Our Rivers Clean-Up: Choccolocco Creek in Oxford Area!**

**11 October 2014 08:00 - 12:00**

**Oxford Area and various locations**

The CCWA is VERY excited to be working with Alabama Power's Renew Our Rivers program right here just for Choccolocco Creek! The CCWA will be hosting this event in order to provide an opportunity for volunteers from throughout the region to give back to their community and their creek by cleaning up designated areas near the creek in the Oxford area.

These clean-ups are always a fun and rewarding activity for families and individuals alike and volunteers can see the immediate effects of their work to clean their creek communities!



Clean-up Homebase is the Oxford Civic Center at the Lakeside pavilions. Here registered volunteers will check in and receive their materials and what site they will be cleaning up. Check-in begins at 8am and clean-up will continue until 10:30am /11:00 am where volunteers will then return to the Oxford Civic Center to count and dump their trash and enjoy a "Thank You" cook-out celebration and live music entertainment.

The CCWA will be supplied with the following materials from AL Power to provide REGISTERED volunteers:

1. Renew Our Rivers 15th-year celebration t-shirts with clean-up sponsors
2. Trash bags
3. Gloves
4. Trash grabbers
5. Picnic celebration after the clean-up for all registered volunteers!

## 2014 Calhoun County Storm Water Management Report



### ADDITIONAL DETAILS:

- If you know of a particularly dirty area in the Oxford area near the creek that can be accessed, please notify Christy Claes to see if we can add it to the clean-up.
- Clubs, School groups, businesses and Church groups are encouraged to sign-up as a team!





NEXT MEETING  
JAN 13  
11:30

Meeting Agenda

Location: Oxford Civic Center, Oxford AL - Room 118

401 McCullars Lane, Oxford AL

November 18, 2014 - 11:30 AM to 1:00 PM

- 1. Welcome and Agenda Overview (5 Minutes) – Christy C.
  - Guests and Introductions (5 Minutes) – Christy C.
- 2. Review of Summary from September Meeting (5 Minutes) – Katherine E.
- 3. Project/Committee Updates: (Christy and Committee Chairs – 55 minutes)

➤ Events & Outreach: (30 minutes)

➤ Rain Barrel Workshop – Sept 19 – 80 BARRELS LEFT

➤ Annual Paddle Trip / Fall clean-up at Hwy 77 – Sept 27

★ Renew Our Rivers Clean-up – Oxford Area - Oct 11

★ 140 BAGS  
15 BAGS RECYCLED

➤ Choccolocco Heritage Festival – Choccolocco - Oct 18

➤ Upcoming Events (Electronics Recycling Dec 9<sup>th</sup>) MUMFORD

➤ Fundraising Committee Updates (15 minutes)

SCHOOLS  
2-4 ON TUESDAY

➤ Grant Updates – \$5000

STORM DRAIN  
MARILERS

➤ Donor Packet

WATERSHED WALK  
JAN 10

➤ Signage Program

10AM-1PM  
(SATURDAY)

➤ Data Committee Updates (10 minutes)

➤ Media Committee Updates (5 minutes)

ADD TO  
WEBSITE

4. Implementation Plan – Revisiting 2015 goals in Jan meeting (5 minutes) – Christy C.

5. Other business and member updates (5 minutes)

6. Conclusion, Assignments and Next Meeting Date and Location, Adjourn (5 Minutes) – Katherine

ADEM NON-POINT CONFERENCE

JAN ~~10~~ 13<sup>TH</sup> @ RENAISSANCE HOTEL  
CONFERENCE CENTER

www.choccolococreekalliance.org

WATERZ FEST

BANDANNA'S

\$3/ea

Choccolocco Creek  
Watershed Alliance

Events & Outreach Committee Meeting

AGENDA

November 18, 2014

1:00 pm – 1:30 pm CT

\$3000 for a/b 500 units

A. Upcoming Events:

1. Dec 9:
  - i. Electronics Recycling Drive @ Munford School
2. Jan 10:
  - i. Watershed Walk: 10am – 1 pm @ Cheaha State Park
3. March 7:
  - i. Spring Frog Pond : 6 – 8 pm
4. March 14:
  - i. Watershed Walk: 10am – 2pm @ Shoal Creek
5. March 28:
  - i. LMLPA Renew Our Rivers Clean-up ?
  - ii. Noble Street Festival
6. May 30:
  - i. Beyond My Pond Teachers Symposium 8am – 4:30pm
7. May \_\_\_:
  - i. Possible Get Outdoors Day?

B. Discussion on other Outreach opportunities:

1. School Programs – in-class and field trips (Implementation Plan)
2. Recycling Program school partnership
3. Bio Blitz Follow-up?
- ★ 4. Water Festival (implementation Plan)
5. Rain Barrel workshop
- ★ 6. Low Impact Development Workshop (Implementation Plan) EVE
7. Member Contributions

**MEETING SUMMARY**

---

**Choccolocco Creek Watershed Alliance – Meeting #21**

**ATTENDEES:**

Christy Claes / Alabama Land Trust  
Katherine Eddins / Alabama Land Trust  
Carol Kirk / Eastman  
Thomas Loper / Eastman  
Rodney Owens / Anniston Water Works  
Kimberly Murray / Munford Schools  
Alex Robertson / Alabama Land Trust  
Larry Davis / Logan Martin Lake Protection Association  
Jennifer Yates / Wise Environmental  
Lisa Morales / Calhoun County Chamber of Commerce  
Rachel Brink / Alabama Cooperative Extension Service  
Sabra Sutton / CH2M Hill  
Neal Stephenson / National Gypsum Company

**LOCATION:** Berman Museum, Anniston AL

**PREPARED BY:** Christy Claes / Alabama Land Trust

**MEETING DATE:** September 16, 2014 - 1130 CT

**Welcome and Introductions:**

Christy Claes calls the meeting to order and welcomes those attending. Since there are a number of new guests, Claes has everyone introduce themselves to the group. Guests include Lisa Morales of the Calhoun Chamber of Commerce who has been working with Christy Claes on their Community Improvement Committee as well as Leadership Calhoun County. Neal Stephenson is visiting from National Gypsum Company, located on Coldwater Creek. Rachel Brink is new to the state and is visiting from the Calhoun County Cooperative Extension Service working on recycling and sustainability with youth and community groups. Sabra Sutton is also visiting and states to the newer members that the CCWA was initially formulated and organized through her contract work with Eastman 3 years ago and she is glad to see the group again. Before starting the meeting, Claes also introduces museum staff member Adam Cleveland to the group to dispel how the museum came about and who the Bermans were. The group thanks Mr. Cleveland for the introduction and for the use of the facility. Claes then reviews the items on the Agenda.

Claes reviews the summary from the July 2014 meeting with the group and hands out a copy of the minutes from the July 2014 meeting.

**Committee Review and Updates:**

Christy Claes provides a brief update on the activities of the four committees over the past month and focuses on the line-up of upcoming fall events for discussion.

**Recent Event Updates:**

- **Sept 6 Jacksonville Earth Day:** Claes reports that this event featured a new partnership with JSU's Earth Club and also featured a new relationship with JSU's Art Department through Doug Clark. Claes reports that the event started with the screening of "America's Amazon" and finished with an outdoor photography lesson from the Ladiga Trail. Claes states that although the JSU student attendance was low, there was a good variety of people from both the community, and staff and students from JSU totaling in 18 participants.
- **Sept 13 Watershed Walk – Medicinal and Herbal Plants:** Claes reports that this hike was very well attended and had many enthusiastic participants. Claes adds that Francine Hutchinson did a great job leading the group of 14 hikers.
- **Munford School Bio Blitz PBL:** Kimberly Murray adds that Munford School has been including the Bio Blitz into its school-wide curriculum and now has all of the teachers involved with some aspect of utilizing data collected from April's Blitz to continue to teach and study species and habitats. Throughout this school year, classes will be including a study on species to their science curriculum. Murray adds that they have paired up elementary aged students with high school students with very good results. Claes adds that part of the reason the CCWA embarked on the Blitz in the first place was that it had the ability to be a continually-evolving and growing teaching tool.

**Upcoming Events:**

- **Sept 27 3<sup>rd</sup> Annual Paddle Trip and Clean-Up:** Claes reports that the details are now set for the paddle/clean-up. The paddle trip will begin at 8:30am and will be putting-in at the Steed property near Jackson Trace Road. The paddle will last around 2 hours and we should arrive at the Hwy 77 bridge around 11/11:30am to take-out. Teje Sult will be helping on the water in the case of emergency. Christy adds that she will be leading both activities and Alex will be helping. Once at Hwy 77, the group can eat lunch then the clean-up will begin at 11:30/12 pm. Claes adds that it is not necessary for a paddler to stay for the clean-up but it is encouraged. Clean-up volunteers can show up at the bridge at 11:30/12:00pm and the clean-up will last around one hour. If there are enough participants, Jackson Trace Bridge as well as Hwy 77 will get cleaned up. Claes adds that participants will need to sign up in advance for either activity. The group agrees to assist in promoting and Claes will be sending a flyer to the group to help get people registered.
- **Oct 11 Renew Our Rivers Clean-up for Oxford Area:** Claes reports that the clean-up homebase will be the Oxford Civic Center's lakeside pavilion areas. It will go from 8am to lunchtime with the clean-up beginning at 8:30am. Volunteers will sign-in and pick up supplies here and get their assignments on where they will be cleaning. Alabama Power has received the sponsor logos and will be printing the shirts soon. Claes states that local businesses have been very responsive and supportive of the event and have brought in \$1,400. Claes states she will be attending the Choccolocco Heritage Society meeting later in the day and will get more details on where any dumpsters would be placed in Choccolocco and how many volunteers will be needed in the Choccolocco area. Claes

reports that one of the clean-up sites will be Walmart perimeter in Oxford as well as a few other sites. Claes also asks the group to consider if they would be able to help the day of the event by cooking hot dogs or helping the sign-in booth. Claes will be sending out a flyer for the event soon.

- **Oct 18 Choccolocco Heritage Festival:** Claes reports that the Heritage Festival is also coming up and that she has been attending the Heritage Society meetings to get updates on the festival. Claes reports that the CCWA's role in the festival is to create the flyer, assist in publicity/promotion, help increase vendor participation and assist with a craft demo. Claes adds that she will be going to the Heritage Society Meeting this afternoon for more details.
- **Nov 6 Volunteer Appreciation Event:** Claes adds that she would like to get feedback on a proposed date for the Appreciation event on Nov 6. Claes states that most likely the event will take place at Hubbards on Main in downtown Oxford from 5:30pm – 7:30pm. Claes states that she will send out a formal invitation regarding this proposed date to the entire group and see if that date will work for the members.

#### **Fundraising Committee:**

Claes gives the report for the Fundraising Committee, stating that the Stringfellow Health Grant projects are now complete and paid for. The final Grant Report is due to the Community Foundation by October 30 in order to receive any further grants. Claes adds that the 2014/2015 Stringfellow Grant application was completed a few weeks ago and is being reviewed by the Community Foundation Board and they will make their announcement in Mid-November. Claes states that the proposed projects for the next grant are: stormdrain markers with custom text and graphic, another water quality-related kiosk for the Choccolocco Wildlife Management Area and to revive and host the 2015 Get Outdoors Day at Munford School. Claes adds that the Signage Program is going well and has 2 signs that have been ordered and are being processed by the manufacturer. Eastman and the City of Oxford will be the first completed and the Community Foundation sign will come next. The City of Oxford will be paying for 2 signs, one sign for 2 years and the other sign for 3 years. Claes also updates the group on the status of the sponsorship amount for the Renew Our Rivers Clean-up. The sponsors have brought in a total of \$1,400 towards the clean-up. Claes also adds that she has met with Alabama Clean Water Partnership's Allison Jenkins to discuss some fundraising tips and will be translating those to the Fundraising Committee as they continue to build their efforts.

#### **Data Committee:**

Claes gives the report for the Data Committee, stating that the Database is now LIVE and available publicly from the current website. The group agrees that the new database is impressive and aesthetically pleasing. Claes adds that the web designer did a great job putting it together and that as soon as the designer gives Claes lessons on editing the new database, she will be able to add in other articles and studies and continue to build the site. Claes also states that she has met with Francine Hutchinson and the Dean of the Biology Dept to discuss adding theses and abstracts to the site and Claes will continue to work with JSU on acquiring these.

**Media Committee:**

Claes reports for the Media Committee stating that the group had reviewed and reached a final version of the Key Talking Points that are to be used internally as reference for the members. Claes passes out the Key Talking Points and reads it over, asking for each member to give feedback on any changes needed. Carol Kirk asks if the group can have additional time to review the KTP and Claes agrees that each member's opinion is the goal and she will send it out electronically to the group for their final feedback.

**Other Updates:**

Claes adds that there are a few relevant events occurring over the next few weeks. She announces that the Alabama Land Trust is hosting a Rain Barrel workshop this coming Friday in partnership with the Calhoun County Chamber of Commerce's Community Improvement Committee. Claes adds that she will be leading the workshop and hopes that all 20 spots get filled. She shares the flyer for the event with the group. Claes also adds that this coming Saturday is a Farm Festival at the Little River Canyon Center and the Land Trust will have a booth there and should be a fun event.

**Conclusion and Next Meeting Date:**

Claes thanks the members and guests present for attending. The group discusses the date for the next meeting and tentatively schedules the next CCWA meeting for November 11, 2014. The meeting location was not finalized but Claes announces she will contact Cider Ridge Golf Course near Choccolocco Creek to be the host of the next meeting. Claes states she will send out an e-mail to all members announcing the date of the next meeting and will let everyone know the location once it can be confirmed.

Lunch will be provided for the group and an RSVP request that includes a lunch menu will be sent out prior to the meeting.

Claes thanks everyone for attending the meeting and the meeting adjourns.

**MEETING SUMMARY**

---

**Choccolocco Creek Watershed Alliance – Meeting #22**

**ATTENDEES:**

Christy Claes / Alabama Land Trust  
Carol Kirk / Eastman  
Rodney Owens / Anniston Water Works  
Kimberly Murray / Munford Schools  
Alex Robertson / Alabama Land Trust  
Rachel Brinks / Alabama Cooperative Extension Service  
Rick Nichols / ALDOT  
Doris Williamson / Munford Schools  
Renee Morrison / JSU Field Schools  
Francine Hutchinson / JSU Herbarium  
Steve Moses / M2 Connections  
Dale Dickens / Forestry Commission – Urban Forester  
Eddie Mays / Coosa Valley Resource Conservation & Developments  
Heidi Richards / Clean Water Partnership – Coosa Valley RC&D  
Kevin Ashley / City of Anniston – Engineer  
James Green / City of Anniston  
Chris Gahn / Calhoun County - Engineer

**LOCATION:** Oxford Civic Center, Oxford AL

**PREPARED BY:** Christy Claes / Alabama Land Trust

**MEETING DATE:** November 18, 2014 - 1130 CT

**Welcome and Introductions:**

Christy Claes calls the meeting to order and welcomes those attending. Since there are a number of new guests, Claes has everyone introduce themselves to the group and what they hope to take away from the meeting. Guests include Heidi Richards, the new facilitator of the Coosa Basin for the Clean Water Partnership as well as working with Coosa Valley Resource Conservation and Development. Eddie Mays is the Executive Director of the Coosa Valley Resource Conservation & Development, a non-profit serving the Coosa basin. Kevin Ashley is an engineer with the City of Anniston and working with the county's MS4 program (Municipal Separate Storm Sewer System) to implement projects to assist in reaching Phase II stormwater requirements that the CCWA may be able to help with. James Green is also with the City of Anniston as Engineering Technician and is assisting with the MS4 program. Chris Gahn is the Assistant Engineer of Calhoun County and is also working on the MS4 program. Claes thanks the group and adds that the Events Committee will be meeting immediately following the general meeting and if any of the other members or guests would like to sit-in on the committee meeting they are welcome to join. Claes then reviews the items on the Agenda.

Claes reviews the summary from the September 2014 meeting with the group and hands out a copy of the minutes from the September 2014 meeting.

### **Committee Review and Updates:**

Christy Claes provides a brief update on the activities of the four committees over the past month and focuses on the line-up of upcoming fall events for discussion.

### **Recent Event Updates:**

- **Rain Barrel Workshop – Sept 19:** Claes reports that this event was not a CCWA sponsored event as the Alabama Land Trust hosted it along with the Calhoun County Chamber of Commerce. However, Claes adds that the presentation was similar to that of the CCWA rain barrel workshop last May and was just as successful in sharing the same message of water quality, sustainability and stream health. Claes adds that the event was held at the Red Cross building and 14 people participated.
- **Annual Paddle Trip / Clean-up – Sept 27:** Claes reports that this was the 3<sup>rd</sup> paddle trip down lower Choccolocco but this year a trash clean-up was incorporated into the clean-up and was a huge success. Claes states that 9 paddlers participated with the help of the Steeds and 9 bags of trash were picked up at Jackson Shoals, many of which were recycled. Claes adds that it may be worth repeating this event with the clean-up as it was especially rewarding for participants.
- **Renew Our Rivers Clean-Up in Oxford- Oct 11:** Claes states that the clean-up was also a huge success though the rainy weather right before the clean-up may have kept some from coming to help. Claes adds that the clean-up was split into 2 groups, the Land Trust staff cleaned a property on the creek and the next day the general public had their clean-up along 7 sites, mostly roadways, in the Oxford area. Volunteers totaled 49 and 140 bags of trash were picked up, 15 more bags were taken to the recycling plant to be recycled. Claes states that a large number of volunteers came from Kappa Sigma fraternity at JSU which was a huge help and may help in the future. Claes also adds that the local businesses were incredibly supportive of the clean-up with a 90% return on the donation request letters that were sent out.
- **Choccolocco Heritage Festival – Oct 18:** Claes states that this year's festival was much the same as previous years but with very low turnout. The CCWA booth ran kids nature crafts where kids could make do-it-yourself bird feeders to take home. The group suggests that perhaps the festival date cant compete with larger festivals happening nearby. The CCWA helps a large deal with promoting the event through the media but other publicity such as better signage and local publicity seemed lacking as one guest lived in the area and had no idea the festival occurred.
- **Recycling Drives – Oct 28, Nov 12, Nov 14:** Claes states that there have been 3 recycling drives for the area that were not hosted by the CCWA but Claes had helped out due to her involvement with the Community Improvement Committee of the Calhoun

County Chamber which has similar goals and initiatives as the CCWA. The drives collected electronics on Oct 28, then paper at JSU on Nov 12, and more paper on Nov 14. All the drives collected full bins and Claes adds that the JSU drive included the Geography Club and the Earth Club and student participation was very encouraging. Rachel Brinks adds that she is working on a recycling grant with JSU to provide a long-term recycling program at JSU.

- **Volunteer Appreciation Dinner – Nov 6:** Claes adds that she appreciates all of those who were able to make it to the dinner and that next year she hopes a greater portion of the group can attend.

#### **Upcoming Events:**

- **Electronics Recycling Drive – Dec 9:** Claes asks Kimberly Murray to share the recycling event with the group. Murray informs the group that the Electronics Recycling drive will take place at Munford School on December 9 from 8am to 4pm. Murray will be sending out a flyer shortly to the group to help promote and spread the event. Electronics included in the drive will be: keyboards, laptops, sound equipment, external hard drives, microwaves, VCRs, projectors, printers, cell phones, cables and wires, copy machines, fax and scan machines, flat screen monitors.
- **Watershed Walk at Cheaha State Park – Jan 10, 2015:** Claes adds the only other event taking place before our next meeting is the Watershed Walk on Jan 10 which will kick off our Watershed Walk series for 2015. Likely Mandy Pearson will be guiding the group along the trails and more details will be sent out to the group prior to the hike regarding directions and sign-up.

#### **Fundraising Committee:**

- **Grant Updates:**

Claes gives the report for the Fundraising Committee, stating that this morning the CCWA was awarded 2015 Stringfellow Health Grant money for further water quality education and outreach projects. Claes adds that the amount given is \$5,000, which is smaller than what was requested but Claes believes we can attempt to complete most of the project goals if the CCWA can get the needed partnerships. Claes adds that the Community Foundation is to be hosting a grantee workshop that will further direct the funds and should also be sending along the reviewer comments from the grant which will dictate further what money can be spent where. Claes states that the proposed projects for the next grant are: stormdrain markers with custom text and graphic, another water quality-related kiosk for the Choccolocco Wildlife Management Area and to revive and host the 2015 Get Outdoors Day at Munford School. Kim Murray adds that the US Forest Service met recently and expressed a renewed interest in hosting the Get Outdoors Day event again and possible provide some funding and the CCWA will try to pull some of

the grant money towards the event if possible. Claes also adds that there is one final item to be completed from last year's Stringfellow Grant and that is to install the Coldwater Mountain kiosk this winter. Claes asks the group to consider helping the day we install, likely a Saturday. The CCWA will need about 4 or 5 volunteers and Claes adds that she will contact NEABA and have them bring 1 or 2 volunteers as well. More volunteers are welcome if they want to support the project further. Claes adds that goal for installation will be late January, early February as long as NEABA can work with that timeline.

- **Donor Packet:**

Claes updates the group on the status of the Fundraising Committee's donor packet they have been working on. The packet will include a donation letter and a Watershed Factsheet to go along with the letter which is designed to inform a potential donor of the unique and rare qualities of the watershed and how CCWA is important to protecting that. Claes passes out the Watershed Factsheet for all to review and provide feedback on corrections or changes. Claes states she will also send out electronically for people to review that way as well. Claes adds that the committee is also working on scheduling meetings with potential donors before the end of the year.

- **Signage Program:**

Claes adds that the Signage Program is going well and Eastman's watershed sign will be completed this week and ready to be installed. The next sign to be processed is the City of Oxford sign then the Community Foundation. The City of Oxford will be paying for 2 signs, one sign for 2 years and the other sign for 3 years.

**Data Committee:**

Claes gives the report for the Data Committee, stating to some of the guests that the CCWA website now has a research database available to the public. Claes adds that the Data Committee will be reviewing 3 additional documents to consider uploading to the website to build the database. Claes also adds that Francine Hutchinson is completing the scanning process on her Plant Species Survey of the Watershed thesis. Hutchinson states that the thesis should be available as soon as they work out some kinks in the digitizing process.

**Media Committee:**

Claes reports for the Media Committee stating that the group did not have a chance to meet this month and that they will be scheduling a time to meet in December to wrap up the Media Packet they have been working on.

**Implementation Plan:**

Claes states that with this being the last meeting of the year, the group should focus on 2015 goals at our next meeting in January. Claes adds that at the next meeting we will revisit our CCWA Implementation Plan and highlight some of the 2015 goals we will strive to accomplish. Claes lists a few examples of some of the items she reviewed on the Implementation Plan that we should put energy into for 2015: 2015 Water Festival, increase school educational programs, partner with other groups such as Rachel Brink's sustainability classroom programs, another rain

barrel workshop, Low Impact Development workshop / Watershed Restoration workshop and a Fundraising event. Claes invites the guests to introduce the CCWA to MS4 (Municipal Separate Storm Sewer System) programs and the goals of the guests that the CCWA may be able to help with or participate in.

**Municipal Separate Storm Sewer System Program for Anniston:**

Claes invites Kevin Ashley to tell the group about MS4 and their goals to accomplish City and County EPA requirements. Kevin Ashley is the City of Anniston Engineer and is charged with working with the county and others to improve the stormwater management and education for the area. Ashley explains to the group what MS4 means: Municipal Separate Storm Sewer System program which is implemented through the EPA and consists of 2 phases, smaller cities are deemed Phase II and have specific goals and requirements the city is to meet in order to comply. Ashley states the goals area to: perform public outreach, city participation in programs or projects, stormwater installation and monitoring of water at outfall areas, illicit discharge detection system to capture unpermitted discharge impacting water quality and good housekeeping within the municipalities such as in-house education. The City of Anniston recently passed a resident "stormwater charge" of 0.025 cents per square foot of property landowners own. This revenue will go into helping to supply these programs. Claes adds that a few of those requirements are mutual goals of the CCWA, such as the Water Festival and LID workshops, and the CCWA can assist as it has performed similar events and workshops in the past. Ashley also adds that the city hopes to also implement a stormdrain marking program as well and may be able to collaborate.

**Other Updates:**

**Alabama Plant Atlas – Francine Hutchinson:**

Claes introduces Francine Hutchinson as she wanted to show the group the Alabama Plant Atlas website. Hutchinson navigates the site and shows where all the herbarium collections can be found, including Jacksonville State University's. These collections include 30,000 profiles sharing data, photos, location and other specimen details for every plant listed. Hutchinson states that although the plants are mostly native plants the website include invasive and exotic plant data that are also an important part of tracking.

**Non-Point Source Pollution Conference by ADEM on Jan 15- Rick Nichols:**

Rick Nichols announces to the group that ADEM is hosting another Non-Point Source Conference in Montgomery on January 15<sup>th</sup> at the Renaissance Hotel. Claes adds that this conference is a great way to get caught up on issues and solutions regarding non-point source pollution, such as water quality, public outreach, policy and initiatives.

**Conclusion and Next Meeting Date:**

Claes thanks the members and guests present for attending. The group discusses the date for the next meeting and tentatively schedules the next CCWA meeting for January 13, 2015. The meeting location was not finalized but Claes announces she will work with Renee Morrison to secure the JSU Longleaf Studios in Jacksonville to be the host of the next meeting. Claes states she will send out an e-mail to all members announcing the date of the next meeting and will let everyone know the location once it can be confirmed.

Lunch will be provided for the group and an RSVP request that includes a lunch menu will be sent out prior to the meeting.

Claes thanks everyone for attending the meeting and the meeting adjourns.

# Protecting Our Waters

The Coosa River Basin



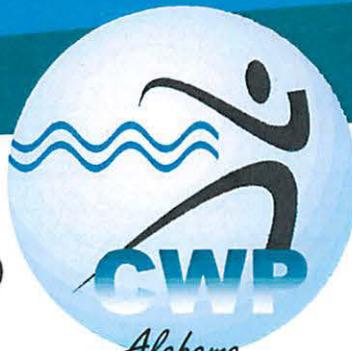
## Inside:

- Tips for Low Impact Development
- Water Conservation Tactics
- How You Can Help

- Local Water Quality Projects
- Stopping 'Alien Invaders'
- Activities for Kids



Always on.™



Alabama Clean Water Partnership



**Special appreciation is extended to the following organizations for their contribution of article content:**

- Alabama Aquatic Nuisance Species Task Force
- Alabama Clean Water Partnership
- Alabama Cooperative Extension System
- Alabama Department of Environmental Management
- Alabama Office of Water Resources
- Alabama Power Company
- Alabama Scenic River Trail
- Alabama Water Watch
- Auburn University Dept. of Fisheries and Allied Aquacultures
- Coosa River Basin Clean Water Partnership
- Keep Etowah Beautiful
- Lake Jordan Home Owners & Boat Owners Association
- Lake Mitchell Home Owners & Boat Owners Association
- Logan Martin Lake Protection Association
- Middle Coosa Watershed Project
- Munford Elementary School
- Top of Alabama Regional Council of Governments
- US Environmental Protection Agency, Region 4
- US Forest Service



# Welcome!



The Alabama Clean Water Partnership, Coosa River Basin Clean Water Partnership, and Coosa Valley Resource Conservation & Development Council (RC&D), in cooperation with multiple partners, are proud to bring you this informative insert. Our intention is to provide information about our incredible natural resource - the Coosa River Basin - and the many innovative projects underway to enhance and protect the quality and quantity of the water that flows past our towns and homes. The Coosa River is a vital life line for all who live in the watershed, with citizens depending on it for drinking water, agricultural production, recreational opportunities, and manufacturing.

The Coosa River Basin Clean Water Partnership is part of the statewide river basin management initiative called the Alabama Clean Water Partnership, a coalition of public and private individuals, companies, organizations and governing bodies working together to protect and preserve water resources and aquatic ecosystems throughout the state and in the shared watersheds of neighboring states. The goals of the ACWP are to link local basin efforts in order to maximize resources, encourage public and private investment, and empower citizens to become involved in watershed protection. Representatives from each river basin, as well as representatives from diverse interest groups, serve on a statewide board of directors. In each of the ten delineated river basins, such as the Coosa, a steering committee composed of local stakeholders with assorted interests in water resources and aquatic life is working to foster, coordinate, and encourage communication throughout the basin, and to provide guidance in the prioritization of resources.

The Coosa River Clean Water Partnership, established in 1999, is sponsored by the Coosa Valley RC&D, with Lem Burrell, Alabama Department of Public Health, leading the Steering Committee. To find out more about the Alabama Clean Water Partnership and its associated basin initiatives, go to [www.cleanwaterpartnership.org](http://www.cleanwaterpartnership.org) or call: Gail Russell, Coosa River Basin Facilitator at (334) 569-1044 or Allison Jenkins, ACWP Statewide Coordinator at (205) 266-6285.

If you like what you see in this insert, and want to support Alabama Clean Water Partnership efforts, please consider making a donation. Donations are tax deductible and can be earmarked for a specific project (or group initiative) in a specific river basin. Donations can be made by sending your check, along with the completed donation form below, to: The Alabama Clean Water Partnership, P.O. Box 3623, Montgomery, AL 36109.

**This publication was made possible with grant funds and services provided by the following partners:**



- AbitibiBowater
- AL Department of Economic & Community Affairs - Office of Water Resources
- Alabama Association of Resource Conservation & Development Councils
- Alabama Clean Water Partnership
- Alabama Cooperative Extension System
- Alabama Department of Environmental Management
- Alabama Power Company
- Alabama Power Foundation
- Alabama Press Association

- Auburn University Environmental Institute
  - Cawaco Resource Conservation & Development Council
  - Coosa Valley Resource Conservation & Development Council
  - Legacy, Partners in Environmental Education
  - Media General
  - Mid-South Resource Conservation & Development Council
  - US Environmental Protection Agency, Region 4
- This publication was made possible, in part, with grant funds from the Coosa Valley Resource Conservation and Development Council, Mid-South Resource Conservation and Development Council, Alabama Cooperative Extension System, and from the Alabama Clean Water Partnership through a Clean Water Act Section 319 Grant from the Alabama Department of Environmental Management and the U.S. Environmental Protection Agency, Region 4.

Front Cover Photo - Devils Den - Cheaha Creek, Courtesy of Lem Burrell

## What is RC&D?

This project was funded in part with grant funds from assorted Resource Conservation and Development (RC&D) Councils, whose mission it is to help citizens protect and develop their economic, natural, and social resources in ways that improve their area's economy, environment, and quality of life. Local RC&D Councils provide ways for people to plan and implement projects that will make their communities a better place to live. They bring together people, needs, concerns, opportunities, and solutions. Find out more about RC&D - Check out:

In Alabama: <http://www.al.nrcs.usda.gov/programs/rcd>

**Support Clean Water in Alabama through your donation to the Alabama Clean Water Partnership**  
 Please mail this card and your donation to: Alabama Clean Water Partnership, P.O. Box 3623, Montgomery, AL 36109

Name: \_\_\_\_\_ Organization / Affiliation: \_\_\_\_\_

Mailing Address: \_\_\_\_\_

Telephone: \_\_\_\_\_ Email: \_\_\_\_\_

I want to learn more about becoming involved in the Alabama Clean Water Partnership.

The Alabama Clean Water Partnership is a non-profit 501(c)(3) organization. All donations are tax deductible. Learn more about the Alabama Clean Water Partnership at [www.cleanwaterpartnership.org](http://www.cleanwaterpartnership.org)

<b>Levels of Giving</b>		<b>Donation Designation</b>	
<input type="checkbox"/> Clean Water Friend	\$100.00	<input type="checkbox"/> Statewide Support	<input type="checkbox"/> Alabama/Tombigbee
<input type="checkbox"/> Clean Water Patron	\$500.00	<input type="checkbox"/> Basin Support	<input type="checkbox"/> Conecuh-Sepulga
<input type="checkbox"/> Clean Water Supporter	\$1,000.00	<input type="checkbox"/> YES, I would like my donation dedicated to the support of the subbasin the basin I checked.	<input type="checkbox"/> Black Warrior
<input type="checkbox"/> Clean Water Donor	\$2,500.00		<input type="checkbox"/> Coosa
<input type="checkbox"/> Clean Water Sponsor	\$5,000.00		<input type="checkbox"/> Cahaba
<input type="checkbox"/> Clean Water Founder	\$10,000.00		<input type="checkbox"/> Coastal
<input type="checkbox"/> Other	_____		<input type="checkbox"/> Chattahoochee-Chipola
			<input type="checkbox"/> Tallapoosa
			<input type="checkbox"/> Choctawhatchee-Pea-Yellow
			<input type="checkbox"/> Tennessee

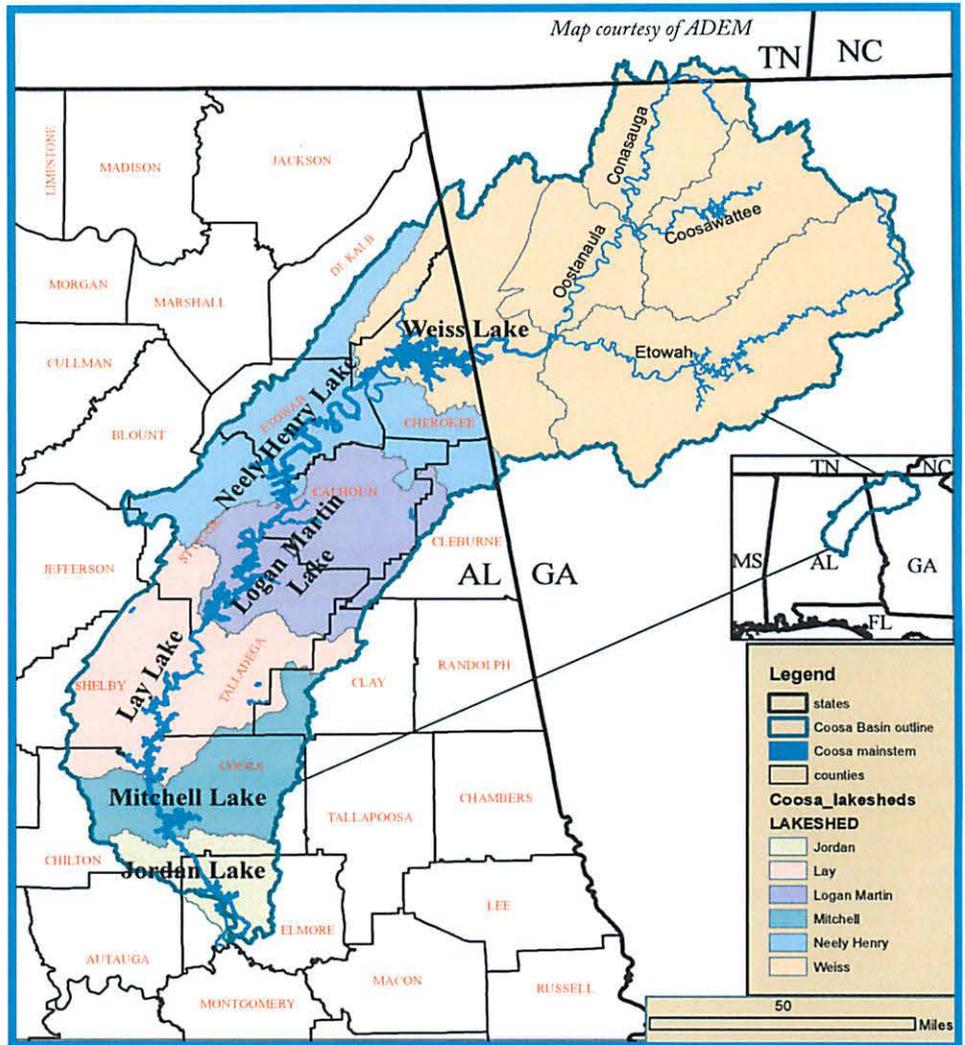
# The Coosa River Basin

The Coosa River, a part of the greater Mobile River Basin, begins its journey in Rome, GA at the confluence of the Oostanaula and Etowah Rivers, flowing in a westerly direction for approximately 30 miles before entering Alabama about ten miles northeast of Cedar Bluff in Cherokee County. The Coosa River wanders through approximately 250 miles within Alabama before joining the Tallapoosa River about ten miles north of Montgomery in Elmore County to form the Alabama River. A total of 10,266 square miles drain to the Coosa River, of which 5,407 square miles are within the State of Alabama. There are seven Alabama Power Company dams on the Coosa in Alabama - Weiss, H. Neely Henry, Logan Martin, Lay, Mitchell, Jordan, and Bouldin - that are important sources of hydropower and recreation for Alabama citizens, bringing millions of tourism dollars to the state, as well as providing quality drinking water.

**Additional Facts:**

- The Coosa River drains portions of 13 Alabama counties, with Talladega County contributing the most land area, at 480,000 acres, and Autauga County contributing the least land area, at 8,255 acres.
- The largest municipalities in the watershed are Gadsden, Anniston, and Ft. Payne.
- The major land uses in the watershed include forestry, agriculture/pasture, and urban.

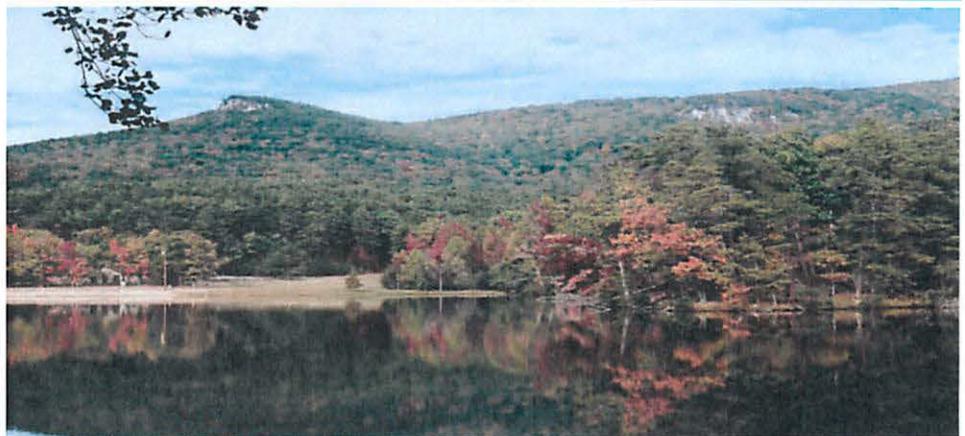
Source: Coosa River Basin Management Plan, ACWP 2005.



**Rain on the Coosa**  
Photo Courtesy of Richard Groves



**Fishing on Weiss Lake**  
Photo Courtesy of Richard Groves



**Cheaha Mountain Lake**  
Photo Courtesy of Lem Burell

## What is a Watershed?

A watershed is an area of land that drains into a particular body of water such as a stream, river or lake. Any body of water and its drainage area make up a distinct watershed in which all living things are interconnected by one basic and dynamic element: water. The topography (lay) of the land helps direct the flow of water (downhill) and defines a watershed's boundaries.

What we do in the watersheds where we live has a direct affect on the quality of water in our local streams. As rainwater flows across the land, it picks up and carries pollutants to our creeks, rivers and lakes. We commonly refer to this as stormwater and we refer to this type of pollution as polluted runoff or nonpoint source pollution because it does not come from any one source. Land uses such as forestry operations, mining, road construction, urban development,



and certain farming practices can increase nonpoint source pollution and negatively impact water quality, if they are not properly managed. Common homeowner practices such as washing the car, applying excessive amounts of fertilizers and pesticides, and improperly disposing of pet and household wastes can also lead to nonpoint source pollution. Practicing sound and careful management, or Best Management Practices, plus a little common sense and courtesy for others, can minimize and control the impact we have on water quality.

Source: Alabama Clean Water Partnership

### What is stormwater runoff?



Storm water runoff occurs when precipitation from rain or snow melt flows over the ground. Impervious surfaces like driveways, sidewalks, and streets prevent storm water from naturally soaking into the ground.

### Why is stormwater runoff a problem?



Storm water can pick up debris, chemicals, dirt, and other pollutants and flow into a storm sewer system or directly to a lake, stream, river, wetland, or coastal water. Anything that enters a storm sewer system is discharged untreated into the water bodies we use for swimming, fishing, and providing drinking water.

### The effects of pollution

Polluted storm water runoff can have many adverse effects on plants, fish, animals, and people.

- Sediment can cloud the water and make it difficult or impossible for aquatic plants to grow. Sediment also can destroy aquatic habitats
- Excess nutrients can cause algae blooms. When algae die, they sink to the bottom and decompose in a process that removes oxygen from the water. Fish and other aquatic organisms can't exist in water with low dissolved oxygen levels.
- Bacteria and other pathogens can wash into swimming areas and create health hazards, often making beach closures necessary.
- Debris—plastic bags, six-pack rings, bottles, and cigarette butts—washed into waterbodies can choke, suffocate, or disable aquatic life like ducks, fish, turtles, and birds.
- Household hazardous wastes like insecticides, pesticides, paint, solvents, used motor oil, and other auto fluids can poison aquatic life. Land animals and people can become sick or die from eating diseased fish and shellfish or ingesting polluted water.



• Polluted stormwater often affects drinking water sources. This, in turn, can affect human health and increase drinking water treatment costs.

# Stormwater Pollution Solutions

## Residential

Recycle or properly dispose of household products that contain chemicals, such as insecticides, pesticides, paint, solvents, and used motor oil and other auto fluids. Don't pour them onto the ground or into storm drains.

### Lawn care

Excess fertilizers and pesticides applied to lawns and gardens wash off and pollute streams. In addition, yard clippings and leaves can wash into storm drains and contribute nutrients and organic matter to streams.



- Don't overwater your lawn. Consider using a soaker hose instead of a sprinkler.
- Use pesticides and fertilizers sparingly. When use is necessary, use these chemicals in the recommended amounts. Use organic mulch or safer pest control methods whenever possible.
- Compost or mulch yard waste. Don't leave it in the street or sweep it into storm drains or streams.
- Cover piles of dirt or mulch being used in landscaping projects.

### Septic Systems

Leaking and poorly maintained septic systems release nutrients and pathogens (bacteria and viruses) that can be picked up by storm water and discharged into nearby water bodies. Pathogens can cause public health problems and environmental concerns.



- Inspect your system every 3 years and pump your tank as necessary (every 3 to 5 years).
- Don't dispose of household hazardous waste in sinks or toilets.

### Auto care

Washing your car and degreasing auto parts at home can send detergents and other contaminants through the storm sewer system. Dumping automotive fluids into storm drains has the same result as dumping the materials directly into a water body.



- Use a commercial car wash that treats or recycles its wastewater, or wash your car on your yard so the water infiltrates into the ground.
- Repair leaks and dispose of used auto fluids and batteries at designated drop-off or recycling locations.

### Pet Waste

Pet waste can be a major source of bacteria and excess nutrients in local waters.



- When walking your pet, remember to pick up the waste and dispose of it properly. Flushing pet waste is the best disposal method. Leaving pet waste on the ground increases public health risks by allowing harmful bacteria and nutrients to wash into the storm drain and eventually into local water bodies.



Education is essential to changing people's behavior. Signs and markers near storm drains warn residents that pollutants entering the drains will be carried untreated into a local waterbody.

## Residential Landscaping

**Permeable Pavement**—Traditional concrete and asphalt don't allow water to soak into the ground. Instead these surfaces rely on storm drains to divert unwanted water. Permeable pavement systems allow rain and snow melt to soak through, decreasing storm water runoff.

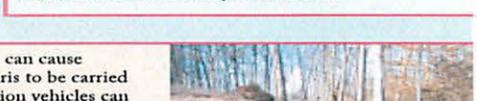
**Rain Barrels**—You can collect rainwater from rooftops in mosquito-proof containers. The water can be used later on lawn or garden areas.



**Rain Gardens and Grassy Swales**—Specially designed areas planted with native

plants can provide natural places for rainwater to collect and soak into the ground. Rain from rooftop areas or paved areas can be diverted into these areas rather than into storm drains.

**Vegetated Filter Strips**—Filter strips are areas of native grass or plants created along roadways or streams. They trap the pollutants storm water picks up as it flows across driveways and streets.



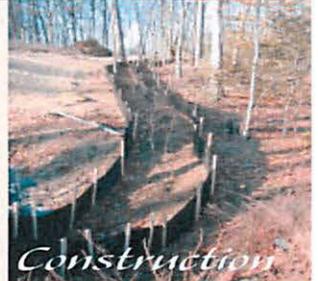
## Commercial

Dirt, oil, and debris that collect in parking lots and paved areas can be washed into the storm sewer system and eventually enter local water bodies.

- Sweep up litter and debris from sidewalks, driveways and parking lots, especially around storm drains.
- Cover grease storage and dumpsters and keep them clean to avoid leaks.
- Report any chemical spill to the local hazardous waste cleanup team. They'll know the best way to keep spills from harming the environment.

Erosion controls that aren't maintained can cause excessive amounts of sediment and debris to be carried into the storm water system. Construction vehicles can leak fuel, oil, and other harmful fluids that can be picked up by storm water and deposited into local water bodies.

- Divert storm water away from disturbed or exposed areas of the construction site.
- Install silt fences, vehicle mud removal areas, vegetative cover, and other sediment and erosion controls and properly maintain them, especially after rainstorms.
- Prevent soil erosion by minimizing disturbed areas during construction projects, and seed and mulch bare areas as soon as possible.



## Construction

## Agriculture

Lack of vegetation on stream banks can lead to erosion. Overgrazed pastures can also contribute excessive amounts of sediment to local water bodies. Excess fertilizers and pesticides can poison aquatic animals and lead to destructive algae blooms. Livestock in streams can contaminate waterways with bacteria, making them unsafe for human contact.

- Keep livestock away from stream banks and provide them a water source away from water bodies.
- Store and apply manure away from water bodies and in accordance with a nutrient management plan.
- Vegetate riparian areas along waterways.
- Rotate animal grazing to prevent soil erosion in fields.
- Apply fertilizers and pesticides according to label instructions to save money and minimize pollution.



## Forestry

Improperly managed logging operations can result in erosion and sedimentation.

- Conduct pre-harvest planning to prevent erosion and lower costs.
- Use logging methods and equipment that minimize soil disturbance.
- Plan and design skid trails, yard areas, and truck access roads to minimize stream crossings and avoid disturbing the forest floor.
- Construct stream crossings so that they minimize erosion and physical changes to streams.
- Expedite revegetation of cleared areas.



## Automotive Facilities



Uncovered fueling stations allow spills to be washed into storm drains. Cars waiting to be repaired can leak fuel, oil, and other harmful fluids that can be picked up by storm water.

- Clean up spills immediately and properly dispose of cleanup materials.
- Provide cover over fueling stations and design or retrofit facilities for spill containment.
- Properly maintain fleet vehicles to prevent oil, gas, and other discharges from being washed into local water bodies.
- Install and maintain oil/water separators.



## The Tri-State Water Negotiations

Originating in Rome, Georgia, where the Oostanaula and Etowah Rivers unite, the Coosa River is tapped as a drinking water source, harnessed for hydropower and agricultural production, and enjoyed for recreation, bringing millions of tourist dollars to the state. The Coosa River meets with the Tallapoosa River near Wetumpka to form the Alabama River, which continues to flow southward to the Gulf of Mexico. These watersheds of the Coosa, Tallapoosa, and Alabama are collectively referred to as the Alabama-Coosa-Tallapoosa (ACT) River Basin. Over the past two decades, this basin has been the subject of intense scientific research, residential, commercial, and industrial development, and political debate. The management of the quantity and quality of water within this vast hydrological system now walks hand-in-hand with the sustainability of the entire region, from Metro Atlanta to the Gulf of Mexico.

The Coosa River has been the subject of considerable concern in recent decades, marked by political debate and legal action. In the center of the controversy is the question of water availability and how it should be fairly allocated to meet the increasing demands of the Atlanta Metropolitan Area while supporting the many other water demands downstream in Alabama. In addition, there is great concern about the environmental effects that alternative water allocation formulas would have on the land and water resources of the ACT Basin. As a result, financial and technical resources were invested in the 1990s to study many aspects of the basin and the probable effects of allocating water to meet the many growing demands.

Management of this basin requires equal participation and earnest cooperation on behalf of the governments, businesses and citizens of Alabama and Georgia and their federal agency partners. Everyone who relies on the water resources within the basin is a stakeholder in this management process. These stakeholders share interests in the quantity and quality of the water in the basin for the sake of hydropower, recreation, and drinking water supply, in addition to its natural beauty and intrinsic value.

Source: Alabama Clean Water Partnership



## 10 WAYS TO SAVE 10 GALLONS OF WATER EACH DAY

(Source: Water Line, Vol. 10, Sept. 1990, Clemson University Cooperative Extension System)

**Turn off the tap while you brush your teeth**

2 brushings = 10 gallons

**Turn off the tap while you shave**

1 shave = 10 gallons

**Shorten your shower by 2 minutes**

2 minutes = 10 gallons

**Place a water-filled bottle or bag in your toilet tank**

6 flushes = 10 gallons

**Don't let the faucet run to get cold water**

4 minutes = 10 gallons

**Wash full loads of clothes**

1 load = 10 gallons

**Use the hose a minute less when you wash your car**

1 minute = 10 gallons

**Sweep, instead of washing off the driveway**

1 minute = 10 gallons

**Water your plants a minute less**

1 minute = 10 gallons

**Use short cycle on your dishwasher**

1 wash = 10 gallons

**10 gallons saved per day = 3,650 gallons saved per year.**

Water conservation saves money and energy.

Conservation of all natural resources enhances our quality of life.



YES, I would like to do my part to conserve water during this time of drought. Please send me my FREE water conservation kit! \*

To view the contents of this kit, visit [www.cleanwaterpartnership.org](http://www.cleanwaterpartnership.org).

Name \_\_\_\_\_ (Please print)

Address \_\_\_\_\_

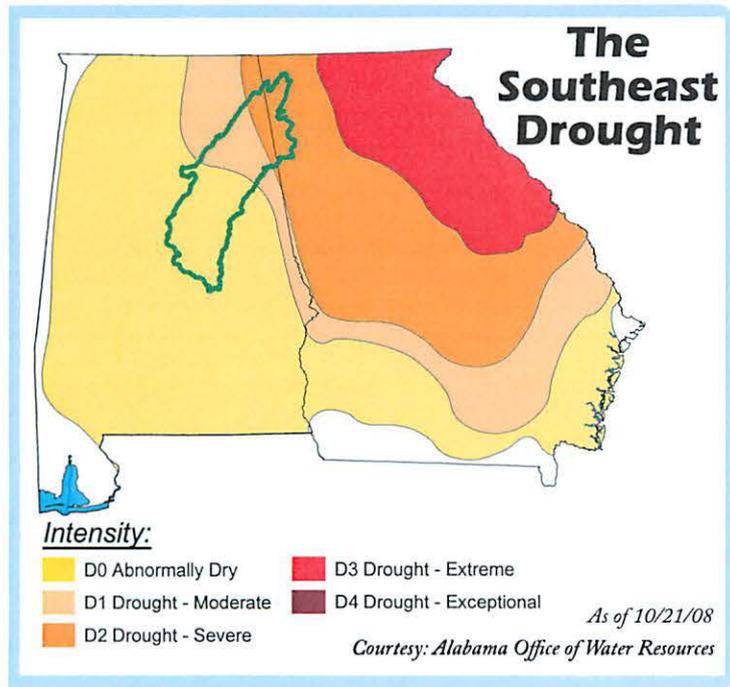
City \_\_\_\_\_ State \_\_\_\_\_ Zip \_\_\_\_\_

I live in the \_\_\_\_\_ River Basin.

\* Limit one kit per household, available to Alabama residents only. Quantities are limited and will be provided on a first request basis.

Send to: AUEI, 1090 S. Donahue Dr., Auburn University, AL 36849

Or order online at [www.cleanwaterpartnership.org](http://www.cleanwaterpartnership.org)



# Low Impact Development

Low Impact Development (LID) is an innovative stormwater management approach with a basic principle that is modeled after nature: manage rainfall at the source using uniformly distributed decentralized micro-scale controls. The goal of LID is to mimic a site's predevelopment hydrology by using design techniques that infiltrate, filter, store, evaporate, and detain runoff close to its source. Techniques are based on the premise that stormwater management should not be seen as stormwater disposal. Instead of conveying and managing / treating stormwater in large, costly end-of-pipe facilities located at the bottom of drainage areas, LID addresses stormwater through small, cost-effective landscape features located at the lot level. These landscape features, known as Integrated Management Practices (IMPs), are the building blocks of LID. Almost all components of the urban environment have the potential to serve as an IMP. This includes not only open space, but also rooftops, streetscapes, parking lots, sidewalks, and medians. LID is a versatile approach that can be applied equally well to new development, urban retrofits, and redevelopment / revitalization projects.

## How Low Impact Design Helps

Action	Benefit
Rain Barrels Native Plant Landscaping	Conserves Water
Rain Gardens Grass Swales Pervious Roadway & Driveway Green Rooftops Bioretention Circle Open-space Design No-mow Zone	Catches stormwater to slow it down and trap pollutants before they get to our rivers, streams, lakes and bays



**An Educational Program for Citizens and Local Officials About Polluted Stormwater Runoff**  
**THE DECISIONS YOU MAKE MATTER!**

**Learn More About:**

- The link between land use and water quality
- The impact of local land use policies
- Enhancing the quality of life in communities
  - Natural resource based planning
  - Protective site design
  - Responsible land stewardship

**Who Should Attend?**

- Elected Officials
- Education and Outreach Organizations
- Planning Agencies
- Engineers and Technical Professionals
- Developers
- Construction Industries
- Citizens and Community Leaders
- Businesses
- Educational Institutions

**Call Today to Schedule a FREE Workshop!**

ADEM Office of Education and Outreach - (334) 394-4350 Patti Hurley - adem.alabama.gov  
NEMO AL Cooperative Extension System - (334) 844-3927 Eve Brantley - www.aces.edu/waterquality



**Rain Gardens**

A rain garden is a planted depression that is designed to absorb rainwater runoff from impervious surfaces like roofs and driveways. Rain gardens can reduce the amount of pollution reaching creeks and streams by 30%.



**Rain Barrels**

Rain barrels capture and store water from rooftops, allowing the homeowner to reuse the water for watering plants and lawns. This storage capacity comes in handy, especially in times of drought and conserves tap water year-round.



**Open-Space Design**

Open-space design involves concentrating development in a compact area of the site leaving the remainder of the site as open space or natural development. This reduces runoff and decreases the amount of land disturbed.

**Green Rooftops**

"Living Roofs" are a thin layer of vegetation installed on top of a roof, capturing water instead of allowing it to runoff and wash pollutants into nearby streams and rivers.



**For more tips, visit [www.lowimpactdevelopment.org](http://www.lowimpactdevelopment.org)**



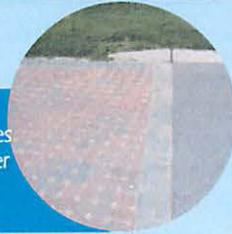
**Grassed Swales**

A grassed swale is a shallow channel, planted with flood tolerant, erosion resistant plants. The design of the swale reduced the velocity of runoff, acting as a filter to reduce pollutants and allowing stormwater infiltration.



**Native Plant Landscaping**

Planting native plants around your home reduces the amount of water and chemicals needed to maintain your landscaping (many native plants are drought and insect tolerant) and looks pretty, too!



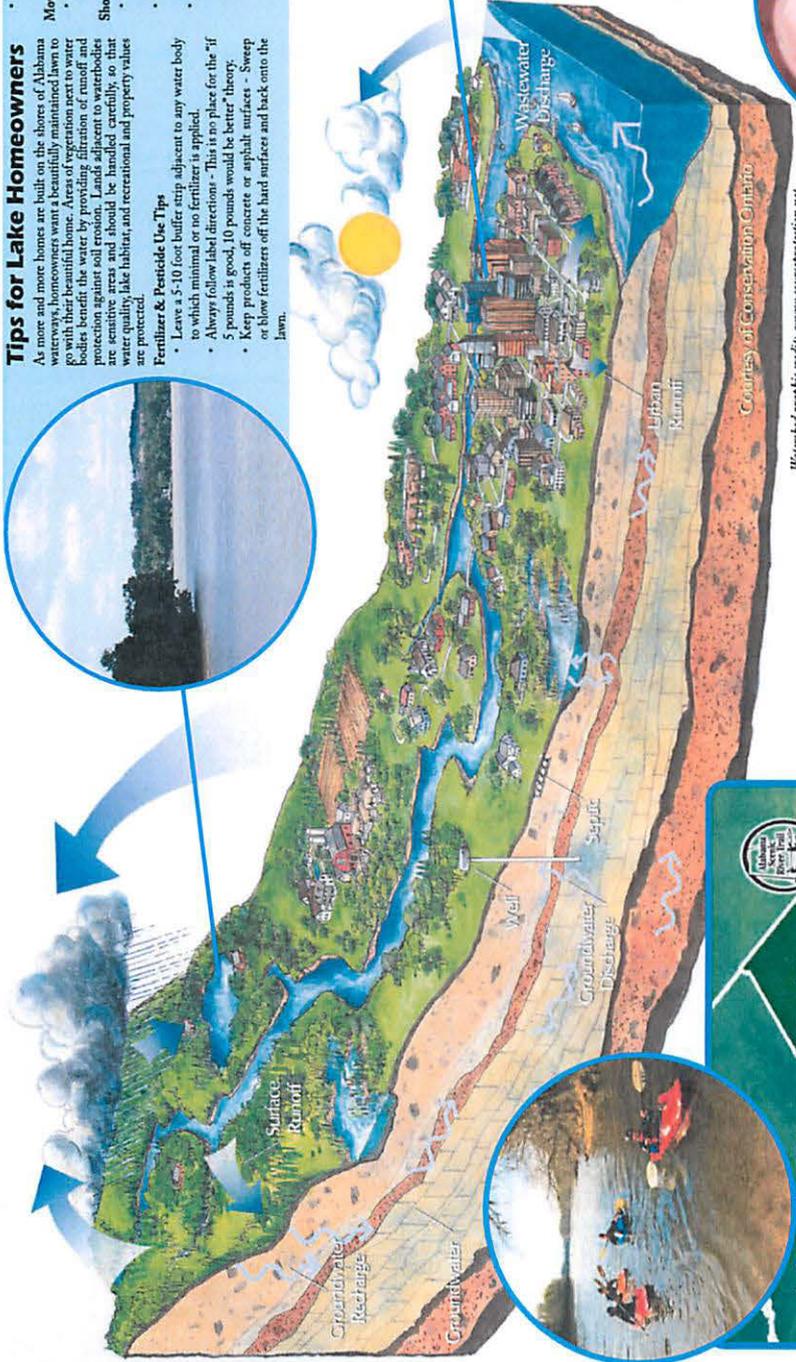
**Pervious Paving Materials**

The use of pervious paving materials in driveways reduces the amount of runoff, minimizing demand on stormwater systems. Toxic materials from car residues and rainwater are also filtered before reaching the water system.

**Bioretention Areas**

Motor oil, antifreeze and other pollutants that leak from improperly maintained automobiles is channeled from parking lots and streets into bioretention areas, where the water soaks into the ground. The attractively landscaped area acts as a natural filter to remove pollutants.





**Tips for Lake Homeowners**  
 As more and more homes are built on the shores of Alabama waterways, homeowners want a beautifully maintained lawn to go with their beautiful home. Areas of vegetation next to water bodies can be a source of erosion, sediment, and nutrients that can be a problem for water quality. Land adjacent to water bodies are sensitive areas and should be handled carefully, so that water quality, lake habitat, and recreational and property values are protected.

- Fertilizer & Pesticide Use Tips**
- Leave a 5-10 foot buffer strip adjacent to any water body to which minimal or no fertilizer is applied.
  - Always follow label directions - This is no place for the "if 5 pounds is good, 10 pounds would be better" theory.
  - Keep products off concrete or asphalt surfaces - Sweep or blow fertilizers off the hard surfaces and back onto the lawn.

**Mowing Tips**

- If you use a professional service, make certain they are familiar with water protection techniques.
- Do not allow clippings to reach the water! This is like throwing fertilizer into the water and should be avoided.

**Shoreline Development Tips**

- Use mulch to cover bare soil to minimize erosion from the site.
- When disturbing soils on steep slopes, stabilize disturbed areas as quickly as possible.
- Shoreline Management Regulations may prohibit intensive removal of vegetation near the shore or on steep slopes. Check with your local jurisdiction for specific regulations.

- Benefits & Uses of a Healthy River**
- Tourism
  - Recreation
  - Industrial Processes
  - Agricultural Production
  - Navigation / Transportation
  - Wastewater Assimilation
  - Hydropower Generation
  - Drinking Water Supply
  - Wildlife Habitat

**Human Impacts on the Water Cycle**

Our activities on the land directly affect water quality and quantity of rivers, streams and groundwater. In urban areas, roads, parking lots, and rooftops collect pollutants - oil, grease, pesticides, litter - and when it rains the water cannot be absorbed. Water that once soaked into the soil now flows directly to the stream through storm drains and roadside ditches and can cause the following problems:

- Pollutants run directly into streams
- Less rainfall enters the ground to replenish the water table and drinking water supplies
- Greater risks of floods and streambank erosion
- Stream temperature increase (can be bad for the "critters" that live there)

Source: Living Together in the Alabama River Basin, AICWP, 2006



Waterbird graphic credit: www.natureprotection.net

**Alabama Scenic River Trail**

Alabama's great new river trail is the longest water trail in any single state of the country, beginning on the Coosa River at the Georgia state line and winding its way across nine beautiful lakes, with scenery ranging from magnificent wildlife preserves and steep stone cliffs to the tranquil beauty of the secluded creeks of the Delta region—the second largest delta in the US. The Trail follows seven rivers and two creeks through a wide variety of types of paddling and scenery. After passing through the Delta, the route follows the eastern shore of Mobile Bay, ending at historic Ft. Morgan.



**The Tolutoma Snail in the Coosa**

In early 2008, a project was initiated to begin assessing the impacts of the 2007 drought on tolutoma snail populations in tributaries of the Middle Coosa Basin, and in the mainstem of the Coosa River, below Jordan Dam. These potential impacts are the result of naturally low stream inflows and reducing the environmental flow requirements at Jordan Dam, in an attempt to conserve water in the reservoir. The Tolutoma Snail, found in the Coosa and Alabama River Basins, is one of three endangered snails in Alabama that gives birth to live young.

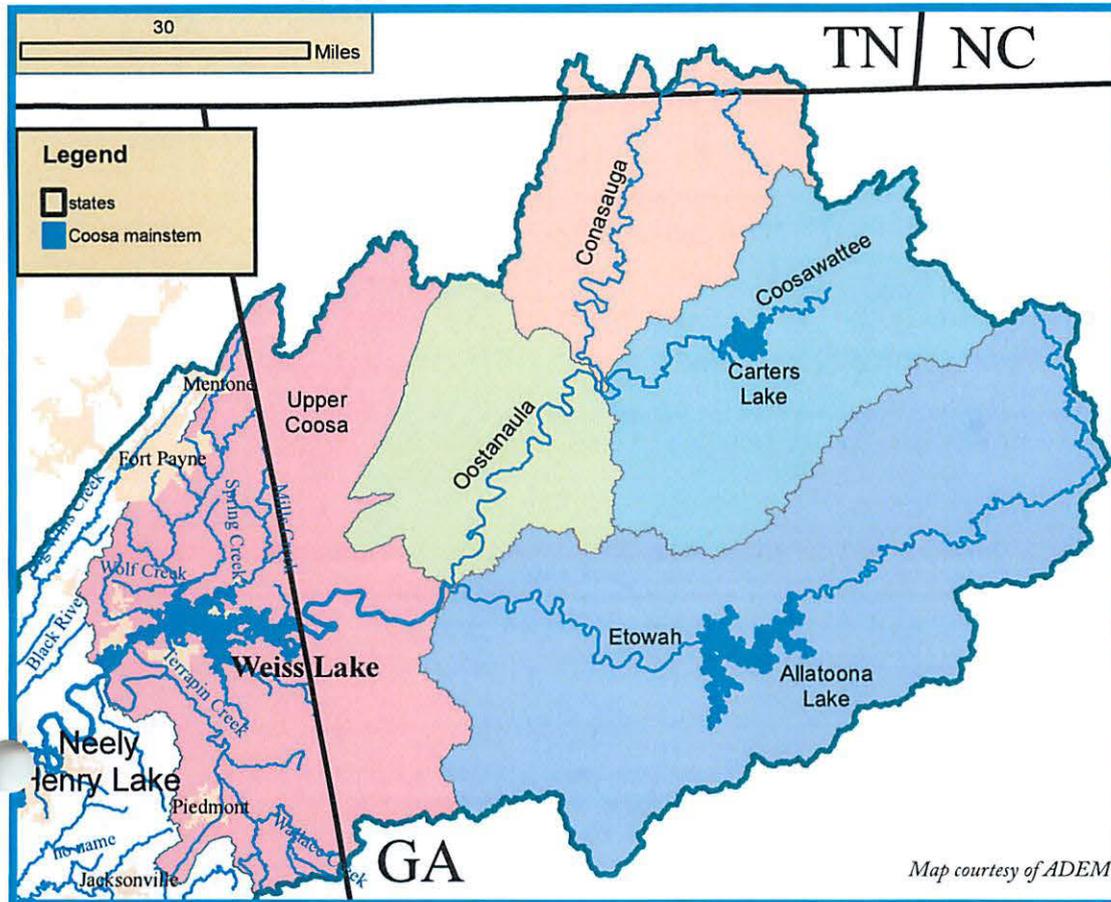
**Project Partners:** Alabama Power Company, Alabama Department of Environmental Management, Alabama Department of Conservation and Natural Resources, Auburn University, and the U.S. Fish and Wildlife Service

**Additional Information on the Species:** on the web at [www.fws.gov](http://www.fws.gov), or contact Jeff Powell in the US Fish and Wildlife Service's Alabama Field Office [Jeff.Powell@fws.gov](mailto:Jeff.Powell@fws.gov)

Source: Alabama Clean Water Partnership



# Upper Coosa River Basin



## Upper Coosa Watershed Facts

- Predominately located in Cherokee County in northeast Alabama with reaches into DeKalb, Calhoun, and Cleburn Counties, including the cities of Centre, Leesburg, Cedar Bluff, Gaylesville, Sandrocks, Spring Garden, Mentone, Ft. Payne and Piedmont
- Mainstem portion of the river basin is largely impounded by Weiss Lake, which extends approximately 52 miles upstream from Weiss Dam near Centre, Alabama, into Floyd County in northwest Georgia
- Major land uses include forestry and agriculture
- Weiss Lake was created in 1961 when Alabama Power Company installed a dam on the Coosa River to generate hydroelectric power. The drainage area to the lake is approximately 5,270 square miles. Weiss Lake has an approximate surface area of 30,200 acres and 450 miles of shoreline and is known by many as the "Crappie Capital of the World".

Source: Upper Coosa River Basin Management Plan, ADEM, July 2004

**Did you know?**  
If leaked into a waterway, a quart of motor oil will contaminate up to 2 million gallons of drinking water.

## What's Happening in the Upper Coosa?

### NEMO Workshop and Little River Canyon Field School Tour a Success

TARCOG in conjunction with the Alabama Clean Water Partnership and Alabama Department of Environmental Management held a NEMO (Nonpoint Source Education for Elected and Municipal Officials) Workshop on March 18, 2008 at the DeKalb Theatre in Fort Payne, AL. This was an educational workshop about the linkages between land use and water quality. In attendance were DeKalb County Commissioners, mayors, engineers, national and state park representatives and other community leaders. Following the workshop the participants met with County Commissioner Brant Craig and Director Pete Conroy of the Environmental Policy and Information Center from Jacksonville State University, for a tour of the Little River Canyon Field School. The facility will be the new headquarters for the Little River Canyon National Preserve and provide educational and cultural programs through Jacksonville State University. The facility is still under construction and will officially open January 2009.



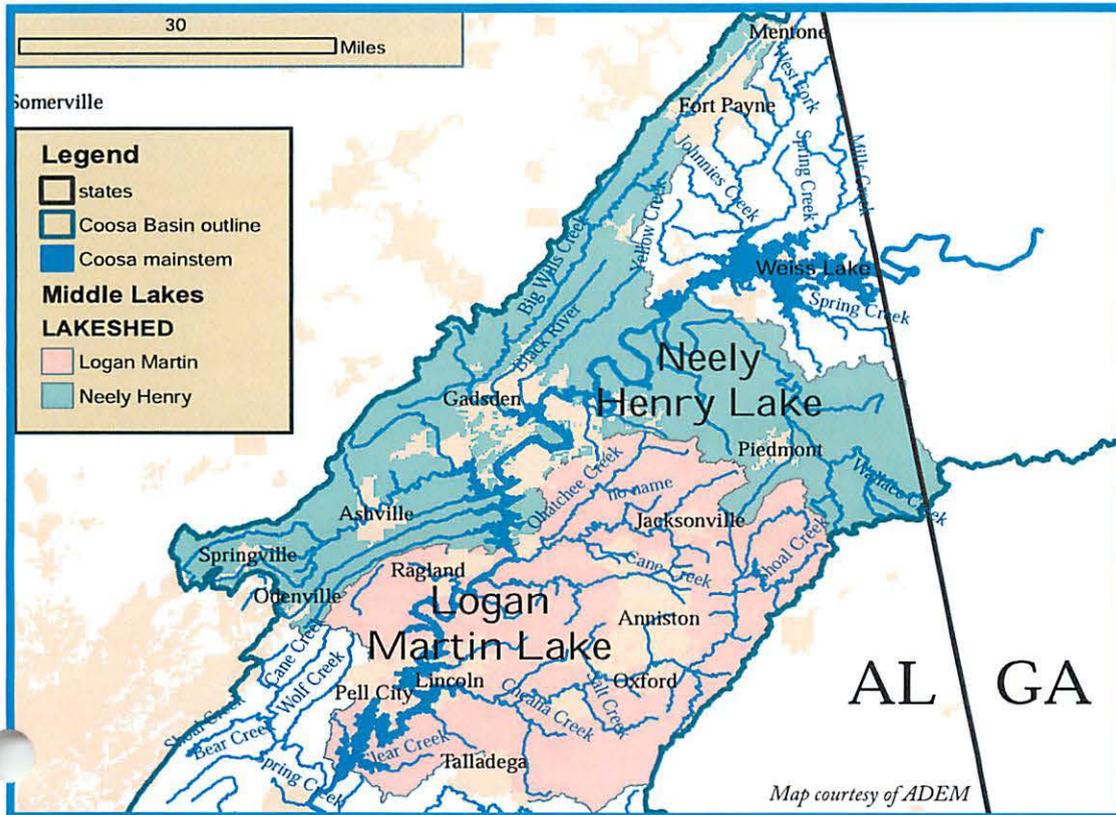
Participants in the March 18 NEMO Workshop enjoy a tour of the Little River Canyon Field School



Cherokee County residents are concerned about cormorants wintering on islands in Weiss Lake, where bird droppings kill vegetation, increase sediment, nutrient and pathogen runoff into the lake during rainfall events, and negatively affect fish populations.

Photo courtesy of Carolyn Landrum

# Middle Coosa River Basin



## Middle Coosa Watershed Facts

- Encompasses approximately 2,585 square miles (1,654,373 acres) in northeast Alabama, with approximately 80% of the drainage area being situated within Calhoun, St. Clair, Etowah and Talladega counties (20% in portions of DeKalb, Shelby, Cleburne, Clay, Cherokee, Blount, and Jefferson Counties),
- Major land uses include forestry, agriculture (cropland, hay, pasture), and urban.
- In 1964 the Alabama Power Company completed construction of Logan Martin Dam, creating Logan Martin Lake. The reservoir covers an area of approximately 15,263 acres and has about 275 miles of shoreline.
- In 1966 the Alabama Power Company completed construction of the Neely Henry Dam, creating Neely Henry Lake. The Neely Henry impoundment covers an area of about 11,235 acres and has about 339 miles of shoreline.
- Surface water supplies almost 90 percent of all drinking water in the Middle Coosa Basin.

Source: Coosa River Basin Management Plan, ACWP, 2003

**Did you know?**  
About 75 percent of the Earth's surface is water, but less than 1 percent is fresh water available for human use.

## What's Happening in the Middle Coosa?

The Middle Coosa Watershed Project is a project of the Etowah and St. Clair County Soil and Water Conservation Districts, supported by a grant from the Alabama Department of Environmental Management and the U.S. Environmental Protection Agency, Region 4. The goal of the Middle Coosa Watershed Project is to improve, protect and maintain the beneficial uses and water quality standards of the Middle Coosa Watershed through a public/private partnership. Public input and involvement form the backbone of the Project. The Middle Coosa Watershed Project provides resources to address current issues in a NON-REGULATORY manner, including failing septic systems, polluted agricultural runoff, polluted urban runoff, and public outreach and education. The project, with help from the Natural Resources Conservation Service, provides technical assistance and cost-share funds to implement best management practices which address polluted runoff in agricultural and urban settings in Etowah and St. Clair Counties.

### Activities include:

- Quarterly Citizen Advisory Committee meetings to plan and implement education and outreach activities (open to anyone with interest in the watershed),
- Etowah County Water Festival & St. Clair County Water Festivals,
- Septic Tank Pump-out Voucher Program,
- Nonpoint Education for Municipal and Elected Officials (NEMO) Workshop,
- "What's in your Water?" teacher workshop

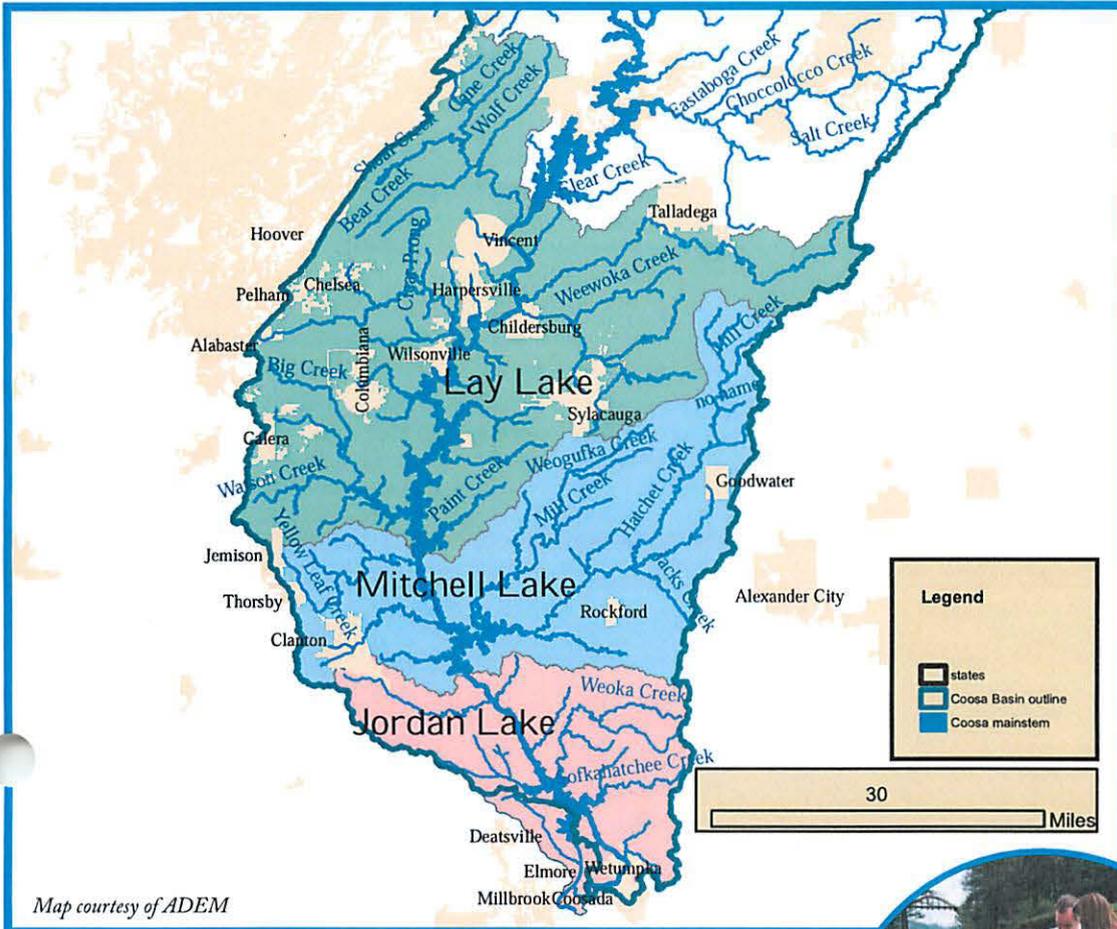
Sarah Butterworth, the Project Coordinator, is available to provide education programs to students or present programs to local groups wanting to learn more about watersheds, nonpoint source pollution, or ongoing local water quality efforts. Both Etowah and St. Clair County Soil and Water Conservation Districts also have educational information available for students, landowners and homeowners.

For more information about the Middle Coosa Watershed Project, Contact the project coordinator at the Soil and Water Conservation District: Etowah County - (256) 546-4841 x 111 or St. Clair County - (205) 338-7215.



Storm water from the Gadsden Mall parking area is channeled into this rain garden to remove pollutants and prevent them from entering the Coosa River

# Lower Coosa River Basin



## Lower Coosa Watershed Facts

- Drains 1,910 square miles, beginning just north of Childersburg at the confluence of the Tallasehatchee Creek with the Coosa River and stretching to the confluence of the Coosa and Tallapoosa Rivers just south of Wetumpka, where they merge to form the Alabama River. This includes portions of seven counties (Autauga, Chilton, Clay, Coosa, Elmore, Shelby and Talladega) and all or portions of 14 municipalities
- Construction on Lay Dam, the first dam constructed on the Coosa, began in 1910. Lay Lake is approximately 12,000 acres in size. The lake is 48.2 miles in length with a shore line of 289 miles and a maximum depth of 88 feet at the dam.
- Mitchell Dam is located near Verbena at what was once known as Duncan's Riffle. It was constructed in 1921 and was Alabama Power Company's second dam on the Coosa. Lake Mitchell, the smallest of the three reservoirs in the Lower Coosa River Basin at 5,850 acres, is 14 miles long and has 147 miles of shoreline with a maximum depth at the dam of 90 feet.
- Construction on Jordan Dam began in 1926. Jordan Dam is located about 14 miles north of Wetumpka at the beginning of what was once known as "Devils Staircase," the wildest part of the Coosa River. The 14-mile stretch cascaded over and around falls creating a roar of water that could be heard a mile from the river.
- The last of the dams on the Coosa to be constructed was Walter Bouldin Dam, which was built on a canal connected to Lake Jordan 40 years after Jordan Dam was complete. Construction began on Bouldin Dam in 1963. It has the largest generating capacity of any of Alabama Power's 14 hydro facilities. Lake Jordan is the reservoir for both Jordan and Bouldin Dams. It is 6,800 acres in size, 18.4 miles long and has 118 miles of shoreline.

Map courtesy of ADEM

## What's Happening in the Lower Coosa?

### MRU's coming to Lake Mitchell

The Lower Coosa Clean Water Partnership is coordinating the installation of Monofilament (Fishing Line) Recycling Units (MRU's) on the Lower Coosa River reservoirs. The MRU's, built with PVC pipe, are provided by the Boat U. S. Foundation for Boating Safety and Clean Water and will first be placed at four marinas on Lake Mitchell by the Lake Mitchell Home Owner Boat Owner Association. Placement of MRU's at additional sites on Lake Mitchell, and on Lakes Lay and Jordan will follow, as project partners are identified and permission for placement is obtained.

Monofilament fishing line is non-biodegradable and lasts about 600 years in the environment. Since most fishing lines are invisible in the water, birds, fish, turtles and other animals cannot see the discarded line, making it easy for them to become tangled in it. Once tangled, they often lose a limb, starve, drown or die. In addition, the discarded line interferes with casting by other fishermen and contributes to unsightly litter problems in area streams and lakes. MRU's provide a place for the disposal of tangled fishing line. The fishing line, once collected, is recycled along with other plastics.

### Want to get involved? Contact:

**Lower Coosa:** Dan Murchison (Lake Mitchell HOBOS and Lower Coosa CWP Chairman) - danmurchison@gmail.com

**Elsewhere in the state:** Allison Jenkins, Alabama Clean Water Partnership - ajenkins@elmore.rr.com or visit the ACWP web site - www.cleanwaterpartnership.org



Members of the Lake Jordan HOBOS get certified in water quality monitoring at an Alabama Water Watch training on Lake Jordan. Want to get involved? See article on page 13 for more information.



Source: Lower Coosa Watershed Management Plan, ACWP, 2005

## "Alien" Invaders In the Coosa River

Aquatic Nuisance Species pose a significant problem to the nation's waterways. These are species introduced outside of their native ranges that can grow in or are closely associated with the aquatic environment. These nuisance species can have harmful effects on the local economy, human health and/or ecology by clogging and covering waterways, crippling boat traffic and competing with native vegetation, creating a monoculture unsuitable for recreation, commerce, native fish and wildlife species.

### Water Hyacinth

- Free-floating, aquatic plant forms dense, floating mats with thick, waxy, rounded, and glossy leaves and rises above the water surface on stalks.
- Flowers are purplish blue or lavender to pinkish
- Reproduce via short "runner" stems that radiate from the base of the plant; also produce seed
- Native to the Amazon River Basin in South America, introduced through the water garden trade.
- Compete with other aquatic species for light, nutrients, and oxygen. Fish spawning areas may be reduced and critical waterfowl habitat degraded



### Parrotfeather

- Also known as watermilfoil, it is a bright green, perennial freshwater plant that is rooted in waterway bottoms, but grows up to a foot above the surface
- Introduced worldwide for use in aquariums and water gardens
- Populations may be quite dense, sometimes forming floating mats, that when uprooted, choke waterways and impede recreational navigation
- Can change the physical and chemical characteristics of lakes and streams and provide habitat for mosquito larvae



### Blue-Green Algae

- Also known by the names of *Lyngbya* and cyanobacteria
- Ranges in color, from yellow to red and sometimes, blue
- Around worldwide, these species are spread through waterways by boats, trailers, waterfowl, and natural flow
- Forms dense mats on the bottom of waterways, displacing native vegetation and preventing fish spawning; The mats break loose and float to the surface where they maintain a "sewage-like" appearance and foul smell as they decompose
- Interfere with water recreational activities including boating, swimming, and fishing
- Potential economic impacts include decreased property values and decreased use of the waterway for recreational purposes, as well as the potential for floating mats to interfere with hydroelectric power generation
- Current treatment methods are expensive and minimally effective



### Dotted Duckweed

- Tiny, dark green, free-floating aquatic plant comprised of one to four oval shaped fronds that produce fine roots
- Native to Australia and Southeast Asia and used extensively in the aquarium and water garden trades
- Impacts largely unknown; Easily distributed, dotted duckweed colonizes and reproduces quickly



### Eurasian watermilfoil

- A rooted, submersed perennial plant with finely dissected feather-like leaves.
- Native to Europe, Asia, and northern Africa, Eurasian watermilfoil was accidentally introduced from Eurasia in the 1940s. It is thought that either the plant was discarded from an aquarium or brought in attached to commercial or private boats.
- Eurasian milfoil often forms large, floating mats of vegetation on lakes, rivers, and other water bodies, effectively blocking light penetration to native aquatic plants. The dense floating mats can also impede water traffic.



### Water Lettuce

- Water Lettuce, native to South America, is a free-floating perennial with long, feathery, hanging roots and oblong, light green and velvety-hairy leaves.
- It is capable of forming dense mats on the surfaces of lakes, ponds, rivers, and other bodies of water. It can spread when parts of plants are broken off by passing boats.
- Water lettuce is readily available on the internet. Dumping of aquarium or ornamental pond plants is often the means of spread.
- Water lettuce can severely impact the environment and economy of infested areas. The dense mats disrupt natural ecosystems and block waterways, increasing navigation difficulties and hindering flood control efforts. These dense mats can lead to a lower concentration of oxygen in covered waters. Extremely thick mats can prevent sunlight from reaching underlying water and may impact native aquatic species.



### Brittle naiad

- Brittle naiad is a submersed rooted annual native to Eurasia and Africa Brittle naiad is scattered across Alabama with records in five drainages and eight counties.
- First detected in Troy, New York in 1932, it quickly spread to the Great Lakes and southward and is primarily dispersed by water currents and animals.
- Forming dense stands in shallow water, brittle naiad can hinder swimming, fishing, boating, and other forms of water traffic and recreation. It often grows with other submersed aquatic plants such as southern naiad, pondweed, coontail, and watermilfoil and can out-compete native species in many instances.



Source: State Management Plan for Aquatic Nuisance Species in Alabama, by the Alabama Aquatic Nuisance Species Task Force, 2007

Additional information regarding invasive aquatic species:  
Alabama Department of Conservation & Natural Resources at  
[www.outdooralabama.com/education/generalinfo/ans/](http://www.outdooralabama.com/education/generalinfo/ans/) or 1-800-LAKES11

## WHAT CAN YOU DO?

**Boaters should always check and wash boat hulls, motors and trailers, and check bilge water closely when transporting craft from one body of water to another, to minimize spreading.**

**Never allow store bought water garden plants to enter the natural environment – Let dry out and toss into garbage can for disposal at landfill.**



Alabama Water Watch is a statewide citizen volunteer water quality monitoring program that provides training, data management, information exchange and other means of support for the public to become personally involved in water issues. Since 1992 AWW accomplishments include:

- 1,200 free workshops in water testing for the public
- 4,800 certified monitors in 250 citizen groups on 750 waterbodies

- 54,000 data records from 1,900 sites in an online database
- 5 volumes of *Citizen Guide to Alabama Rivers*
- *Exploring Alabama's Living Streams* classroom curriculum
- 2 EPA-approved water monitoring protocols

### Get Involved!

Alabama Water Watch  
250 Upchurch Hall  
Auburn University, AL 36849-5415  
Telephone (toll free): (888) 844-4785  
Fax (334) 844-3666  
Email: [awwprog@auburn.edu](mailto:awwprog@auburn.edu)  
Web: [www.alabamawaterwatch.org](http://www.alabamawaterwatch.org)

# On the Ground:

## Impaired streams in the Coosa River Basin

Having an impaired waterbody in your area can negatively affect:

- Future growth, development and land-use decisions
- Recreational activities and opportunities
- Municipal wastewater plant and industrial discharge permits (including the recruitment of new industry)
- Storm water discharge permits
- Fish & wildlife living in or near stream

The waterbodies listed in the table to the right are those in the Coosa River Basin that are currently listed as impaired.



ADEM staff conduct water quality monitoring efforts in the Coosa Basin.

*Photo courtesy of ADEM*

Once a stream is listed as impaired, a "pollution budget" or Total Maximum Daily Load (TMDL) must be developed for that stream segment for each pollutant causing impairment. River segments in the Coosa River Basin that currently have approved TMDLs in place are listed in the table below. For additional information: [www.adem.state.al.us](http://www.adem.state.al.us)

### Approved TMDLs for Coosa Waterbodies

Waterbody Name	County	TMDL	"Final TMDL Date (approval date)"
Little Wills Creek	Dekalb	OE/DO	Aug-97
UT to Dry Branch	Shelby	OE/DO	Aug-97
Buxahatchee Creek	Shelby/Chilton	OE/DO	Aug-97
Weiss Lake	Cherokee	Nutrients	Nov-04
Weiss Lake	Cherokee	Priority Organics (PCBs)	Nov-04
Buxahatchee Creek	Shelby/Chilton	Nutrients	Mar-08

Waterbody Name	County	Reason for Impairment	Cause
Spring Creek	Cherokee	Pathogens	Unknown source
Spring Creek	Cherokee	Nutrients	Agriculture
Mud Creek	Cherokee	Pathogens	Unknown source
"Coosa River (Logan Martin Lake)"	St. Clair & Talladega	"Nutrients, Organic Enrichment (CBOD, NBOD)"	Urban runoff/storm sewers & Flow regulation/modification
"Coosa River (Logan Martin Lake)"	St. Clair & Talladega	Priority Organics (PCBs)	Contaminated sediments
"Coosa River (Logan Martin Lake)"	St. Clair, Talladega & Calhoun	"Nutrients, Organic Enrichment, (CBOD, NBOD)"	Urban runoff/storm sewers Flow regulation/modification
"Coosa River (Logan Martin Lake)"	St. Clair, Talladega & Calhoun	Priority Organics (PCBs)	Contaminated sediments
"Coosa River (Logan Martin Lake)"	St. Clair & Calhoun	"Nutrients, Organic Enrichment, CBOD, NBOD)"	Urban runoff/storm sewers Flow regulation/modification
"Coosa River (Logan Martin Lake)"	St. Clair & Calhoun	Priority Organics (PCBs)	Contaminated sediments
"Coosa River (Neely Henry Lake)"	Etowah, St. Clair & Calhoun	"Nutrients, pH, Organic Enrichment (CBOD, NBOD)"	Industrial, Municipal, Flow regulation/modification & Upstream sources
"Coosa River (Neely Henry Lake)"	Etowah	"Nutrients, pH, Organic Enrichment (CBOD, NBOD)"	Industrial, Municipal, Flow regulation/modification & Upstream sources
"Coosa River (Neely Henry Lake)"	Etowah	"Nutrients, pH, Organic Enrichment (CBOD, NBOD)"	Industrial, Municipal, Flow regulation/modification & Upstream sources
"Coosa River (Neely Henry Lake)"	Etowah	Priority Organics (PCBs)	Contaminated sediments
"Coosa River (Neely Henry Lake)"	Etowah & Cherokee	"Nutrients, pH, Organic Enrichment (CBOD, NBOD)"	Industrial, Municipal, Flow regulation/modification & Upstream sources
"Coosa River (Neely Henry Lake)"	Etowah & Cherokee	Priority Organics (PCBs)	Contaminated sediments
Choccolocco Creek	Talladega & Calhoun	Priority Organics (PCBs)	Contaminated sediments
Choccolocco Creek	Calhoun	Priority Organics (PCBs)	Contaminated sediments
"Coosa River (Lay Lake)"	Talladega, Chilton, Coosa & Shelby	"Nutrients, Organic Enrichment (CBOD, NBOD)"	Flow regulation/modification & Upstream sources
"Coosa River (Lay Lake)"	Talladega, Chilton, Coosa & Shelby	Priority Organics (PCBs)	Contaminated sediments
"Coosa River (Lay Lake)"	Talladega & Shelby	"Nutrients, Organic Enrichment (CBOD, NBOD)"	Flow regulation/modification & Upstream sources
"Coosa River (Lay Lake)"	Talladega & Shelby	Priority Organics (PCBs)	Contaminated sediments
"Coosa River (Lay Lake)"	Talladega, Shelby & St. Clair	"Nutrients, Organic Enrichment (CBOD, NBOD)"	Flow regulation/modification & Upstream sources
"Coosa River (Lay Lake)"	Talladega, Shelby & St. Clair	Priority Organics (PCBs)	Contaminated sediments
"Coosa River (Mitchell Lake)"	Chilton & Coosa	Nutrients	Urban runoff/storm sewers & Flow regulation/modification
UT to Dry Branch	Shelby	Nutrients	Municipal & Urban runoff/storm sewers

Source: Alabama Department of Environmental Management, Final 2008 303(d) List of Impaired Waters. For additional information visit: <http://www.adem.state.al.us/WaterDivision/WQuality/303d/WQ303d.htm>.

## Gadsden Stream Restoration

In September of 2005, a stream restoration project was constructed as part of a park revitalization project in North Gadsden. The Middle Coosa Watershed Project, Gadsden State Community College, and City of Gadsden worked together to improve water quality, habitat quality, and the beauty of a stream that had been previously ditched and straightened. A new stream channel was constructed that more closely matched the pattern and size of stable, healthy streams in north Alabama.

The new, restored stream has more curves (increased sinuosity), was narrower (faster moving water), and has beautiful native streamside plants placed along the streambanks. Adding curves to the stream increased the different types of habitat in the stream from one long ditch to a stream with deeper pools and shallow riffles. The faster moving water and shade provided by the native plants improves the levels of dissolved oxygen needed by animals living in the stream. Also, the streamside plants anchor the streambank in place and provide an attractive stop for butterflies, dragonflies, and birds.

This project was made possible through funding provided by the Alabama Department of Environmental Management (ADEM) and U.S. Environmental Protection Agency, Region 4, with support from Gadsden Water Works, with ADEM providing pre & post monitoring for project effectiveness.

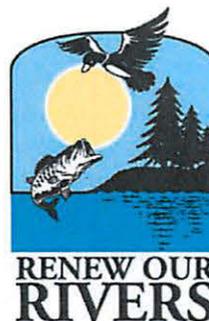
Source: Eve Brantley (brantef@auburn.edu), Dept. of Agronomy and Soils, Alabama Cooperative Extension System, Water Program



Before



After



Renew Our Rivers has grown from a single river cleanup event in Gadsden, Ala. to a nationally recognized cleanup campaign that now includes Alabama, Georgia, Mississippi and the Florida panhandle, six river systems and brings together more than 10,000 volunteers. Rivers of Alabama are cleaner, thanks to the award-winning Renew Our Rivers, cleanup program. Renew

Our Rivers is one of the Southeast's largest organized river-system cleanup. This year's Renew Our Rivers motto is: Our Cause is Noble - Our Efforts are Local.

To get involved simply take a look at the schedule of cleanups, select the one nearest you and show up. Bring your family, friends or community group to volunteer. For additional information visit [www.alabamapower.com](http://www.alabamapower.com).

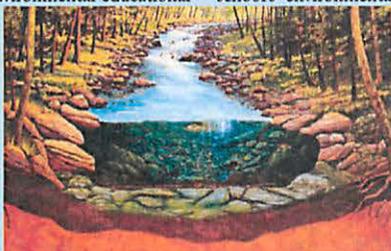
## Munford Elementary School Leading the Way in Environmental Education

Munford Elementary School is a partner of the National Forests of Alabama. In August 2001 it became the first school in the southeast designed with an environmental educational theme with the Forest Service serving as one of Talladega County Board of Education lead supporters.

Nestled near the Talladega National Forest, Munford Elementary School incorporates a natural environment as the setting to teach reading, writing, language, math, science, history, and social sciences.

Teachers incorporate all the natural resource exhibits and displays into their daily teachings at Munford Elementary School. Munford Elementary School uses a process called "theme immersion", which allows teachers to use the

instructional design of the school and the interpretive physical design and exhibits to reinforce their lessons. The elementary school's environmental learning experience and the Forest Service's support expanded to Munford Middle and High School in January 2006. The basic themes are the same in all three schools, but the complexity increases to match the level of the students. With its passion for protecting the environment and partnership with the Forest Service, Munford Elementary School aims to produce well-rounded citizens and future environmental stewards.



Source: USDA Forest Service, <http://www.fs.fed.us/sustainableoperations/youth-munford.shtml>

## Precision Agriculture Protects Your Water

The Precision Agriculture Program of the Cooperative Extension System works with Global Positioning Systems (GPS) technologies that lead to reduced fertilizer and/or pesticide applications which translate into cleaner water and improved farm efficiency. Guidance systems, which are maintained for on-farm demonstrations, reduce equipment overlap in the field, resulting in decreased chemical application and fuel usage. Airplane imagery and data collected from tractor-mounted sensors can be used for variable rate chemical applications. Targeted fertilizer applications allow fields to be divided into zones (each is approx. 10-20 acres) instead of basing the application on one composite sample for the entire field, resulting in less chemical runoff.

Contact Shannon Norwood (hubersr@auburn.edu) or Amy Winstead (winstat@auburn.edu) at 256-353-8702.



Precision Agriculture works with GPS zones to ensure even and appropriate fertilizer and pesticide usage.

## Lake Associations Offer Valuable Services

Lake Associations, many of them called "HOBOS" (Home Owner / Boat Owner), can be found the length of the Coosa River, from Weiss Lake downstream to Lake Jordan, and on all reservoirs in between. Most have a mission that includes preserving, protecting and improving the water resource for lake residents and users. The types of services provided include the coordination of clean-up events, quarterly informational newsletters, resident directories, placement of 911 boathouse signs, fish enhancement, fireworks displays, public weather radios, water quality testing (AL Water Watch), and assistance with 4th Grade Water Festivals.



Fire rescue boat provided by Lake Mitchell HOBOS

## Contact the Association on your lake of interest to get involved:

### Weiss Lake Improvement Association

Carolyn Landrum, Carolynl@tds.net

### Neely Henry Lake Association

[www.neelyhenrylakeassoc.org](http://www.neelyhenrylakeassoc.org)

### Logan Martin Lake Protection Association

P.O. Box 2002, Pell City, AL 35123

### Lay Lake HOBOS

Joe Sullivan, joe@sullivancomm.com

### Lake Mitchell HOBOS

Jim Woodrow, P.O. Box 1324, Clanton, AL 35046

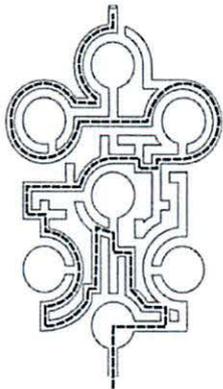
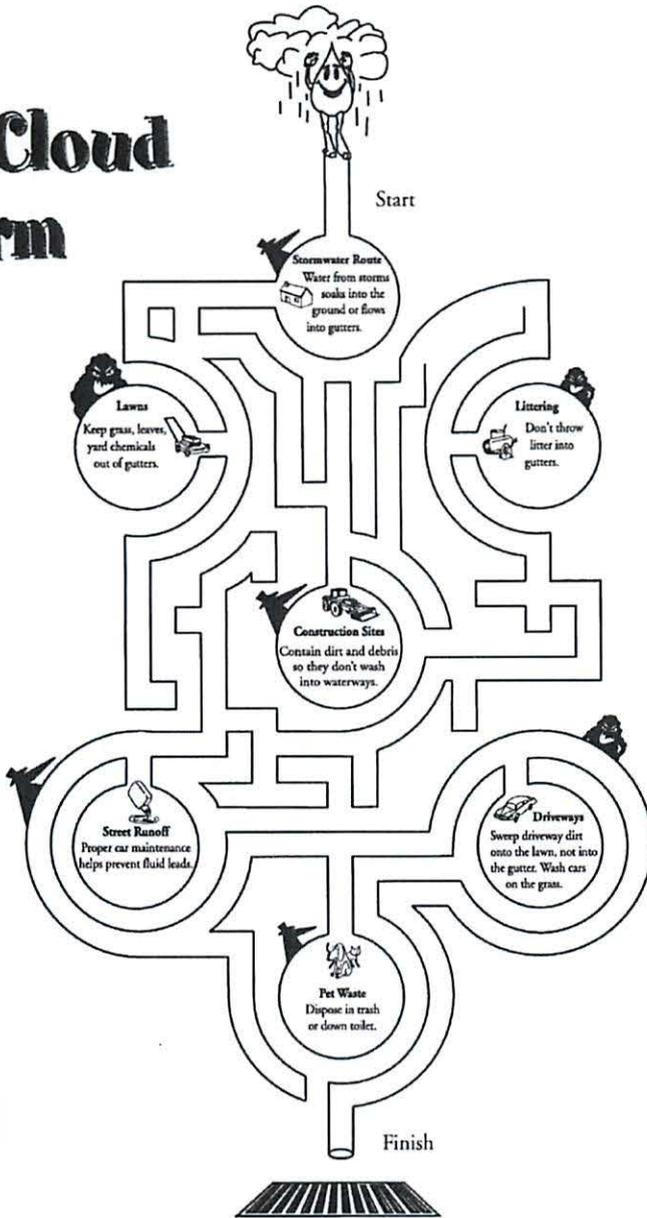
### Lake Jordan HOBOS

Joe Young, (334) 567-1213, jyoung@elmore.rr.com

# From Storm Cloud To Storm Drain

The stormwater system channels rain into gutters, which drain into streams and rivers. When people pollute stormwater, they also pollute our natural waterways.

Help Droplet journey through the stormwater system without becoming contaminated by Sludge or Toxic.

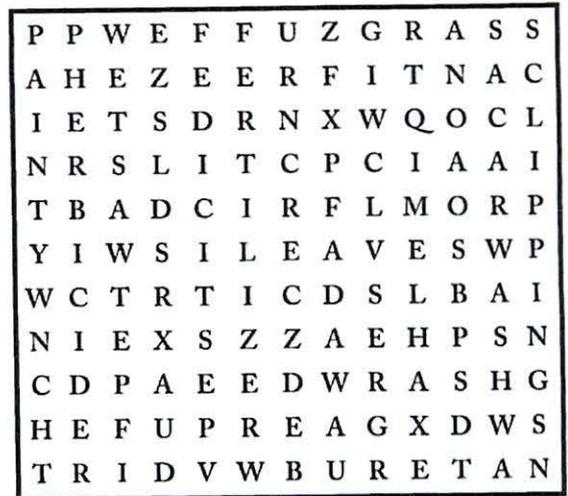


WE ALL LIVE DOWNSTREAM

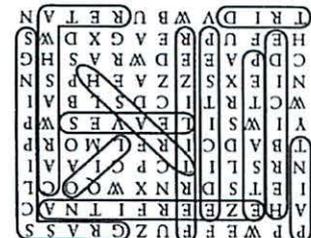
## The Dirty Dozen

When stormwater carries pollutants from thousands of Alabama homes into gutters, it adds up to a big problem for our streams and rivers. Hidden in the puzzle below are a dozen common stormwater contaminants from household sources.

Can you find and circle all 12?



1. Paint
2. Oil
3. Antifreeze
4. Dirt
5. Leaves
6. Grass clippings
7. Pet waste
8. Pesticide
9. Herbicide
10. Fertilizer
11. Trash
12. Car wash water



These activities have been adapted for use by Alabama Department of Environmental Management. It was originally prepared by the Salt Lake County, Utah, Public Works Department Engineering Division



400-600  
People

# FALL FEST



**Saturday, September 20th ~ 9am-2pm**  
**Cane Creek Community Gardens at McClellan**

**Admission \$1**

***Wear your best garden hat or scarecrow costume & get in FREE. Children under 10 are FREE!!!***

- Mobile Dairy Classroom
- Kids' Activities
- Wildlife Show
- Horse Rides (\$1)
- Quilt Show
- Plant Show
- Canning Contest
- Carving, basket weaving demos
- Arts & Crafts Contest
- Baked Goods Contest
- Cakewalk
- Quilting Contest & Show
- Grocery Give-a-Way
- Fall Farmers' Market & Craft Vendors
- Bake Sale

**Bring the whole family out for a day loaded with fun!**

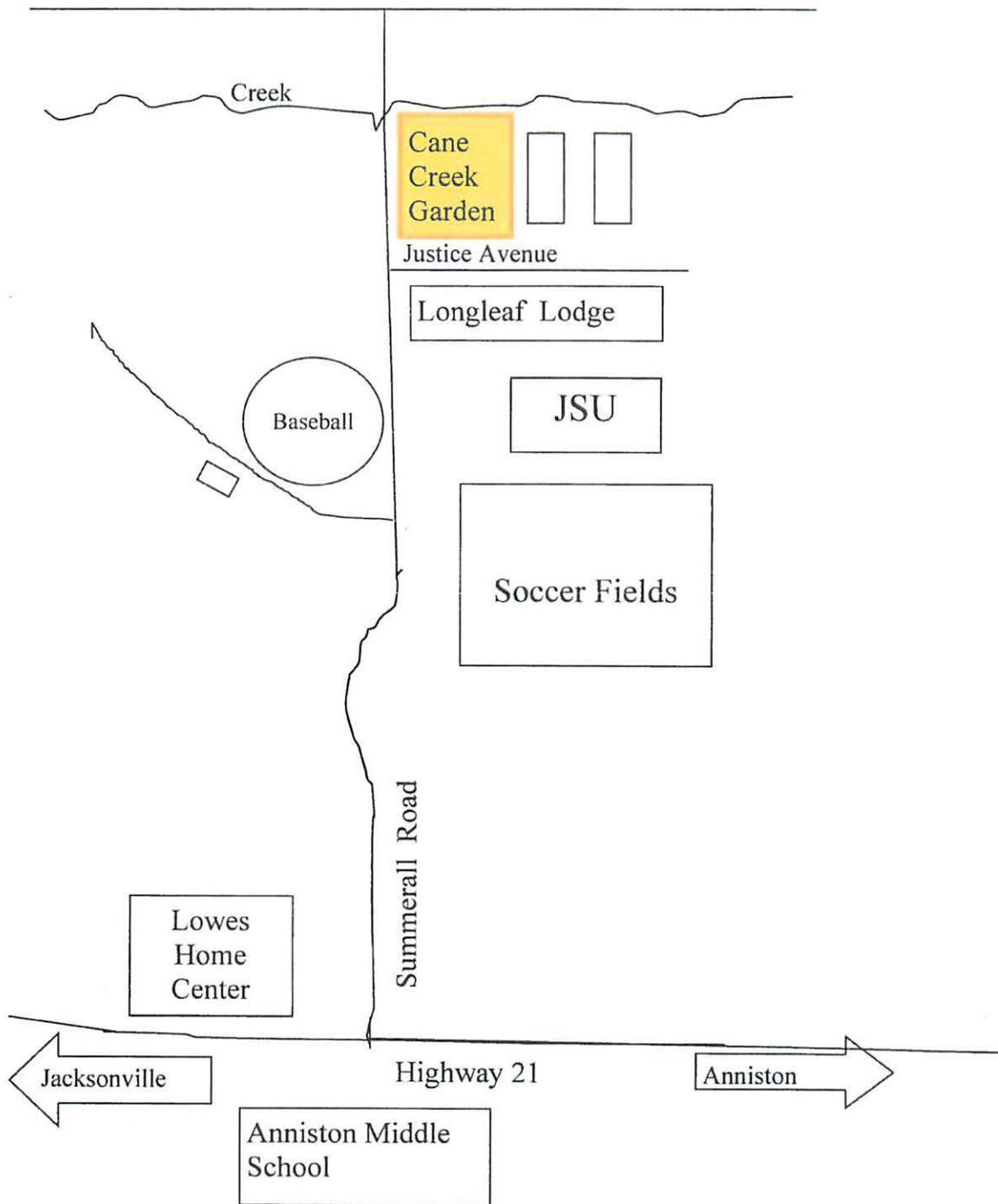
***Proceeds benefit continued development of Cane Creek Sustainability Center.***

For more info & to register for contests call 256-237-1621, or check our website:

[www.aces.edu/Calhoun](http://www.aces.edu/Calhoun)

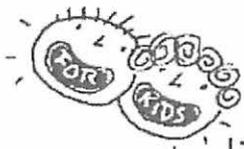
**Vendor Spaces available—contact the Extension Office for more information.**

Medical Mall



Cane Creek Community Garden and Education Center is located at the former Ft. McClellan in Calhoun County. Follow Highway 21 to the new Lowe's Building Center near Anniston Middle School, just north of Anniston. Turn east at the traffic light and follow Summerall Gate Road about 2 miles, passing soccer fields on your right and baseball fields on your left. Just past the baseball fields, you will see Long Leaf Lodge on the right. Turn right onto Justice Avenue -- the garden is on your immediate left, # 77

# Blue Thumb Word Search



Most people in North America get their water from a public water utility. Public utilities are companies or government agencies that supply needs such as electricity, gas, or water to the public. Water utilities get their water from rivers, lakes, reservoirs, or underground aquifers. Often, the water must be treated to make it safe to drink.

We reuse the same water over and over and it can become polluted by people and industry. Even deep underground aquifers can be polluted from the surface. For example, many household items, such as car wax, spot remover, or floor polish, should not be poured down the drain or thrown out in the trash. Even lawn chemicals and other garden toxins used outdoors can contaminate water sources by running off the land into storm drains. And water can end up in lakes and rivers.

Let's take care of our water resources. Use your "Blue Thumb" to conserve water, protect it, and get involved.

## New Vocabulary Words:

**water sources** - bodies of water such as lakes, rivers, reservoirs, and underground aquifers from which we draw water for drinking

**treatment** - a series of chemical and physical processes to remove dissolved and suspended solids from raw water to produce safe water to drink

**contaminate** - to make unsafe for drinking

**pesticide** - a chemical used to kill pests

**hazardous** - dangerous or harmful



## Can You Find These Words?

(circle each one)

- |               |             |
|---------------|-------------|
| nature        | recycle     |
| drink         | pesticide   |
| toxic         | oil         |
| fertilizer    | batteries   |
| paint         | contaminate |
| gasoline      | hazardous   |
| clean         | wells       |
| treatment     | leaks       |
| tap           | pollute     |
| protect       | safe        |
| water sources |             |

W	E	L	L	S	D	M	P	Q	S	V	F
L	A	B	O	T	P	O	L	L	U	T	E
H	Z	T	R	E	A	T	M	E	N	T	R
C	P	A	E	R	I	C	B	C	U	E	T
O	Y	P	C	R	F	E	N	L	K	D	I
N	A	H	Y	J	S	T	M	E	H	I	L
T	E	A	C	P	Z	O	C	A	L	C	I
A	F	Z	L	K	T	R	U	N	T	I	Z
M	A	A	E	D	O	P	E	R	B	T	E
I	S	R	I	X	X	N	W	G	C	S	R
N	M	D	P	A	I	N	T	S	L	E	V
A	B	O	I	L	C	F	S	M	O	P	S
T	F	U	O	D	R	I	N	K	T	E	S
E	D	S	L	M	O	H	J	L	A	M	R
P	A	T	B	A	T	T	E	R	I	E	S
G	K	U	E	F	N	A	T	U	R	E	L

## **2014 Calhoun County Storm Water Management Report**

### **Notable MS4 Activities in Calhoun County**

#### **Public-Education-Activities**

August 23, 2014 @ 6:00 pm – Stormwater education pamphlets passed out in conjunction with the City of Jacksonville at the Spirit on Mountain Street Festival. Those in attendance include but are not limited to general public ranging from ages of 2-60 and JSU students and faculty. Students and faculty from Jacksonville High School, Pleasant Valley High School, Jacksonville Christian Academy, and White Plains High School were also in attendance.

September 20, 2014 @ 9:00 am – 2:00 pm – Representatives from Calhoun County Stormwater Cooperative held a booth at the Fall Fest at Cane Creek. The representative passed out approximately 25 Stormwater Awareness surveys and approximately 50 stormwater word searches to kids attending the Fall Fest.

September 2, 2014 @ 10:00 am – Representatives from Calhoun County Stormwater Cooperative met with Danny Vaughn from TV24, did an interview to be aired on 9-2-2014 concerning MS4 and what the public can do to help keep the stormwater systems clean and free of pollution.

October 15, 2014 – Calhoun County ran a public service announcement in the Anniston Star. See attached ad and PO.

September and October – A Calhoun County representative met with the 4<sup>th</sup> graders of all the schools in the Calhoun County School System and signed several children up for the 4-H program. In the 4-H program the children will be taught about the stormwater issues and how to prevent them.

December 3, 2014 – Stormwater Pollution brochures were placed at the Calhoun County Court House building. (Approx. 30)

December 5, 2014 – Stormwater Pollution brochures were placed at the Calhoun County Highway Department. (Approx. 30)

December 30, 2014 – Chris Gann spoke with the Anniston Star about the stormwater runoff issues. See attached article.

October 3, 2014 – Calhoun County updated the web page dedicated to stormwater.

#### **Public-Involvement-Activities**

##### **Calhoun County Stormwater Cooperative**

August 27, 2014 @ 10:00 am – Representatives from Calhoun County, The City of Oxford, The City of Anniston, and The City of Anniston met at the Calhoun County Highway Department to form the Calhoun County Stormwater Cooperative.

October 1, 2014 @ 10:00 am – The Calhoun County Stormwater Cooperative met to go over the MS4 actions that were taken during the month of September and new strategies to implement to get the

## **2014 Calhoun County Storm Water Management Report**

public more involved. Also, the cooperative talked about the upcoming events and festivals to be a part of.

**November 5, 2014 @ 10:00 am** – The Calhoun County Stormwater Cooperative met along with the Alabama Clean Water Partnership and Coosa Valley RC & D. A number of events to be held in the near future were discussed. These events include water festivals, creek clean ups, and education workshops. The Alabama Clean Water Partnership and Coosa Valley RC & D agreed to partner with The Calhoun County Stormwater Cooperative on some of the upcoming events.

**November 18, 2014 @ 11:30 am** – A representative from Calhoun County attend the Choccolocco Creek Water Alliance (CCWA) meeting at the Oxford Civic Center. A partnership with Calhoun County Stormwater Cooperative and the CCWA was discussed and agreed upon. See agenda and minutes.

**November 26, 2014 @ 10:00 am** – Representatives from The Calhoun County Stormwater Cooperative met with the Citizens Advisory Committee, passed out 25 brochures for the committee to review and advise on. Also gave an update on the MS4 program and the events of the past month.

**December 3, 2014 @ 10:00 am** – The Calhoun County Stormwater Cooperative met to discuss upcoming events and stormwater education opportunities. See attached minutes.

### **Stormwater Citizens Advisory Committee**

**September 24, 2014 @ 10:00 am** – Representatives from the Calhoun County Stormwater Cooperative met Citizens Advisory Committee with the East Alabama Planning Commission to form the Stormwater Citizens Advisory Committee. Illicit Discharge information and stormwater awareness survey were also passed out during the meeting. Also handed out 20 Illicit Discharge information sheets handed out.

**November 26, 2014 @ 10:00 am** – Representatives from The Calhoun County Stormwater Cooperative met with the Citizens Advisory Committee, passed out 25 brochures for the committee to review and advise on. Also gave an update on the MS4 program and the events of the past month.

### **Other Public Involvement Activities**

**September 18, 2014** – Calhoun County adopted 2 new standard operating procedures. See attached documents.

**December 9, 2014** – Representatives from Calhoun County partnered with Munford Schools to hold a free electronics recycling day at Munford Elementary School. The event collected over 8700 lbs. of electronics. See Pictures.

**October 18, 2014** – Calhoun County Landfill had a free dumping event. Citizens were allowed to bring their trash, yard and construction debris, etc. to the land fill and dump it without a charge or fee. 343 vehicles delivered various amounts of debris to the landfill.

## Erosion and Sediment Control Inspection Report Form

*Project Name and Location*

Weather: \_\_\_\_\_

Rain in last 24 hrs (inches): \_\_\_\_\_

Owner / Permittee: \_\_\_\_\_

**Pollution Control Measures (BMP) Checklist:**

- \_\_\_\_\_ Inlet Barrier (ie: gravel bags)
- \_\_\_\_\_ Sediment Barriers (ie: ditch checks)
- \_\_\_\_\_ Erosion Blankets, Hydromulch / Seed, etc
- \_\_\_\_\_ Stabilized Construction Entrance
- \_\_\_\_\_ Stream Crossings
- \_\_\_\_\_ Seed / Sod Areas
- \_\_\_\_\_ Sediment Basins & Discharge Locations
- \_\_\_\_\_ Borrow Areas
- \_\_\_\_\_ General Site Condition (trash, etc)

**A. Current Construction / Active Areas:**

**B. Problem Areas / Special Observations(\*Note problem areas ONLY below\*):**

BMP	Location	Observations, Effectiveness, & Corrective Actions Ordered

**C. Listing of Areas where construction operations have permanently or temporarily stopped; stabilization measures initiated.**

**D. Have items noted on last inspection been corrected? Yes No (if No, Explain:)**

*Note: Inspection comments above indicate deficiencies only. Deficiencies must be corrected within 7 days, unless otherwise noted. All other BMP's on site are considered to be in good working condition.*

**Date of Inspection**

**Inspector Signature**

- 6 Goals • No Sediment Leaves the Site • Lines of Defense Everywhere & Always • Cover Quickly  
 • Protect the Swale, Ditch, and Channel • Keep Clean Water Clean • Inspect, Clean & Fix

## BMP Inspection Checklist

### General notes about Inspections:

- 1) Site inspected regularly ( Proportional to amount of construction activity)
- 2) Minimum monthly inspections
- 3) Within 24 hours of the end of a storm with rain >0.5"
- 4) Deficiencies corrected within 7 calendar days of inspection

### 3 key elements to look at during inspection

- 1) Proper installation
- 2) Operation
- 3) Maintenance

---

### Inlet Barriers (ie:sand bags, gutter buddies, straw wattles)

- ✓ Is the structure deteriorating
- ✓ Is sediment >1/2 the height of structure?
- ✓ Evidence of water/sediment getting around or under barrier?
- ✓ Are there other structures that require inlet barriers?

### Sediment Barriers (ie:ditch checks)

- ✓ Are they trenched in or falling down?
- ✓ Evidence of sediment/water getting around or under barrier?
- ✓ Is sediment more than 1/2 height of structure?
- ✓ Are there areas where more sediment barriers are required or need extended?

### Perimeter Control (ie: silt fence, straw wattles)

- ✓ Is all the off-site water being diverted where applicable?
- ✓ Evidence of water/sediment getting around or under barrier?
- ✓ Are there areas that need extended or additions to other locations?

### Stabilized Construction Entrance

- ✓ Is gravel clean or getting filled with mud?
- ✓ Evidence of sediment being tracked off site onto public streets?

### Stream Crossing

- ✓ Is crushed stone in place?
- ✓ Wash outs?

### Final or temporary Stabilization area

- ✓ Mulches/Grasses-are areas thinning or have been disturbed? Re-application req'd?
- ✓ Straw Blankets-are they deteriorating and need replaced?

### Borrow Areas

- ✓ When on site or offsite borrow areas, which include contractor furnished, are to be excavated below ground elevations, an earth berm must be constructed around the borrow area to prevent runoff from entering excavation area

### Sediment Basin

- ✓ Note the basin depth. Is the basin more than 1/2 full of sediment from original design?
- ✓ Condition of basin side slopes
- ✓ Evidence of overtopping embankment
- ✓ Condition of outfall

### General Site Conditions

- Trash barrels-any evidence of trash lying around site
- Location of porta potties
- Leaking vehicles
- Concrete Washouts Designated



## Standard Operating Procedure

**SOP#: ID-1**

**Description:** Outfall Identification and Screening

**Purpose:** SOP to establish a uniform procedure for completing outfall identification and screening in accordance with Illicit Discharge Detection and Elimination Guidance Manual.

**Prepared By:** Chris Gann    **Approved By:** Brian Rosenbalm    **Effective Date:** 9/18/14

### References

1. Illicit Discharge Detection and Elimination Guidance Manual

### Personnel Qualifications

This SOP is written for Calhoun County staff responsible for implementing the Storm Water Management Program. Calhoun County staff performing the outfall identification and screening shall have an understanding of the methods, procedures, and protocols of identifying and screening outfalls in accordance with the Illicit Discharge Detection and Elimination Guidance Manual.

### Procedural Steps

1. Preparation
  - a. Identify outfalls scheduled for screening
  - b. Review maps (Highway, 7.5 Minute Quadrangle, GIS, etc.) to determine locations
  - c. Upload coordinates of each outfall into hand held GPS unit
2. Equipment Needed
  - a. ORI inspection forms
  - b. Clip board and pencil
  - c. Hand Held GPS unit
  - d. Camera

- e. Boots
- f. Gloves
- g. Waders
- h. Machete/bush ax
- i. Sample collection supplies
  - i. Sample bottles
  - ii. Extension pole
  - iii. Test strips
  - iv. Water chemistry kit
  - v. Latex gloves
- j. Maps
- k. Measuring equipment
  - i. Tape
  - ii. Measuring wheel
  - iii. Stopwatch
- l. Hand sanitizer
- m. First aid kit
- 3. Determine when to conduct field screening
  - a. During dry season
  - b. After a dry period of at least 72 hours
  - c. Identify field crew
  - d. Drive to outfall location
- 4. Outfall Screening – Complete ORI Form
  - a. Background data
  - b. Outfall description
    - i. Type
    - ii. Material
    - iii. Shape
    - iv. Dimensions
    - v. Presence of flow
  - c. Quantitative Characterization (for flowing outfalls only)
    - i. Flow
    - ii. Temperature
    - iii. pH



## Standard Operating Procedure

SOP#: ID-2

**Description:** Construction Site Identification and Screening

**Purpose:** SOP to establish a uniform procedure for completing construction site identification in accordance with Alabama Handbook for Erosion Control, Sediment Control, and Stormwater Management on Construction Sites and Urban Areas

**Prepared By:** Chris Gann    **Approved By:** Brian Rosenbalm    **Effective Date:** 9/18/14

### References

Alabama Handbook for Erosion Control, Sediment Control, and Stormwater Management on Construction Sites and Urban Areas

### Personnel Qualifications

This SOP is written for Calhoun County staff responsible for implementing the Storm Water Management Program. Calhoun County staff performing the construction site identification and screening shall have an understanding of the methods, procedures, and protocols of identifying and screening outfalls in accordance with the Alabama Handbook for Erosion Control, Sediment Control, and Stormwater Management on Construction Sites.

### Procedural Steps

1. Preparation
  - a. Identify suspect construction site
  - b. Use nearby street signs and mile markers to identify location of site.
  - c. Use hand held GPS to make note of coordinates.
2. Equipment Needed
  - a. Clip board and pencil
  - b. Hand held GPS unit

## Calhoun County SWMP Plan

---

- c. Camera
- d. Maps
- e. Measuring equipment
- 3. Take Pictures of suspect site
  - a. Do Not Enter Site
  - b. Take pictures of NPDES permit if in sight
  - c. Make note if, note
  - d. Take pictures/note of any suspected violation
- 4. Note all BMP's in use
- 5. Submit ADEM Complaint Form online
  - a. <http://app.adem.alabama.gov/complaints/submission.aspx>
  - b. Include permit number, location, pictures, and notes on complaint submission
- 6. Post Field Work Activities
  - a. Download pictures
  - b. Make file for Construction Site
  - c. Insert all notes and pictures into file



## ***Alabama Low Impact Development Handbook***

Low impact development (LID) minimizes stormwater runoff through natural resource based site design, planning to minimize footprint of disturbance, and using natural processes such as infiltration, evapotranspiration (evaporation and transpiration from plants), and storage of stormwater at multiple fine scale locations to be as near to the source of stormwater as possible.

Successful implementation of LID recreates a more natural hydrologic cycle in a developed watershed, decreases polluted stormwater runoff, improves local stream health, and promotes sustainable communities that integrate ecology, economy, and societal benefits.

***\* April 9-10, 2014 \* Alabama LID Summit \****  
***[\(click here for presentations & resources\)](#)***



*Plan view, constructed stormwater wetland*

### ***How to Use This Handbook***

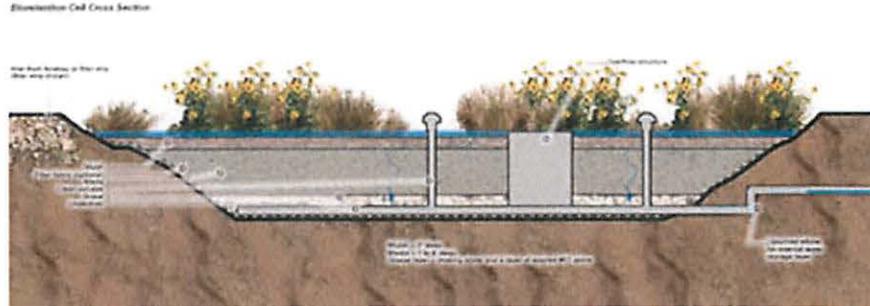
The Alabama LID Handbook is a resource that provides recommendations for professionals seeking to plan, design, construct, plant, and maintain stormwater control measures (SCM).

To offer a complete guide for successful implementation of LID practices, supporting chapters on community planning, site selection, maintenance, vegetation, and stormwater hydrology are included.

Each SCM chapter has the following sections to assist the reader in understanding, selecting, and implementing the most appropriate practice for the watershed characteristics:

1. Synonyms: Identify other names associated with the practice.
2. Introduction: Brief description of the SCM
3. Site selection table: Quick look at site characteristics to consider
4. General significance table: Quick reference for construction costs, maintenance, community acceptance, habitat, and sunlight requirement (compared among practices)
5. Site selection: In-depth look at site selection including soils, water table, and drainage area
6. Design: Description of components in each practice, design guidance, and a design example
7. Construction: Recommendations for construction activities, sequencing, and plant installation

- 8. Vegetation: Information on species selection, design recommendations, and design example
- 9. Maintenance: Routine maintenance tasks and schedule
- 10. Pollutant removal: Research based estimates of pollutant load removal
- 11. References: List of sources used in developing chapter components



Cross section, bioretention cell internal water storage

U.S. DEPARTMENT OF AGRICULTURE  
Natural Resources Conservation Service

AL-ENG-24  
January 2004

WATERSHED STRUCTURE INSPECTION REPORT

Date of Inspection: 6/14/2010                      5 Year( )                      ANNUAL ( x )  
 County: Calhoun                                      Watershed: Choccolocco 9 Cobb                      Site: 9  
 Field Office: Anniston                              Sponsor Responsible for O&M: Calhoun County Commission  
 Location: Latitude: 165 062 4050/ 33' 40' 39"                      N                      Longitude: 3727200/ 85 39' 42.3"                      W  
 Hazard Classification: A  
 (Most recent AL-ENG-23)

**COPY**

"YES" responses need explanation added to "Remarks" section. (i.e.: What? Where? Extent?)  
 "NO" responses indicate problems not observed during inspection.  
 Non applicable items should be noted by NA.

ITEM	YES	NO	REMARKS
<b>1. General Conditions</b>			
a. Alterations to dam?		X	
b. Development in downstream floodplain?		X	
c. Development around reservoir?		X	
<b>2. Embankment</b>			
a. Is vegetative cover inadequate?		X	
b. Are trees growing on either slope?		X	
c. Is brush/week control needed?		X	
d. Are trees growing at waterline?		X	
e. Is drift debris present?		X	
f. Are cracks, settlement, or bulges present?		X	
g. Is seepage visible on downstream slope?		X	
h. Are animal burrows present?		X	
i. Are trails present?		X	
<b>3. Front Slope Protection</b>			
a. Any wave damage observed?		X	
b. Is riprap inadequate?		X	
c. Are rodent holes present?		X	
<b>4. Inlet Structure and Gate Valves</b>			
a. Does concrete exhibit deterioration?		X	
b. Is concrete reinforcement exposed?		X	
c. Was leakage observed inside inlet?		X	Not Checked
ITEM	YES	NO	REMARKS
d. Any corrosion of metal appurtenances?		X	
e. Is debris guard obstructed?		X	
f. Is debris guard corroded?		X	

2014 Calhoun County Storm Water Management Report

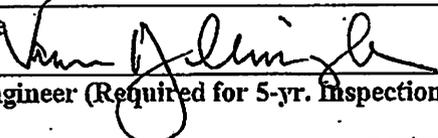
g. Is gate stem broken or bent?		X	
h. Are components missing?		X	
i. Was gate determined not operational?			Not Checked
j. Has inlet been modified to alter water surface?		X	
k. Is there structural movement?		X	
l. Is access door missing?		X	
m. Is wildlife gate/cool water release non-functional?			N/A
<b>5. Principal Spillway Conduit</b>			
a. Is concrete conduit deteriorated?		X	
b. Is metal conduit corroded?		X	
c. Was leakage observed at pipe joints?		X	Not Checked
d. Was pipe inspected internally?		X	
<b>6. Auxiliary Spillway</b>			
a. Is vegetative cover inadequate?		X	
b. Any animal trails observed?	X		One cattle trail-no problem
c. Any vehicular trails observed?	X		Farm road
d. Is flow area obstructed?		X	
e. Is control section disturbed?		X	
<b>7. Principal Spillway Release Channelx</b>			
a. Does scour hole appear unstable?		X	
b. Any boils observed?		X	
c. Is riprap inadequate?		X	
d. Any seepage observed?		X	
e. Is conduit outlet submerged?		X	
f. Is conduit outlet not properly supported?		X	
g. Is outlet channel obstructed?		X	
h. Is outlet channel degrading?		X	
i. Is foundation drain submerged?		X	
j. Is foundation drain rodent barrier missing?		X	
k. Is foundation drain not functional?		X	Check for mineral buildup
<b>8. Perimeter Fence</b>			
a. Is fence inadequate?			N/A
b. Are gates open?			N/A
<b>9. Reservoir Area</b>			
a. Is pool at different level than designed?		X	
b. Does pool area have downed trees/debris?		X	
c. Is sediment deposition excessive?		X	
<b>ACTIONS TAKEN:</b> Identify all work performed in the preceding 12 months by sponsors and/or NRCS, including approximate cost and date completed.			
<b>ACTIONS NEEDED:</b> Identify items by priority: low (next 12 months); high (as soon as possible). Indicate date assistance requested; technical or financial.			
Low= clean foundation drains of mineral deposits			

2014 Calhoun County Storm Water Management Report

**ADDITIONAL COMMENTS:**

Monitor vegetation on dam and aux. sw for too close of grazing

Sponsor Representative



NRCS Representative

State Conservations Engineer (Required for 5-yr. Inspection)

DISTRIBUTION: Original- State Conservation Engineer (with documentary photos and surveys)  
Copies- Sponsor or Owner, Field Office, Responsible Resource Engineer,  
ASTC-FO Team Office, and Watershed Structure Improvement (WSI)  
Coordinator (Coosa Valley RC&D)

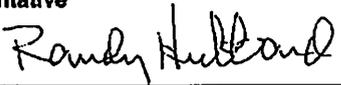
WATERSHED STRUCTURE INSPECTION REPORT

Date of Inspection: 05/07/2014 5 Year (  ) ANNUAL (  )  
 County: Calhoun Watershed: Choccolocco 2 Greenleaf Site 2  
 Field Office: Anniston Sponsor Responsible for O&M Calhoun County  
 Location: Latitude 33.4903 N Longitude 85.3746 W  
 Hazard Classification: B Is Hazard Classification still accurate? Y (  ) N (  )  
 (Most recent AL-ENG-23) If no, complete new AL-ENG-23.

"YES" responses need explanation added to "Remarks" section. (i.e.: What? Where? Extent?)  
 "NO" responses indicate problems not observed during inspection.  
 Non-applicable items should be noted by NA.

ITEM	YES	NO	REMARKS
<b>1. General Conditions</b>			
a. Alterations to dam?		<input checked="" type="checkbox"/>	
b. Development in downstream floodplain?		<input checked="" type="checkbox"/>	
c. Development around reservoir?		<input checked="" type="checkbox"/>	
<b>2. Embankment</b>			
a. Is vegetative cover inadequate?		<input checked="" type="checkbox"/>	
b. Are trees growing on either slope?		<input checked="" type="checkbox"/>	
c. Is brush/weed control needed?		<input checked="" type="checkbox"/>	
d. Are trees growing at waterline?	<input checked="" type="checkbox"/>		Small Willows
e. Is drift debris present?	<input checked="" type="checkbox"/>		Removed
f. Are cracks, settlement, or bulges present?		<input checked="" type="checkbox"/>	
g. Is seepage visible on downstream slope?		<input checked="" type="checkbox"/>	
h. Are animal burrows present?		<input checked="" type="checkbox"/>	
i. Are trails present?		<input checked="" type="checkbox"/>	
<b>3. Front Slope Protection</b>			
a. Any wave damage observed?		<input checked="" type="checkbox"/>	
b. Is riprap inadequate?		<input checked="" type="checkbox"/>	
c. Are rodent holes present?		<input checked="" type="checkbox"/>	
<b>4. Inlet Structure and Gate Valves</b>			
a. Does concrete exhibit deterioration?		<input checked="" type="checkbox"/>	
b. Is concrete reinforcement exposed?		<input checked="" type="checkbox"/>	
c. Was leakage observed inside inlet?			Not Checked
d. Any corrosion of metal appurtenances?		<input checked="" type="checkbox"/>	
e. Is debris guard obstructed?	<input checked="" type="checkbox"/>		Removed
f. Is debris guard corroded?		<input checked="" type="checkbox"/>	
g. Is gate stem broken or bent?		<input checked="" type="checkbox"/>	
h. Are components missing?		<input checked="" type="checkbox"/>	
i. Was gate determined not operational?			Date gate last operated: Unknown
j. Has inlet been modified to alter water surface?		<input checked="" type="checkbox"/>	
k. Is there structural movement?		<input checked="" type="checkbox"/>	
l. Is access door missing?		<input checked="" type="checkbox"/>	
m. Is wildlife gate/cool water release non-functional?			N/A
<b>5. Principal Spillway Conduit</b>			
a. Is concrete conduit deteriorated?		<input checked="" type="checkbox"/>	
b. Is metal conduit corroded?		<input checked="" type="checkbox"/>	
c. Was leakage observed at pipe joints?			Not Checked
d. Was pipe inspected internally?		<input checked="" type="checkbox"/>	

2014 Calhoun County Storm Water Management Report

ITEM	YES	NO	REMARKS
<b>6. Auxiliary Spillway</b>			
a. Is vegetative cover inadequate?		✓	
b. Any animal trails observed?		✓	
c. Any vehicular trails observed?		✓	
d. Is flow area obstructed?		✓	
e. Is control section disturbed?		✓	
<b>7. Principal Spillway Release Channel</b>			
a. Does scour hole appear unstable?		✓	
b. Any boils observed?		✓	
c. Is riprap inadequate?		✓	
d. Any seepage observed?		✓	
e. Is conduit outlet submerged?		✓	
f. Is conduit outlet not properly supported?		✓	
g. Is outlet channel obstructed?		✓	
h. Is outlet channel degrading?		✓	
i. Is foundation drain submerged?		✓	
j. Is foundation drain rodent barrier missing?		✓	
k. Is foundation drain not functional?		✓	
<b>8. Perimeter Fence</b>			
a. Is fence inadequate?			N/A
b. Are gates open?			N/A
<b>9. Reservoir Area</b>			
a. Is pool at different level than designed?		✓	
b. Does pool area have downed trees/debris?		✓	
c. Is sediment deposition excessive?		✓	
<b>ACTIONS TAKEN:</b> Identify all work performed in the preceding 12 months by sponsors and/or NRCS, including approximate cost and date completed.			
Sprayed Herbicide on spillway riprap 5/7/2014			
<b>ACTIONS NEEDED:</b> Identify items by priority: low (next 12 months); high (as soon as possible). Indicate date assistance requested; technical or financial.			
<b>O&amp;M Non-Compliance Issues (Check each issue that has not been addressed since last inspection):</b>			
( ) 1. Human Safety (such as missing access cover(s)). ( ) 2. Trash rack or parts of trash rack missing. ( ) 3. Trash rack debris blockage. ( ) 4. Principal spillway clogged. ( ) 5. Severe erosion of principal spillway outlet. ( ) 6. Auxiliary spillway without complete dense permanent vegetative cover in the control or exit sections (lack of vegetation or irregularity such as a road in the control or exit section).		( ) 7. Auxiliary spillway blockage (usually fence or trees in spillway). ( ) 8. Severe woody vegetative growth on principal spillway outlet or along permanent pool of dam. ( ) 9. Drain pipe problems. ( ) 10. Severe embankment erosion. ( ) 11. Flood pool storage alteration. ( ) 12. Severe tailwater issues.	
<b>Sponsor Representative</b> 		<b>NRCS Representative</b>	
<b>State Conservations Engineer (Required for 5-Yr. Inspection)</b>			

**DISTRIBUTION:** Original - State Conservation Engineer (with documentary photos and surveys)  
 Copies - Sponsor or Owner, Field Office, Responsible Resource Engineer, ASTC-FO Team Office, and Watershed Structure Improvement (WSI) Coordinator (Coosa Valley RC&D)

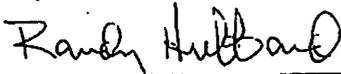
WATERSHED STRUCTURE INSPECTION REPORT

Date of Inspection: 05/06/2014 5 Year () ANNUAL ()  
 County: Calhoun Watershed: TERRAPIN CREEK Site 9  
 Field Office: Anniston Sponsor Responsible for O&M Caluon County  
 Location: Latitude 33.5680 N Longitude 85.3327 W  
 Hazard Classification: b Is Hazard Classification still accurate? Y (✓) N ( )  
 (Most recent AL-ENG-23) If no, complete new AL-ENG-23.

"YES" responses need explanation added to "Remarks" section. (i.e.: What? Where? Extent?)  
 "NO" responses indicate problems not observed during inspection.  
 Non-applicable items should be noted by NA.

ITEM	YES	NO	REMARKS
<b>1. General Conditions</b>			
a. Alterations to dam?		✓	
b. Development in downstream floodplain?		✓	
c. Development around reservoir?		✓	
<b>2. Embankment</b>			
a. Is vegetative cover inadequate?		✓	
b. Are trees growing on either slope?		✓	
c. Is brush/weed control needed?		✓	
d. Are trees growing at waterline?		✓	
e. Is drift debris present?		✓	
f. Are cracks, settlement, or bulges present?		✓	
g. Is seepage visible on downstream slope?		✓	
h. Are animal burrows present?		✓	
i. Are trails present?		✓	
<b>3. Front Slope Protection</b>			
a. Any wave damage observed?		✓	
b. Is riprap inadequate?			N/A
c. Are rodent holes present?		✓	
<b>4. Inlet Structure and Gate Valves</b>			
a. Does concrete exhibit deterioration?		✓	
b. Is concrete reinforcement exposed?		✓	
c. Was leakage observed inside Inlet?			Not Checked
d. Any corrosion of metal appurtenances?		✓	
e. Is debris guard obstructed?		✓	
f. Is debris guard corroded?		✓	
g. Is gate stem broken or bent?		✓	
h. Are components missing?		✓	
i. Was gate determined not operational?			Date gate last operated: <u>Unknown</u>
j. Has inlet been modified to alter water surface?		✓	
k. Is there structural movement?		✓	
l. Is access door missing?		✓	
m. Is wildlife gate/cool water release non-functional?			N/A
<b>5. Principal Spillway Conduit</b>			
a. Is concrete conduit deteriorated?		✓	
b. Is metal conduit corroded?		✓	
c. Was leakage observed at pipe joints?			Not Checked
d. Was pipe inspected internally?		✓	

2014 Calhoun County Storm Water Management Report

ITEM	YES	NO	REMARKS
<b>6. Auxiliary Spillway</b>			
a. Is vegetative cover inadequate?		✓	
b. Any animal trails observed?		✓	
c. Any vehicular trails observed?	✓		Farm Road Not a Problem
d. Is flow area obstructed?		✓	
e. Is control section disturbed?		✓	
<b>7. Principal Spillway Release Channel</b>			
a. Does scour hole appear unstable?		✓	
b. Any boils observed?		✓	
c. Is riprap inadequate?		✓	
d. Any seepage observed?		✓	
e. Is conduit outlet submerged?		✓	
f. Is conduit outlet not properly supported?		✓	
g. Is outlet channel obstructed?		✓	
h. Is outlet channel degrading?		✓	
i. Is foundation drain submerged?		✓	
j. Is foundation drain rodent barrier missing?		✓	
k. Is foundation drain not functional?		✓	
<b>8. Perimeter Fence</b>			
a. Is fence inadequate?			N/A
b. Are gates open?			N/A
<b>9. Reservoir Area</b>			
a. Is pool at different level than designed?		✓	
b. Does pool area have downed trees/debris?		✓	
c. Is sediment deposition excessive?		✓	
<b>ACTIONS TAKEN:</b> Identify all work performed in the preceding 12 months by sponsors and/or NRCS, including approximate cost and date completed.			
Sprayed Herbicide on spillway riprap 5/6/2014			
<b>ACTIONS NEEDED:</b> Identify items by priority: low (next 12 months); high (as soon as possible). Indicate date assistance requested; technical or financial.			
<b>O&amp;M Non-Compliance Issues (Check each issue that has not been addressed since last inspection):</b>			
( ) 1. Human Safety (such as missing access cover(s). ( ) 2. Trash rack or parts of trash rack missing. ( ) 3. Trash rack debris blockage. ( ) 4. Principal spillway clogged. ( ) 5. Severe erosion of principal spillway outlet. ( ) 6. Auxiliary spillway without complete dense permanent vegetative cover in the control or exit sections (lack of vegetation or irregularity such as a road in the control or exit section).	( ) 7. Auxiliary spillway blockage (usually fence or trees in spillway). ( ) 8. Severe woody vegetative growth on principal spillway outlet or along permanent pool of dam. ( ) 9. Drain pipe problems. ( ) 10. Severe embankment erosion. ( ) 11. Flood pool storage alteration. ( ) 12. Severe tailwater issues.		
<b>Sponsor Representative</b> 		<b>NRCS Representative</b>	
<b>State Conservations Engineer (Required for 5-Yr. Inspection)</b>			

DISTRIBUTION: Original - State Conservation Engineer (with documentary photos and surveys)  
Copies - Sponsor or Owner, Field Office, Responsible Resource Engineer, ASTC-FO Team Office, and Watershed Structure Improvement (WSI) Coordinator (Coosa Valley RC&D)

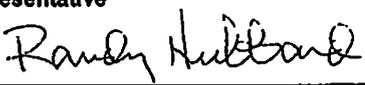
WATERSHED STRUCTURE INSPECTION REPORT

Date of Inspection: 05/08/2014 5 Year () ANNUAL ()  
 County: Calhoun Watershed: Choccolocco 3 Site 3  
 Field Office: Anniston Sponsor Responsible for O&M Calhoun County  
 Location: Latitude 33.4749 N Longitude 85.3841 W  
 Hazard Classification: B Is Hazard Classification still accurate? Y (✓) N ( )  
 (Most recent AL-ENG-23) If no, complete new AL-ENG-23.

"YES" responses need explanation added to "Remarks" section. (i.e.: What? Where? Extent?)  
 "NO" responses indicate problems not observed during inspection.  
 Non-applicable items should be noted by NA.

ITEM	YES	NO	REMARKS
<b>1. General Conditions</b>			
a. Alterations to dam?		✓	
b. Development in downstream floodplain?		✓	
c. Development around reservoir?		✓	
<b>2. Embankment</b>			
a. Is vegetative cover inadequate?		✓	
b. Are trees growing on either slope?		✓	
c. Is brush/weed control needed?		✓	
d. Are trees growing at waterline?		✓	
e. Is drift debris present?		✓	
f. Are cracks, settlement, or bulges present?		✓	
g. Is seepage visible on downstream slope?		✓	
h. Are animal burrows present?		✓	
i. Are trails present?	✓		Cattle Trails
<b>3. Front Slope Protection</b>			
a. Any wave damage observed?		✓	
b. Is riprap inadequate?		✓	
c. Are rodent holes present?		✓	
<b>4. Inlet Structure and Gate Valves</b>			
a. Does concrete exhibit deterioration?		✓	
b. Is concrete reinforcement exposed?		✓	
c. Was leakage observed inside inlet?			Not Checked
d. Any corrosion of metal appurtenances?		✓	
e. Is debris guard obstructed?		✓	
f. Is debris guard corroded?		✓	
g. Is gate stem broken or bent?		✓	
h. Are components missing?		✓	
i. Was gate determined not operational?			Date gate last operated: Unknown
j. Has inlet been modified to alter water surface?		✓	
k. Is there structural movement?		✓	
l. Is access door missing?		✓	
m. Is wildlife gate/cool water release non-functional?			N/A
<b>5. Principal Spillway Conduit</b>			
a. Is concrete conduit deteriorated?		✓	
b. Is metal conduit corroded?		✓	
c. Was leakage observed at pipe joints?			Not Checked
d. Was pipe inspected internally?		✓	

2014 Calhoun County Storm Water Management Report

ITEM	YES	NO	REMARKS
<b>6. Auxillary Spillway</b>			
a. Is vegetative cover inadequate?		✓	
b. Any animal trails observed?	✓		Cattle Trails
c. Any vehicular trails observed?		✓	
d. Is flow area obstructed?		✓	
e. Is control section disturbed?		✓	
<b>7. Principal Spillway Release Channel</b>			
a. Does scour hole appear unstable?		✓	
b. Any boils observed?		✓	
c. Is riprap inadequate?		✓	
d. Any seepage observed?		✓	
e. Is conduit outlet submerged?		✓	
f. Is conduit outlet not properly supported?		✓	
g. Is outlet channel obstructed?		✓	
h. Is outlet channel degrading?		✓	
i. Is foundation drain submerged?		✓	
j. Is foundation drain rodent barrier missing?		✓	
k. Is foundation drain not functional?		✓	
<b>8. Perimeter Fence</b>			
a. Is fence inadequate?	✓		
b. Are gates open?	✓		
<b>9. Reservoir Area</b>			
a. Is pool at different level than designed?		✓	
b. Does pool area have downed trees/debris?		✓	
c. Is sediment deposition excessive?		✓	
<b>ACTIONS TAKEN:</b> Identify all work performed in the preceding 12 months by sponsors and/or NRCS, including approximate cost and date completed.			
<b>ACTIONS NEEDED:</b> Identify items by priority: low (next 12 months); high (as soon as possible). Indicate date assistance requested; technical or financial.			
<b>O&amp;M Non-Compliance Issues (Check each issue that has not been addressed since last inspection):</b>			
( ) 1. Human Safety (such as missing access cover(s)). ( ) 2. Trash rack or parts of trash rack missing. ( ) 3. Trash rack debris blockage. ( ) 4. Principal spillway clogged. ( ) 5. Severe erosion of principal spillway outlet. ( ) 6. Auxillary spillway without complete dense permanent vegetative cover in the control or exit sections (lack of vegetation or irregularity such as a road in the control or exit section).		( ) 7. Auxillary spillway blockage (usually fence or trees in spillway). ( ) 8. Severe woody vegetative growth on principal spillway outlet or along permanent pool of dam. ( ) 9. Drain pipe problems. ( ) 10. Severe embankment erosion. ( ) 11. Flood pool storage alteration. ( ) 12. Severe tailwater issues.	
<b>Sponsor Representative</b>		<b>NRCS Representative</b>	
			
<b>State Conservations Engineer (Required for 5-Yr. Inspection)</b>			

DISTRIBUTION: Original - State Conservation Engineer (with documentary photos and surveys)  
 Copies - Sponsor or Owner, Field Office, Responsible Resource Engineer, ASTC-FO Team Office, and Watershed Structure Improvement (WSI) Coordinator (Coosa Valley RC&D)

### Crew Safety Meeting

10-9-14

Eric Feemster Safety Committee Chairman

The following items were discussed at today's meeting:  
After accident procedure, MS4 overview (Michael Hosch)

1. Scott Barn
2. Aaron Kelley
3. Juan #223
4. Joseph C. Elroy
5. Tony Stone
6. Kelly Ward
7. Eric Mubbs
8. Donald Dauter
9. Robert Little
10. Kenneth Smith
11. Walter D. Dwyer
12. Myers
13. Eric D. Little
14. \_\_\_\_\_
15. \_\_\_\_\_
16. \_\_\_\_\_
17. \_\_\_\_\_
18. \_\_\_\_\_
19. \_\_\_\_\_
20. Patrick O'Malley

## Crew Safety Meeting

10-9-14

Eric Feemster Safety Committee Chairman

The following items were discussed at today's meeting:

After accident procedure, MS4 overview (Michael Hosch)

1. Just Beach
2. John Clay
3. Wayne Sexton
4. Derek Kiser
5. Paul Wenzel
6. Michael Hosch
7. Jonathan Roebuck
8. Walter Blanton
9. Franklin Stein
10. Carl Smith
11. John Smith
12. Robert F. Smith
13. St. Williams #244
14. \_\_\_\_\_
15. \_\_\_\_\_
16. \_\_\_\_\_
17. \_\_\_\_\_
18. \_\_\_\_\_
19. \_\_\_\_\_
20. \_\_\_\_\_

## Crew Safety Meeting

10-9-14

Eric Feemster Safety Committee Chairman

The following items were discussed at today's meeting:

After accident procedure, MS4 overview (Michael Hosch)

1. MICHAEL HOSCH

2. Edmond Moore

3. Jonathan Roberts

4. John Bodey

5. Michael Kison

6. David L. Orr

7. Wendell Chausch

8. Ronnie Brown

9. Paul Jan

10. James Lee

11. [Signature]

12. BRIAN ROSENHALM

13. \_\_\_\_\_

14. \_\_\_\_\_

15. \_\_\_\_\_

16. \_\_\_\_\_

17. \_\_\_\_\_

18. \_\_\_\_\_

19. \_\_\_\_\_

20. \_\_\_\_\_

### Crew Safety Meeting

10-9-14

Eric Feemster Safety Committee Chairman

The following items were discussed at today's meeting:

After accident procedure, MS4 overview (Michael Hosch)

1. Posner, Meghan
2. Jerry Whitman
3. Richard Dury
4. Jahonnie Stoker
5. W. Lamar Murray
6. Donald Cook
7. Todd Covert
8. Randy Whitland
9. \_\_\_\_\_
10. \_\_\_\_\_
11. \_\_\_\_\_
12. \_\_\_\_\_
13. \_\_\_\_\_
14. \_\_\_\_\_
15. \_\_\_\_\_
16. \_\_\_\_\_
17. \_\_\_\_\_
18. \_\_\_\_\_
19. \_\_\_\_\_
20. \_\_\_\_\_

### Crew Safety Meeting

10-9-14

Eric Feemster Safety Committee Chairman

The following items were discussed at today's meeting:

After accident procedure, MS4 overview (Michael Hosch)

1. Monty Chason

2. Jim Buse

3. Keith Wilkins

4. Chuck Siler

5. Donald Larkford

6. Phillip Johnson

7. Greg Hugh

8. \_\_\_\_\_

9. \_\_\_\_\_

10. \_\_\_\_\_

11. \_\_\_\_\_

12. \_\_\_\_\_

13. \_\_\_\_\_

14. \_\_\_\_\_

15. \_\_\_\_\_

16. \_\_\_\_\_

17. \_\_\_\_\_

18. \_\_\_\_\_

19. \_\_\_\_\_

20. \_\_\_\_\_