

# **WATER EFFICIENCY RULE STAKEHOLDER COMMENTS**

**STAKEHOLDER MEETING #1**

**OCTOBER 22, 2014**

**CAVANAUGH SOLUTIONS**

**CHATSWORTH**

**CHEROKEE COUNTY**

**COBB COUNTY WATER SYSTEM**

**COBB-COUNTY MARIETTA WATER AUTHORITY**

**DAVID WORD**

**GEORGIA MUNICIPAL ASSOCIATION**

**GEORGIA POWER**

**GEORGIA WATER COALITION**

**GRIFFIN**

**GWINNETT COUNTY**

**HENRY COUNTY**

# CAVANAUGH SOLUTIONS

## Cash, Tim

---

**From:** Capp, James  
**Sent:** Friday, November 14, 2014 2:11 PM  
**To:** Welte, Jennifer; Cash, Tim; Champion, Becky  
**Subject:** Fwd: Comments on Chapter 391-3-33 Water Use Efficiency Rule  
**Attachments:** image001.png; ATT00001.htm; ATT00002.htm; EPD Comment Letter\_11-14-14.pdf; ATT00003.htm

Begin forwarded message:

**From:** Will Jernigan <[will.jernigan@cavanaughssolutions.com](mailto:will.jernigan@cavanaughssolutions.com)>  
**Date:** November 14, 2014 at 1:47:46 PM EST  
**To:** "Capp, James" <[James.Capp@dnr.state.ga.us](mailto:James.Capp@dnr.state.ga.us)>  
**Cc:** "Moeti, Lebone" <[Lebone.Moeti@dnr.state.ga.us](mailto:Lebone.Moeti@dnr.state.ga.us)>  
**Subject:** Comments on Chapter 391-3-33 Water Use Efficiency Rule

Jac,  
Please find attached our comments on the Chapter 391-3-33 Water Use Efficiency Rule.

Best regards,  
Will

November 14, 2014



James A. Capp, Chief  
Watershed Protection Branch, EPD  
2 Martin Luther King Jr. Drive, Ste 1152 East  
Atlanta, GA 30334

Re: Comments on Chapter 391-3-33 Water Use Efficiency Rule - Draft Stakeholder Version

Mr. Capp:

Please find below, comments on the Stakeholder Draft Rules for Water Use Efficiency, Chapter 391-3-33, submitted on behalf of Cavanaugh & Associates, PA.

1. We applaud Georgia EPD for not setting universal numeric targets for water loss. It is more appropriate for systems to set individualized goals, and we recommend keeping this important distinction in future drafts of this rule.
2. We applaud Georgia EPD for not using percentage values as performance indicators for systems. Because percentages can vary based on factors not related to water loss, we are encouraged that other performance indicators are recommended in the draft stakeholder rule. We recommend that Georgia EPD continue to not use percentages in future drafts of this rule.
3. It is important to note that generally, improvement in data validity (DV) to reflect the reliability of the audit is needed before performance indicators are meaningful.
4. In Section 391-3-33-.04 (4) (a)-4., we recommend revising to read "Economic Level of Leakage has been achieved and maintained."
5. The Georgia Water Loss Control Committee, a part of the Georgia Section of AWWA, is the best source of information, education and training on water loss auditing and control. They have assisted in producing and updating the Georgia Water Audit and Loss Control Manual, and also conduct annual training classes for water systems. Their subcommittee on benchmarking has been working since November 2013 to develop best practice guidance for water systems on how to use the audit to measure progress in the form of process and performance metrics. We recommend that Georgia EPD continue to work with this committee on water loss auditing and control in Georgia.

Thank you again for the opportunity to comment. If you wish to further discuss our comments, please feel free to contact me.

Best regards,  
Will Jernigan, PE

A handwritten signature in black ink, appearing to read "Will Jernigan". The signature is stylized and written in a cursive-like font.

Director of Water Efficiency – Cavanaugh  
Chair, Georgia Water Loss Control Committee  
Chair, AWWA Water Loss Control Committee – Software Subcommittee  
Vice Chair, Secretary – AWWA Water Loss Control Committee  
North American Regional Expert – IWA Water Loss Specialist Group

# CHATSWORTH

**Cash, Tim**

---

**From:** Heath Harrison <heathh@chatsworthwater.com>  
**Sent:** Friday, November 14, 2014 4:07 PM  
**To:** Cash, Tim  
**Cc:** 'Steve Smith'; 'Heath Harrison'  
**Subject:** Comments on the Water Use Efficiency Rule Stakeholder Draft  
**Attachments:** Georgia Rules for Water Use Efficiency Comments 111414HRH.pdf

Dear Tim,

Attached to this email is a copy of the draft rule with Chatsworth Water Works Commission comments in red.

Thank you for the opportunity to comment on this new rule.

Sincerely,  
Heath Harrison

***Heath Harrison, P.E.***  
***Chatsworth Water Works Commission***  
***Assistant General Manager of Engineering & Operations***  
***Phone: 706-695-3132 Ext: 229***  
***Email: [heathh@chatsworthwater.com](mailto:heathh@chatsworthwater.com)***

**Stakeholder Draft Only – Not An Official Draft**

**RULES OF THE GEORGIA DEPARTMENT OF NATURAL RESOURCES  
ENVIRONMENTAL PROTECTION DIVISION**

**Chapter 391-3-33**

**Georgia Rules for Water Use Efficiency**

**391-3-33-.01 Purpose.** Please consider a name change, this title sounds like rules that apply to the customer usage not water production and distribution.

The purpose of the Georgia Water Stewardship Act of 2010 to carry out the purposes of adopting standards for public water systems to develop and improve the efficiency and effectiveness of water use. Georgia's Water Loss Audit Program started with public water systems serving at least 10,000 individuals conducting a water loss audit covering calendar year 2012, followed by public water systems serving at least 3,300 individuals conducting a water loss audit covering calendar year 2013.

**391-3-33-.02 Definitions.**

When used in this Chapter:

[Additional Definitions TBD]

(1) "Certified Water Loss Auditor" ability to conduct a validation assess

(2) "Public water system" means a consumption.

There is not currently a Certification program in place for this. Please consider removing the title Certified. After preparing the Audit for several years now the vast majority of utilities are familiar with the process and understand how to prepare the audit without having a "Certified" Auditor.

**391-3-33-.03 Water Loss Audit Program.**

(1) **Water Loss Audits.** Public water systems shall conduct an annual water loss audit in accordance with the International Water Association (IWA) and American Water Works Association (AWWA) methodology for water loss auditing as provided by the Division in the Georgia Water System Audits and Water Loss Control Manual and AWWA Water Audit Software.

(2) **Reporting.** By March 1 of each calendar year annual water loss audit results for the previous calendar year shall be submitted

(3) **Validation.** By March 1 of loss audit results for the previous be performed in conformance with Certified Water Loss Auditor.

(a) For audits due on March 1, 20

(b) For audits due on March 1, 20 of the annual water loss audit to

GAEPD with the help of GEFA chose to conduct Validation on all audits. Ga is the only state that we are aware of that has undertaken this process. Now that all the utilities are trained in how to prepare the audit, we believe this process is no longer necessary and should not be a requirement for all utilities. If this process is required, it is going to take resources and time away from the main focus of performing the audit, which is reducing "lost" water. This is especially true with small utilities like ours with limited resources.

**391-3-33-.04 Water Use Efficiency and Effectiveness Improvement.**

(1) **Water Loss Control Program.** Public water systems shall develop and conduct a water loss control program to investigate, assess, and implement efforts to improve water use efficiency. Water loss control programs may include, but are not limited to, the following:

(a) Leakage Management, including distribution system water leakage detection and repairs;

(b) Finished Water Meter Flow Verification;

**Stakeholder Draft Only – Not An Official Draft**

- (c) Customer Water Meter Testing and Calibration;
- (d) Billing System Business Process Evaluation;
- (e) Resource Allocation, including planned preventive maintenance;
- (f) Revenue Recovery Activities.

Please clarify how many of these individual programs will be required by EPD to satisfy the Demonstrable Progress Requirement of this rule.

**(2) Individualized Goals.** Each public water system shall establish individual goals to set measures of water use efficiency and to improve water use efficiency. These measures may include, but are not limited to:

- (a) Infrastructure Leakage Index;
- (b) Water Audit Data Validity Score;
- (c) Operational Basic Apparent Losses;
- (d) Operational Basic Real Losses; and
- (e) Economic Level of Leakage

We appreciate EPD understanding that each water system is different and not setting global/universal percentage or numeric goals for everyone like some states have done. Reducing water loss is not an easy task and is also very costly for utilities to do, especially in a struggling economy.

**(3) Reporting.** Public water systems shall submit a report of the goals and measurements used to document improvements made to water use efficiency. This report shall be included with the annual water loss audits.

**(4) Demonstrable Progress.**

Please clarify or provide an example of what type of report is required. In addition, please clarify how the report will be submitted since the audit is submitted electronically.

(a) Public water systems shall demonstrate Demonstrable Progress may be demonstrated through one or more of these measures:

1. Improvement in Infrastructure Leakage Index and Data Validity Score;
2. Improvement in Operational Basic Real Losses;
3. Improvement in Operational Basic Apparent Losses; and
4. Economic Level of Leakage has been achieved.

(b) Demonstrable Progress may be evaluated by the Division as part of the review of the following applications:

1. An application to renew a water withdrawal permit under the Georgia Groundwater Use Act of 1972, O.C.G.A. Section 12-5-90 et seq., or the Georgia Water Quality Control Act, O.C.G.A. Section 12-5-20 et seq.;
2. An application to modify an existing water withdrawal permit which includes an increase in the permitted water use under the Georgia Groundwater Use Act of 1972, O.C.G.A. Section 12-5-90 et seq., or the Georgia Water Quality Control Act, O.C.G.A. Section 12-5-20 et seq.;
3. An application to modify a water withdrawal permit issued to the public water system under the Georgia Groundwater Use Act of 1972, O.C.G.A. Section 12-5-90 et seq., or the Georgia Water Quality Control Act, O.C.G.A. Section 12-5-20 et seq.;

Please consider revising or removing this action item, a community that does not have the financial ability to meet a goal that was not set in the original water stewardship act may in fact cause water shortages to its customers because of EPD restricting its withdrawal permit. The original law was intended as a guideline not as a way to take punitive measures and create overbearing regulations.

(c) Failure to meet the goal by the Director

1. A reduction in the permitted water quantity for any water withdrawal permit issued to the public water system under the Georgia Groundwater Use Act of 1972, O.C.G.A. Section 12-5-90 et seq., or the Georgia Water Quality Control Act, O.C.G.A. Section 12-5-20 et seq.;
2. A denial of any application to modify any water withdrawal permit issued to the public water system under the Georgia Groundwater Use Act of 1972, O.C.G.A. Section 12-5-90 et seq., or the Georgia Water Quality Control Act, O.C.G.A. Section 12-5-20 et seq.; or



**Stakeholder Draft Only – Not An Official Draft**

3. A denial of any application to increase the number of permitted service connections issued to the public water system under the Georgia Safe Drinking Water Act of 1977, O.C.G.A. Section 12-5-170 et seq.

###

CHEROKEE COUNTY

**Cash, Tim**

---

**From:** Capp, James  
**Sent:** Friday, November 14, 2014 10:32 AM  
**To:** Cash, Tim; Champion, Becky; Welte, Jennifer  
**Subject:** FW: CCWSA comments on Stakeholder Draft Rules for Water Use Efficiency, Chapter 391-3-33  
**Attachments:** CCWSA Comments of Water Use Efficiency 11\_14\_2014.pdf; ATT00001.htm

FYI

---

**From:** David Kubala [<mailto:dkubala@earthlink.net>]  
**Sent:** Friday, November 14, 2014 10:23 AM  
**To:** Capp, James  
**Cc:** Turner, Jud; Pennington, Russ; Caldwell, Nap; Moeti, Lebone; Champion, Becky  
**Subject:** CCWSA comments on Stakeholder Draft Rules for Water Use Efficiency, Chapter 391-3-33

Mr. Capp:

The attached document contains Cherokee County Water & Sewerage Authority comments on the Stakeholder Draft Rules for Water Use Efficiency, Chapter 391-3-33. A hard copy is being mailed to you. Contact me if you have questions.

Best regards,

David

*David Kubala  
Environmental Affairs Manager  
Cherokee County W&SA  
PO Box 5000  
Canton, Georgia 30114  
Office: (770) 479-1813 ext.248*

# Cherokee County Water & Sewerage Authority

November 14, 2014

James A. Capp, Chief  
Watershed Protection Branch, EPD  
2 Martin Luther King Jr. Drive, Suite 1152 East  
Atlanta, GA 30334

RE: Stakeholder Draft Rules for Water Use Efficiency, Chapter 391-3-33

Mr. Capp:

We appreciate this opportunity to offer comments on the Stakeholder Draft Rules for Water Use Efficiency, Chapter 391-3-33.

Cherokee County Water & Sewerage Authority (CCWSA) supports the use of the AWWA Water Audit methodology by Georgia water systems as a means of self-examination by an individual water system to critically assess its efficiency and effectiveness in treating, delivering, measuring and customer billing for the drinking water in its service area (supply side). The AWWA Water Audit methodology yields no insight as to water use efficiency and effectiveness by customers of a water system, be they residential, governmental, commercial, industrial or other water users (demand side). “Georgia Rules for Water Use Efficiency” seems, therefore, a misnomer.

It is in the best interests of EPD and the public that water system personnel are, and are perceived to be, competent, and that the water loss audits they complete are accurate to the best of their knowledge. CCWSA believes that EPD can best foster water system personnel competency and water loss audit accuracy by providing the targeted training as directed by the Georgia Water Stewardship Act of 2010. CCWSA also believes EPD must provide written water loss audit validation criteria, that is to say the criteria being used by the third party experts with whom EPD has contracted to perform validity/accuracy assessments of past and current water loss audits, to those water systems required by the Act to do annual water loss audits. CCWSA presumes that EPD has carefully vetted the objective criteria by which these third party experts are verifying the accuracy and validity of water loss audits. CCWSA believes that the audit validation/accuracy assessment criteria will provide additional critical information not currently available in the Georgia Water System Audits and Water Loss Control Manual or in the AWWA Water Loss Audit software. Placed in the hands of water system personnel this additional information will enhance the ability of water system personnel to complete and submit accurate water loss audits. CCWSA does not support EPD’s creation of the “Certified Water Loss Auditor.”

CCWSA believes that the paragraph Stakeholder Draft Rules for Water Use Efficiency, Chapter 391-3-33-.03, (3) Validation should be deleted in its entirety. The rule should presume valid and accurate water loss audits are being submitted to EPD. EPD may

P.O. Box 5000 ~ Canton, Georgia 30114 ~ 770-479-1813

# Cherokee County Water & Sewerage Authority

question and/or require additional information if EPD staff notice obvious errors in a submitted water loss audit. CCWSA believes that water loss audit review by exception is the proper role of EPD as the regulatory agency, and is the appropriate requirement as part of the final Rules for Water Use Efficiency, Chapter 391-3-33.

In Section 391-3-33-.04 (1) Water Loss Control Program it is unclear as to whether a system must submit its water loss control plan to EPD, and if so, how often and in what form/format. Please clarify.

In Section 391-3-33-.04 (2) Individualized Goals and (3) Reporting please clarify that the water system is allowed to revise its goals annually. Please clarify that a system that has reached the "Economic Level of Leakage" will seek to maintain that level, but will not be required to specify goals for further (uneconomical) improvement.

In Section 391-3-33-.04 (4) Demonstrable Progress, (c) 1 indicates that failure to make demonstrable progress may result in "A reduction in the permitted water quantity for *any* (emphasis added) water withdrawal permit issued to the public water system under the Georgia Groundwater Use Act of 1972, O.C.G.A. Section 12-5-90 et seq., or the Georgia Water Quality Control Act, O.C.G.A. 12-5-20 et seq." Please clarify whether EPD's intent is as stated in this rule section, or whether EPD's intends this to only mean a reduction in additional capacity requested by a water system as presented in Section 391-3-33-.04 (4) Demonstrable Progress, (b) 2. CCWSA opposes the unprecedented draconian actions currently suggested by Section 391-3-33-.04 (4) Demonstrable Progress, (c) 1.

Thank you for the opportunity to comment on the Stakeholder Draft Rules for Water Use Efficiency, Chapter 391-3-33.

Sincerely,



David Kubala, Environmental Affairs Manager

CC: CCWSA Board of Directors  
Thomas A. Heard, General Manager

# COBB COUNTY WATER SYSTEM

## Cash, Tim

---

**From:** Nguyen, Kathy <Kathy.Nguyen@cobbcounty.org>  
**Sent:** Friday, November 14, 2014 7:47 AM  
**To:** Capp, James  
**Cc:** Champion, Becky; Cash, Tim; Moeti, Lebone  
**Subject:** Cobb's Comments  
**Attachments:** Cobb's Comments of Drought and Water Use efficiency.pdf

Mr. Capp,

Attached are Cobb's comments on the most recent strawmen dealing with drought and water use efficiency. Thank you in advance for your consideration of our comments.

Kathy Nguyen  
Senior Project Manager  
Cobb County Water System  
770-419-6244





## COBB COUNTY WATER SYSTEM

Stephen D. McCullers, P.E.  
Director

Customer Services Facility  
660 South Cobb Drive  
Marietta, Georgia 30060-3105  
770-423-1000  
www.cobbwater.org

*Divisions*  
Business Services  
Customer Services  
Engineering & Records  
Stormwater Management  
System Maintenance  
Water Protection

November 13, 2014

Mr. James Capp, Chief, Water Protection Branch  
Georgia Environmental Protection Division  
2 Martin Luther King Jr. Drive, Suite 1152 East  
Atlanta, GA 30334

Dear Mr. Capp:

Cobb County Water System is grateful to have an opportunity to review both the Drought and Water Use Efficiency Strawmen in advance of the rule making process. We appreciate Georgia Environmental Protection Division addressing stewardship of our water resources, which is a key issue for our state.

Having been actively involved in drought management, drafting of the stewardship bill, and having worked closely with EPD on educating Georgia utilities on water loss, we understand the importance of these activities in managing Georgia's resource both in times of adequate supply and shortage. We have provided comprehensive comments about the strawmen based upon our experience. We are happy to provide any clarification or discuss these comments in greater detail.

If you have any questions please feel free to contact us at 770-419-6338 or 770-419-6244.

Sincerely,

COBB COUNTY WATER SYSTEM

Stephen D. McCullers, P.E.

Director

Kathy Nguyen  
Senior Project Manager

CC: Judy Jones  
Tim Cash  
Becky Champion  
Nap Caldwell



**Cobb County Water System's Comments on the Draft Drought and Water Efficiency Rule Released  
10/3/14**

**Chapter 391-3-30 Drought Management**

Cobb County Water System appreciates Georgia EPD's acknowledgement of the stakeholders' feedback on the initial draft strawman and is very supportive of the significant changes made to the Drought Management Rule. We would recommend a few minor clarifications.

First, a general review of the document to ensure the accurate use of the terms "permitted water supplier" and "permittee". Not all actions in the drought management rule apply to industrial permittees, and the interchange of these terms is inconsistent in some parts of the document.

**391-3-30-.03 Pre-drought Mitigation Strategies**

In the stakeholder meeting, it was brought up that the new rule combined with the stewardship bill will completely replace all previous outdoor water use rules.

- (1) Only discusses outdoor water use for irrigation purposes. There needs to be some mention of other outdoor water uses (washing cars, hard surfaces, pool filling, etc.) The rule should spell out if there are no restrictions on these other uses in non-drought or if they are also subject to the hours in the stewardship bill of 4PM-10AM.

**391-3-30-.04**

- (2) This paragraph may just need clarification. State Law prohibits local utilities from putting their drought contingency plans into effect without a variance from EPD. The wording of this section could be clarified to say inform EPD when the triggers in your drought contingency plan are surpassed, and the language about drought plan being put into effect could be removed.

**391-3-30-.07 Drought Response Strategies**

(3)(b)5. This prohibition just needs to be clarified to say non-commercial.

(4)(b) May need to clarify that drip is exempt from the restrictions.

(4)(b)7. Remove certified and licensed from the description of landscaper and substitute professional landscapers.

A mandated reduction in usage is mentioned as a possible next step for drought response, but there is no mention of how this would be determined or what will be used to determine the baseline. CCWS would recommend using the Baseline Water Use and efficiency Report that has been successfully piloted by several Georgia utilities. It provides flexibility and consideration for systems that have invested in conservation and efficiency.

## Georgia Rules for Water Use Efficiency

Cobb County Water System (CCWS) supports the use of the AWWA Water Audit methodology in Georgia. CCWS has been completing the audit since 2005.

### 391-3-33-.02 Definitions

In the definition of "Certified Water Loss Auditor" it states "an individual with the demonstrated knowledge, skills and ability to conduct a validation assessment of water loss audit." There is no explanation of what qualifies someone as having demonstrated knowledge, skill, and ability. Who would make this decision? What criteria would be used? There are certainly no present requirements, training or otherwise, for this proposed position. Nor does the State Licensing Board recognize this position. Should the EPD wish to pursue this position, I would suggest they communicate and coordinate with the AWWA or IWA or the Association of Boards of Certification. This has been discussed within the ABC and may become a certification they would pursue in the future. Since the Water Loss Audit is national in scope, it would make sense that any certification associated with this audit also be national in scope. Also, there is no standardized validation assessment process.

In addition, water professionals equate "certified" to "licensed", as in Certified Operators. CCWS recommends revising the definition as follows:

"Qualified Water Loss Auditor" means an individual who has completed a basic water loss auditing course endorsed by EPD and who demonstrates the knowledge, skills and ability to perform water loss audits in accordance with the Georgia Water System Audit and Water Loss Control Manual.

### 391-3-33-.03

**Validation.** In this section, it states the validation should be performed in accordance with the Georgia Water System Audit and Water Loss Control Manual. The Certified Water Loss Auditor would be using the guidance in the same capacity as the person performing the audit. CCWS fails to see the need for this. Furthermore, in reviewing the stewardship bill as well as other legislation around the country associated with water loss auditing and reporting, CCWS can find no basis in statute or in similar legislation that would provide the justification for an independent entity to review every audit submitted by a Georgia water utility subject to the Stewardship Bill. The language in the bill is quite specific as to the scope of the rule.

*The Board of Natural Resources shall by January 1, 2011, adopt rules for the minimum standards and best practices for monitoring and improving the efficiency and effectiveness of water use by public water systems to improve water conservation. The best practices program shall include without limitation:*

- (1) Establishment of an Infrastructure Leakage Index;*
- (2) The establishment of categories of public water systems based on geographical size and service population;*
- (3) A phased-in-approach requiring public water systems to conduct standardized annual water loss audits according to International Water Association water audit method/standard and to submit those to the division;*

- (4) *A phased-in approach requiring public water systems to implement water loss detection programs; and*
- (5) *The development of technical assistance program to provide guidance to public water systems for water loss detection program, to include without limitation metering techniques, utilization of portable and permanent water loss detection devices, and funding when available.*

CCWS cannot find the requirement for a third party review of data within the 5 items delineated as comprising a best practice program. In fact the only requirement beyond turning in the audit referenced is the establishment of an ILI. The audit itself already has ILI thresholds and explains the desired threshold for a system based upon specific system criteria. The other aspects of the rule focus on establishing water loss control programs including guidance, assistance, training, and funding for those programs. CCWS agrees that the audit is an essential tool to making the correct investments in a water loss program. It is a utility specific tool. The utility should decide what staff participates, and they should utilize the available training and resources to make sure it is completed accurately. Additionally, it is clear in the law that it will be published on the EPD website and considered in permitting as delineated in the Stewardship Bill. The State has already made a substantial investment in training and has prepared a Georgia Water Loss Control Manual with best practices for completing the audit. In addition, the Georgia Water Loss Control Committee continues to provide training for new personnel or individuals wishing to gain more experience.

CCWS prefers for EPD enforce that utilities use trained staff and the guidance document, then review the audits and take further steps, if there appears to be gross errors or discrepancies. EPD has been receiving audits for a few years, and CCWS is certain that they have gained the knowledge to identify very significant problems. Also, Version 5 of the software now has a reporting sheet. This could provide a needed guide for EPD to review the data. A failure to complete the reporting worksheet could trigger a further review or validation. The new rule should require that the most current version of the AWWA Water Audit Software available be used. If further validation is needed, perhaps EPD could first work with the professional organizations GAWP, GAWWA, and GRWA to see if some kind of training or peer to peer review could be set up for audits that might need additional validation after EPD reviews them.

If EPD keeps the requirement for third party validation of the data in the rule, the language should be modified so that it is clear as to whether only the audits completed by utility staff require validation by a third party or whether all audits require validation. As currently written, it appears that if a utility hires a consultant to complete its audit, the utility would be required to hire a different third party to validate that audit. If that is the case, than some utilities would be paying double for their audit. If EPD's intent is to only have audits completed by utility staff validated, than it is disconcerting that EPD would implement a requirement that implies that, in general, the people in Georgia who provide safe drinking water to the public are not competent or are less competent than consultants.

In summary, CCWS is very concerned about the precedent that would be set by having a rule that requires third party review of a utility's data prior to submittal to EPD. Utilities currently submit quite a bit of data to EPD without a third party review. Requiring a third party review prior to submission of the data and with no quality review from the regulator, calls into question the integrity of all data submitted by the utility. CCWS recommends deleting the Validation paragraph in its entirety and adding the following sentence to the end of 391-3-33-.03 (1):

*"The audit shall be conducted by or validated by a Qualified Water Loss Auditor."*

EPD may want to add a certification to the audit similar to the language below, which is consistent with other certifications required by EPD, in order to ensure that utilities are doing their due diligence in completing the audit.

I certify under penalty of law that this audit was prepared under my direction or supervision in accordance with the Georgia Water System Audit and Water Loss Control Manual. Based 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.

#### **391-3-33-.04**

#### **(4) Demonstrable Progress**

CCWS is pleased to see there are no specific numeric targets. The emphasis on utility specific improvement plans is the correct approach to maximize the effectiveness of the water audits, in the development of effective water loss control programs. CCWS has no problem with the evaluative criteria on demonstrable progress, but, as it is currently written, it appears that there is an assumption that improvement in water loss is a linear progression. In fact, several factors can affect water loss, and CCWS recommends that a suite of process metrics be looked at in concert with the evaluative benchmarks. The utility could choose those most relevant based upon their audit.

For Example:

- A leak detection program, where 10-15% of the system is surveyed annually.
- A meter testing and calibration program for large meters. These meters should be tested at least every 2 years.
- Meter replacement program – meters should be replaced at least every 20 years.
- Production meter testing and calibration – tested with a minimum of inline meter testing. Followed by calibration
- Billing and business process review program
- Revenue enhancement program
- Leak repair prioritization policy

#### **(c) Failure to make demonstrable progress**

CCWS finds no statutory basis to reduce existing water quantity permits if adequate progress is not achieved. The refusal to increase permitted capacity or withdrawals is consistent with the State's Water Plan and the need for utilities to demonstrate stewardship, but the reduction of existing permits for a failure to demonstrate progress is an extreme consequence. Perhaps a better approach would be to issue an NOV and then require a progress report every quarter on the individual goals submitted with their audit.

# COBB-COUNTY MARIETTA WATER AUTHORITY

## Cash, Tim

---

**From:** Becky Mixon <bmixon@ccmwa.org>  
**Sent:** Friday, November 14, 2014 1:32 PM  
**To:** Capp, James  
**Cc:** Cash, Tim; Caldwell, Nap; Champion, Becky; Katherine Zitsch; theard@ccwsa.com  
**Subject:** Comments from CCMWA re Drought and Water Efficiency Rules  
**Attachments:** Comments re Drought and Water Efficiency Rule 11-14-2014.pdf

Mr. Capp,  
Attached are comments from CCMWA regarding the proposed Drought Management and Water Efficiency Rules. Thank you for the opportunity to comment.  
Sincerely,

*Becky Mixon*  
770-514-5208

*Cobb County-Marietta Water Authority*  
1170 Atlanta Industrial Drive  
Marietta, GA 30066

A. Max Bacon, Chair  
David A. Austin, Vice Chair  
Charlie N. Crowder, Secretary  
T. Daniel Buyers, Member



Griffin "Grif" L. Chalfant, Jr., Member  
Timothy D. Lee, Member  
James C. Scott, Jr., Member  
Glenn M. Page, P.E., General Manager

November 14, 2014

Mr. James A. Capp  
Chief, Water Protection Branch  
Georgia Environmental Protection Division  
2 Martin Luther King, Jr. Drive, Suite 1152 East Tower  
Atlanta, Georgia 30334

RE: Comments on Drought Management and Water Efficiently proposed rules

Dear Mr. Capp:

Cobb County-Marietta Water Authority (CCMWA) is appreciative of the opportunity to review and comment on both the Drought and Water Use Efficiency Strawman as drafted.

We have reviewed the comments provided by Cobb County Water System, and fully incorporate those into our comments (see attached).

As stated in our letter of August 19, 2014, because CCMWA is a wholesale-only water provider, we are regularly in a unique position in the application of State rules and regulations. Our contracts with our wholesale customers do not allow CCMWA to regulate water use of the end-users of our customers. Also, as previously stated, CCMWA has no physical means to limit supply to one customer without creating an unnecessary public health and safety risk to our entire system.

CCMWA concerns regarding the validation of the water loss audit by a "Certified Water Loss Auditor" are the same as those expressed in Cobb County Water System's comments. CCMWA prepares all reports submitted to EPD accurately and correctly, and believes that the requirement of having an outside review calls into question the utility's integrity.

Thank you again for the opportunity to comment on the Strawmen. We look forward to working with EPD to finalize and implement a drought management rule and a water efficiency rule that is both reasonable and effective.

Respectfully,

Robert L. Kenyon  
Director of Operations

cc: Nap Caldwell  
Tim Cash  
Becky Champion  
Thomas Heard  
Katherine Zitsch

**Cobb County Water System's Comments on the Draft Drought and Water Efficiency Rule Released  
10/3/14**

**Chapter 391-3-30 Drought Management**

Cobb County Water System appreciates Georgia EPD's acknowledgement of the stakeholders' feedback on the initial draft strawman and is very supportive of the significant changes made to the Drought Management Rule. We would recommend a few minor clarifications.

First, a general review of the document to ensure the accurate use of the terms "permitted water supplier" and "permittee". Not all actions in the drought management rule apply to industrial permittees, and the interchange of these terms is inconsistent in some parts of the document.

**391-3-30-.03 Pre-drought Mitigation Strategies**

In the stakeholder meeting, it was brought up that the new rule combined with the stewardship bill will completely replace all previous outdoor water use rules.

- (1) Only discusses outdoor water use for irrigation purposes. There needs to be some mention of other outdoor water uses (washing cars, hard surfaces, pool filling, etc.) The rule should spell out if there are no restrictions on these other uses in non-drought or if they are also subject to the hours in the stewardship bill of 4PM-10AM.

**391-3-30-.04**

- (2) This paragraph may just need clarification. State Law prohibits local utilities from putting their drought contingency plans into effect without a variance from EPD. The wording of this section could be clarified to say inform EPD when the triggers in your drought contingency plan are surpassed, and the language about drought plan being put into effect could be removed.

**391-3-30-.07 Drought Response Strategies**

(3)(b)5. This prohibition just needs to be clarified to say non-commercial.

(4)(b) May need to clarify that drip is exempt from the restrictions.

(4)(b)7. Remove certified and licensed from the description of landscaper and substitute professional landscapers.

A mandated reduction in usage is mentioned as a possible next step for drought response, but there is no mention of how this would be determined or what will be used to determine the baseline. CCWS would recommend using the Baseline Water Use and efficiency Report that has been successfully piloted by several Georgia utilities. It provides flexibility and consideration for systems that have invested in conservation and efficiency.



## Georgia Rules for Water Use Efficiency

Cobb County Water System (CCWS) supports the use of the AWWA Water Audit methodology in Georgia. CCWS has been completing the audit since 2005.

### 391-3-33-.02 Definitions

In the definition of "Certified Water Loss Auditor" it states "an individual with the demonstrated knowledge, skills and ability to conduct a validation assessment of water loss audit." There is no explanation of what qualifies someone as having demonstrated knowledge, skill, and ability. Who would make this decision? What criteria would be used? There are certainly no present requirements, training or otherwise, for this proposed position. Nor does the State Licensing Board recognize this position. Should the EPD wish to pursue this position, I would suggest they communicate and coordinate with the AWWA or IWA or the Association of Boards of Certification. This has been discussed within the ABC and may become a certification they would pursue in the future. Since the Water Loss Audit is national in scope, it would make sense that any certification associated with this audit also be national in scope. Also, there is no standardized validation assessment process.

In addition, water professionals equate "certified" to "licensed", as in Certified Operators. CCWS recommends revising the definition as follows:

"Qualified Water Loss Auditor" means an individual who has completed a basic water loss auditing course endorsed by EPD and who demonstrates the knowledge, skills and ability to perform water loss audits in accordance with the Georgia Water System Audit and Water Loss Control Manual.

### 391-3-33-.03

**Validation.** In this section, it states the validation should be performed in accordance with the Georgia Water System Audit and Water Loss Control Manual. The Certified Water Loss Auditor would be using the guidance in the same capacity as the person performing the audit. CCWS fails to see the need for this. Furthermore, in reviewing the stewardship bill as well as other legislation around the country associated with water loss auditing and reporting, CCWS can find no basis in statute or in similar legislation that would provide the justification for an independent entity to review every audit submitted by a Georgia water utility subject to the Stewardship Bill. The language in the bill is quite specific as to the scope of the rule.

*The Board of Natural Resources shall by January 1, 2011, adopt rules for the minimum standards and best practices for monitoring and improving the efficiency and effectiveness of water use by public water systems to improve water conservation. The best practices program shall include without limitation:*

- (1) Establishment of an Infrastructure Leakage Index;*
- (2) The establishment of categories of public water systems based on geographical size and service population;*
- (3) A phased-in-approach requiring public water systems to conduct standardized annual water loss audits according to International Water Association water audit method/standard and to submit those to the division;*

- (4) *A phased-in approach requiring public water systems to implement water loss detection programs; and*
- (5) *The development of technical assistance program to provide guidance to public water systems for water loss detection program, to include without limitation metering techniques, utilization of portable and permanent water loss detection devices, and funding when available.*

CCWS cannot find the requirement for a third party review of data within the 5 items delineated as comprising a best practice program. In fact the only requirement beyond turning in the audit referenced is the establishment of an ILI. The audit itself already has ILI thresholds and explains the desired threshold for a system based upon specific system criteria. The other aspects of the rule focus on establishing water loss control programs including guidance, assistance, training, and funding for those programs. CCWS agrees that the audit is an essential tool to making the correct investments in a water loss program. It is a utility specific tool. The utility should decide what staff participates, and they should utilize the available training and resources to make sure it is completed accurately. Additionally, it is clear in the law that it will be published on the EPD website and considered in permitting as delineated in the Stewardship Bill. The State has already made a substantial investment in training and has prepared a Georgia Water Loss Control Manual with best practices for completing the audit. In addition, the Georgia Water Loss Control Committee continues to provide training for new personnel or individuals wishing to gain more experience.

CCWS prefers for EPD enforce that utilities use trained staff and the guidance document, then review the audits and take further steps, if there appears to be gross errors or discrepancies. EPD has been receiving audits for a few years, and CCWS is certain that they have gained the knowledge to identify very significant problems. Also, Version 5 of the software now has a reporting sheet. This could provide a needed guide for EPD to review the data. A failure to complete the reporting worksheet could trigger a further review or validation. The new rule should require that the most current version of the AWWA Water Audit Software available be used. If further validation is needed, perhaps EPD could first work with the professional organizations GAWP, GAWWA, and GRWA to see if some kind of training or peer to peer review could be set up for audits that might need additional validation after EPD reviews them.

If EPD keeps the requirement for third party validation of the data in the rule, the language should be modified so that it is clear as to whether only the audits completed by utility staff require validation by a third party or whether all audits require validation. As currently written, it appears that if a utility hires a consultant to complete its audit, the utility would be required to hire a different third party to validate that audit. If that is the case, than some utilities would be paying double for their audit. If EPD's intent is to only have audits completed by utility staff validated, than it is disconcerting that EPD would implement a requirement that implies that, in general, the people in Georgia who provide safe drinking water to the public are not competent or are less competent than consultants.

In summary, CCWS is very concerned about the precedent that would be set by having a rule that requires third party review of a utility's data prior to submittal to EPD. Utilities currently submit quite a bit of data to EPD without a third party review. Requiring a third party review prior to submission of the data and with no quality review from the regulator, calls into question the integrity of all data submitted by the utility. CCWS recommends deleting the Validation paragraph in its entirety and adding the following sentence to the end of 391-3-33-.03 (1):

*"The audit shall be conducted by or validated by a Qualified Water Loss Auditor."*

EPD may want to add a certification to the audit similar to the language below, which is consistent with other certifications required by EPD, in order to ensure that utilities are doing their due diligence in completing the audit.

I certify under penalty of law that this audit was prepared under my direction or supervision in accordance with the Georgia Water System Audit and Water Loss Control Manual. Based 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.

#### **391-3-33-.04**

#### **(4) Demonstrable Progress**

CCWS is pleased to see there are no specific numeric targets. The emphasis on utility specific improvement plans is the correct approach to maximize the effectiveness of the water audits, in the development of effective water loss control programs. CCWS has no problem with the evaluative criteria on demonstrable progress, but, as it is currently written, it appears that there is an assumption that improvement in water loss is a linear progression. In fact, several factors can affect water loss, and CCWS recommends that a suite of process metrics be looked at in concert with the evaluative benchmarks. The utility could choose those most relevant based upon their audit.

For Example:

- A leak detection program, where 10-15% of the system is surveyed annually.
- A meter testing and calibration program for large meters. These meters should be tested at least every 2 years.
- Meter replacement program – meters should be replaced at least every 20 years.
- Production meter testing and calibration – tested with a minimum of inline meter testing. Followed by calibration
- Billing and business process review program
- Revenue enhancement program
- Leak repair prioritization policy

#### **(c) Failure to make demonstrable progress**

CCWS finds no statutory basis to reduce existing water quantity permits if adequate progress is not achieved. The refusal to increase permitted capacity or withdrawals is consistent with the State's Water Plan and the need for utilities to demonstrate stewardship, but the reduction of existing permits for a failure to demonstrate progress is an extreme consequence. Perhaps a better approach would be to issue an NOV and then require a progress report every quarter on the individual goals submitted with their audit.

DAVID WORD

## Cash, Tim

---

**From:** David Word <davidword@joetanner.com>  
**Sent:** Wednesday, November 05, 2014 1:58 PM  
**To:** Cash, Tim  
**Cc:** Capp, James  
**Subject:** Suggestion for the Rules for Drought Management and Suggestions for the Rules for Water Use Efficiency

Tim,

I suggest the following paragraph to be added to Section 391-3-30-.08 of the proposed rules for drought management:

*(e) A permittee who receives all or a portion of its water supply from storage in or releases from a project owned by the U.S. Army Corps of Engineers may request a variance proposing restrictions on outdoor water use that are more stringent than the restrictions prescribed in this rule. There shall be a rebuttable presumption that such a variance request be granted by the Director within five days of the request.*

I suggest the following revisions to the proposed rules for water use efficiency:

391-3-33-.02 (2) *"Public water system" means a system for the provision to the public of piped water for human consumption, if such system regularly serves at least 3,300 individuals.*

391-3-33-.03 (3) I suggest the validation process that is selected for this section of the rule have a start date of March 2017.

391-3-33-.04 (4) (b) . *Starting January 1, 2017, Demonstrable Progress may be evaluated by the Division as part of the review of the following applications: .....*

391-3-33-.04 (c) *Starting January 1, 2017, failure to make Demonstrable Progress toward improving water use efficiency may result in an action by the Director that may include one or more of the following:*

- 1. If an application is submitted to increase the amount of water withdrawal in an existing permit issued to a public water system under the Georgia Groundwater use Act of 1972, O.C.G.A. Section 12-5-90 et seq. or the Georgia Water Quality Control Act, O.C.G.A. Section 12-5-20 et seq., the Director may make a reduction in the requested water withdrawal increase or may deny the requested increase.*
- 2. If an application is submitted to increase the number of permitted service connections in an existing permit issued to a public water system under the Georgia Safe Drinking Water Act of 1977, O.C.G.A. Section 12-5-170 et seq., the Director may make a reduction in the number of the requested increased connections or may deny the requested increase.*

I realize you have solicited suggestions for the metrics for Demonstrable Progress and that the language of .04( c) above will implement such metrics.

Thank you for including me in the stakeholders process.

Dave

# GEORGIA MUNICIPAL ASSOCIATION

## Cash, Tim

---

**From:** Catherine Fleming <cfleming@gmanet.com>  
**Sent:** Thursday, November 13, 2014 4:11 PM  
**To:** Cash, Tim  
**Cc:** Thomas Q. Gehl  
**Subject:** Stakeholder Draft - Georgia Rules for Water Efficiency  
**Attachments:** Water Efficiency Rule - GMA comments.pdf

Tim,

Please find attached comments from GMA on the stakeholder draft Georgia Rules for Water Use Efficiency from October 2<sup>nd</sup>.

Best,

Catherine



Advocacy • Service • Innovation

**Catherine Fleming**  
Governmental Relations Associate  
Office: 678-536-4367 ♦ Fax: 678-536-4377 ♦ Cell: 404-558-1755  
[www.gmanet.com](http://www.gmanet.com)

---

This email has been scanned by the Symantec Email Security.cloud service.  
For more information please visit <http://www.symanteccloud.com>

---



President  
Keith Brady  
Mayor, Newnan

First Vice President  
Mike Becker  
Mayor, Johns Creek

Second Vice President  
Edna Jackson  
Mayor, Savannah

Third Vice President  
Boyd Austin  
Mayor, Dallas

Immediate Past President  
Beth English  
Mayor Pro Tem, Vienna

Executive Director  
Lamar Norton

November 13, 2014

Mr. James A. Capp  
Chief, Watershed Protection Branch, EPD  
2 Martin Luther King Jr. Drive, Suite 1152 East  
Atlanta, Georgia 30334

RE: Stakeholder Draft – Georgia Rules for Water Efficiency

Dear Mr. Capp:

Thank you for the opportunity to comment on the strawman rules for Water Use Efficiency. I appreciate your hard work to craft a rule that improves the efficiency and effectiveness of water use and hope that you will consider the comments below and incorporate them into the next draft of the rule.

The proposed requirement that utilities use a certified water loss auditor will result in increased costs borne by ratepayers. EPD, if necessary, can employ a certified water loss auditor rather than adding an additional layer and cost to the process of conducting and submitting the results of the audits.

I am also very troubled by Section 4 of the rule, regarding demonstrable progress. While I agree and can appreciate the fact that water systems should make progress in water use efficiency, it seems inappropriate that a lack of “demonstrable progress” could result in a water withdrawal permit reduction. It may be very hard for systems that have made great gains in the last few years on water loss to show demonstrable progress, while it may be very easy for systems which have a lot of work to be done in this area to show progress. This rule has the potential to punish those who have been on the forefront of negating water loss. Furthermore, water systems have often invested in updating their system infrastructure and financed them through loans from GEFA. Should a system not make demonstrable progress and have their permit reduced, a utility may find itself in a precarious position to pay back loans, leaving the system to need to charge even more for water to recoup those costs.

Again, thank you for the opportunity to comment on the rule and for your consideration of these suggestions.

Sincerely,

A handwritten signature in blue ink that reads "Catherine".

Catherine Fleming  
Governmental Relations Associate



GEORGIA POWER

**Cash, Tim**

---

**From:** Williams, Alicia F. <AFWILLIA@southernco.com>  
**Sent:** Friday, November 14, 2014 2:56 PM  
**To:** Cash, Tim  
**Subject:** Georgia Power Comments to Drought Management & Water Efficiency Rules  
**Attachments:** Drought Mgmt&Water Eff Rule Comments #3 11\_13\_2014.pdf

Tim,  
Please see that attached comments for the proposed Drought Management and Water Efficiency Rules, Stakeholder Meeting #3. A hardcopy of this document will be forwarded to your office as well.

Thanks,

**Alicia F. Williams**  
*GPC Environmental Affairs | Office 404.506.3075 | Cell 404.735.2794*

Environmental Affairs  
Bin 10221  
241 Ralph McGill Blvd, NE  
Atlanta, Georgia 30308-3374



November 14, 2014  
**CERTIFIED MAIL**

Mr. James A. Capp  
Chief, Watershed Protection Branch, EPD  
2 Martin Luther King Jr. Drive, Suite 1152 East  
Atlanta, GA 30334

**RE: Drought Management and Water Efficiency Rules Stakeholder Meeting**

Dear Mr. Capp:

Georgia Power Company (GPC) respectfully submits its comments in response to the Environmental Protection Division's (EPD) third stakeholder meeting and the proposed implementation of a new Drought Management Rule ("draft rule" or "DMR") and its proposed implementation of the Water Efficiency Rule ("WER").

As an initial matter, we support several of the changes the draft rule has incorporated in response to comments received in response to the prior July 2014 draft. Specifically, we agree with EPD's decision to remove additional recordkeeping and reporting requirements, make clear that the drought surcharge program is not required to include industrial customers, and clarify that numeric water reduction requirements are not applicable to industrial and commercial users. We further agree with the new draft rule's provision that numeric water reduction requirements should not apply to public water systems whose residential customers comprise less than ten percent of water use.

In response to this most recent draft, we reiterate the concerns we previously expressed – that, particularly for industrial users, the purpose of this rulemaking has not been adequately justified. We additionally provide specific recommendations below.

**Permittee and Public Water System.** The main focus of the DMR is clearly on establishing a regulatory framework for "permittees that are public water systems" to apply in times of drought. However, certain provisions apply more broadly to all "permittees" such as industrial and commercial users. We believe that the draft rule could be clearer if, instead of using the phrase "permittees who are public water systems," it just used the term "public water systems" and avoided generic references to "permittees."

We also note that the definition of the term "public water system" in the DMR differs from the definition of the same term in the Rules for Safe Drinking Water. *See* Georgia Rules 391-3-5-.02(96) (defining "public water systems" to mean those that have at least 15 service connections or regularly serve 25 individuals). The term also differs from the same term under the Georgia

Water Stewardship Act of 2010. *See* O.C.G.A. §12-5-4.1(a)(2) (defining “public water systems,” to mean those which regularly serve at least 3,300 individuals). We believe that a minimum number of service connections and/or individuals served should also be incorporated as part of the definition of “public water system” in the draft rule. Thus, we recommend that for consistency, the definition in the DMR be redrafted to match the term under the Rules for Safe Drinking Water or the Georgia Water Stewardship Act.<sup>1</sup>

Additionally, EPD should also limit the applicability of those provisions pertinent to public water systems to only those that offer water for sale or resale. As the draft rule is now written, public water systems that use water only for internal purposes (e.g., to support an industrial facility) are subject to provisions of the DMR clearly meant for traditional public water systems. For example, the Drought Responses Strategies Menu, DMR at 391-3-30-.07(5), is applicable to all public water systems even though most of the strategies are unsuitable to those systems that do not sell or resell water.

**Conference Call.** We agree with the draft rule’s provision on the Director holding a conference call prior to making a drought response level declaration and quarterly when Drought Response Strategies are in place. We also support the provision’s allowance for comments to be submitted following the initial conference call, but believe that comments should also be allowed after each quarterly call.

**Variance Requests.** We support EPD’s decision to allow variances for permittees whose water supply is obtained from projects owned and operated by the United States Army Corps of Engineers. However, we do not believe that the rule should establish a rebuttable presumption that variances should be denied for permittees who get more than 25 percent of the water supply from such projects. The DMR justifies the presumption “because these permittees have little control over the management of their water supply source.” To the contrary, this rationale supports a presumption *in favor* of a variance. On highly regulated water bodies, water withdrawals have a far less significant effect on in-stream flow (or total storage capacity, in the case of a lake or reservoir) than unregulated waters, suggesting that a variance would be appropriate.

**Water Quality Control Rules for Surface Water and Groundwater Withdrawals.** We believe that it is inappropriate for the draft rule to add the following provision: “If there are conflicts between this [drought contingency] plan and Rule 391-3-30, Rule 391-3-30 shall prevail.” By deleting this sentence, the rule would ensure that any conflicts between a drought contingency plan and the rule are resolved *prior* to the plan’s approval. As the draft rule now reads, such conflicts could arise even after a plan has been “approved” resulting in uncertainty as to the finality of the approval and discouraging early resolution of any potential conflicts.

---

<sup>1</sup> We further note that the definition of “public water system” and “soaker hose” are incorrectly numbered in the draft rule. They should be numbered (7) and (8), respectively, rather than (e) and (f).

**Water Efficiency Rule.** The WER was drafted pursuant to the Georgia Water Stewardship Act of 2010 ("GWSA"), S.B. 370, codified O.C.G.A. § 12-5-4 et seq. As the GWSA makes clear, the standards adopted by the Board of Natural Resources for monitoring and improving the efficiencies of public water systems may apply only to those public water systems that regularly serve at least 3,300 individuals. *See* O.C.G.A. §12-5-4.1(2) (defining "public water systems," to mean those which regularly serve at least 3,300 individuals). We recommend that the WER mirror the text of its enabling statute, making clear that it applies to only that subset of public water systems.

We appreciate your consideration of our comments. If you have any questions, please contact Alicia Williams of my staff at (404) 506.3075 or [afwillia@southernco.com](mailto:afwillia@southernco.com).

Sincerely,

A handwritten signature in black ink, appearing to read 'Burns Wetherington', with a large, sweeping flourish extending to the right.

Burns Wetherington, P.E.  
Environmental Affairs Supervisor

AFW

# GEORGIA WATER COALITION

## Cash, Tim

---

**From:** Ben Emanuel <bemanuel@americanrivers.org>  
**Sent:** Friday, November 14, 2014 3:35 PM  
**To:** Cash, Tim  
**Cc:** Chris Manganiello (chris@garivers.org)  
**Subject:** Water Use Efficiency Rule - GA Water Coalition comments  
**Attachments:** WUE Rule\_GA Water Coalition letter\_11-14-14.pdf

Tim:

Please find attached a comment letter from the Georgia Water Coalition regarding the proposed Water Use Efficiency Rules described at the Oct. 22 stakeholder meeting.

If you have any questions, please feel free to contact me or Chris Manganiello at Georgia River Network ([chris@garivers.org](mailto:chris@garivers.org)).

Best,

Ben Emanuel

Ben Emanuel | Associate Director, Clean Water Supply Programs | American Rivers  
108 East Ponce de Leon Ave., Suite 212 | Decatur, GA 30030  
404-373-3980 - ph | 404-373-3603 - fax | 706-340-8868 - cell | [bemanuel@americanrivers.org](mailto:bemanuel@americanrivers.org)  
American Rivers | Rivers Connect Us | AmericanRivers.org



November 14, 2014

James A. Capp  
Chief, Watershed Protection Branch  
Georgia Environmental Protection Division  
Suite 1152 East Tower  
2 Martin Luther King Jr. Drive  
Atlanta, GA 30334

Submitted via email to: [tim.cash@dnr.state.ga.us](mailto:tim.cash@dnr.state.ga.us)

**SUBJECT: Water Use Efficiency Rule – Stakeholder Meeting #1**

Dear Mr. Capp and Mr. Cash:

These comments are submitted on behalf of the Georgia Water Coalition in response to the Environmental Protection Division's (EPD) request for input following the October 22, 2014 Stakeholder Meeting #1 regarding the pending adoption of new Georgia **Rules for Water Use Efficiency**. This comment letter specifically addresses the proposed draft Water Use Efficiency rule. We appreciate the stakeholder process around the development of this rule.

The Georgia Water Coalition (GWC) is a group of more than 200 organizations representing well over a quarter of a million Georgians including farmers, homeowner and lake associations, business owners, sportsmen's clubs, conservation organizations, professional associations and religious groups. The GWC's mission is to protect and care for Georgia's water resources, which are essential for sustaining Georgia's prosperity, providing clean and abundant drinking water, preserving diverse aquatic habitats for wildlife and recreation, and strengthening property values. A list of coalition members is attached to this letter.

We are pleased to see EPD moving to create these rules pursuant to the Georgia Water Stewardship Act of 2010. In particular, we are pleased to see EPD moving to advance further the successful practice of water loss auditing and control in Georgia with this proposed draft rulemaking. This letter contains numerous comments on water loss auditing and control for the purpose of informing this rulemaking. However, the proposed



draft rule would be more effective at achieving water efficiency if its scope extended beyond water loss auditing and control.

### **Scope of the Rule Should Expand**

Specifically, demand side-management should be incorporated into the draft rule. Demand-side management and conservation is a tool that can extend the life of existing supplies, eliminate the need for costly new or expanded supplies, lower water treatment costs, and preserve water for recreational and environmental needs and future economic development or environmental opportunities.

By addressing demand-side management and conservation, EPD's draft rule would be more comprehensive and provide a full toolkit of activity that could demonstrate our state is a good water steward. Such statewide action would strengthen the state's position in the tri-state litigation over allocation of the Apalachicola-Chattahoochee-Flint (ACF) River basin, in litigation regarding the Alabama-Coosa-Tallapoosa (ACT) River basin, and in promoting stewardship and conservation of other interstate and intrastate water resources.

### ***Demand-Side Management and Conservation***

Overall, we recommend EPD incorporate demand-side management into the water efficiency rule. One method would be by requiring all permittees to implement the conservation measures outlined in the Metropolitan North Georgia Water Planning District's (Metro District) 2009 Water Supply and Water Conservation Management Plan; other specific tools are described below. Several of the Metro District plan's measures have proven successful in reducing water use within the metro Atlanta region, including conservation pricing, plumbing retrofit programs, and dedicated funding and personnel for conservation outreach. See the 2012 report published by Chattahoochee Riverkeeper, *Filling the Water Gap: Conservation Successes and Missed Opportunities in Metro Atlanta*.<sup>1</sup>

Another way to work toward comprehensive water efficiency is for the state to utilize information and guidance from local governments who have independently implemented measures with obvious water savings benefits. These could include not only water supply practices, but also regulations and incentives that reduce stormwater runoff and increase baseflow in surface streams. The City of Atlanta's Post-Construction Stormwater Ordinance is a good example. This ordinance requires most new development and redevelopment to control stormwater in part through green infrastructure.

- EPD already has at its disposal many tools that could be used to generate components of a water efficiency rule that would assist water systems in achieving comprehensive water efficiency.
  - EPD's 2012 efforts to produce water use and efficiency reporting guidance for public water systems could be used to identify water use by customer class and recording and reporting methods that can be used to improve efficiency over time.

---

<sup>1</sup> <http://www.ucriverkeeper.org/filling-the-water-gap-report.php>

- During the drought of 2007 to 2009, EPD developed reporting tools for water utilities and other permittees to use in an effort to demonstrate reductions in withdrawals. Reporting of this type could be standardized to minimize redundancy and burden, and could be incorporated into the water loss audit data reporting already required of permittees. Doing so could provide great value in improving data quality around water use efficiency improvements over time.
  - Another resource is found in the Watershed Protection Branch memo to Regional Water Planning Council members dated September 21, 2010 regarding “EPD guidance for evaluating management practices to manage water demand,” which heavily referenced Georgia’s Water Conservation Implementation Plan. The 2010 memo offered four tiers of water conservation practices, many of which apply to public water systems and would be effective in advancing end-use water efficiency and demand-side management statewide.
- We recommend that EPD incorporate into the rule demand-side management “best practices” for water permittees, including water utilities and drinking water providers. The most effective first-step best practice is defining customer classes and documenting water use by customer class. Another is reporting on the system’s peaking factor; EPD could ask for reporting by utilities that demonstrates trends in seasonal peaking factor over a period of several years as evidence of effective demand-side management.
  - Finally, we recommend that EPD incorporate into the draft rule requirements that water providers calculate and report gallons per capita per day (GPCD) and residential GPCD as a metric of demand side management. Efforts to refine the calculation of GPCD and to use residential GPCD as a meaningful metric are moving forward across the country. In 2014, the California State Water Resources Control Board initiated a new requirement of residential GPCD reporting by water systems statewide.<sup>2</sup> The California Board acknowledges that it is not appropriate to use residential GPCD data to make comparisons across water providers unless all relevant factors are considered. Nonetheless, the new GPCD reporting requirement in California will certainly improve data availability for past and present water use statewide and provide a basis for tracking progress of water providers across the state. The State of New Mexico has also developed and adopted its own GPCD calculation methodology published by the New Mexico Office of the State Engineer.<sup>3</sup> We recommend referencing the New Mexico GPCD methodology for use in the water efficiency rule.

We encourage EPD to take the opportunity during the drafting stage to engage stakeholders in dialogue on how this water efficiency rulemaking can incorporate broader water efficiency measures and demand-side management.

---

<sup>2</sup> [http://www.waterboards.ca.gov/waterrights/water\\_issues/programs/drought/conservation\\_reporting\\_info.shtml](http://www.waterboards.ca.gov/waterrights/water_issues/programs/drought/conservation_reporting_info.shtml)

<sup>3</sup> [http://www.ose.state.nm.us/wucp\\_gcpd.html](http://www.ose.state.nm.us/wucp_gcpd.html)

## **Water Loss Auditing and Control**

The initial stakeholder draft of Georgia's water efficiency rule is a strong start toward further advancing the successful practice of water loss auditing and control in Georgia. Because of the 2010 Water Stewardship Act, EPD and the state's water utilities have made great strides to standardize and annualize water loss auditing according to the American Water Works Association (AWWA) methodology. EPD should continue to advance water loss auditing and control efforts via this rulemaking so that these efforts continue. Although it is a delicate task to translate water loss auditing and control programs into a regulatory context, the task is necessary for the prudent management of Georgia's water resources.

### ***Reporting***

The rule language should clarify that annual water loss audit results will continue to be posted to the EPD website, as required by the 2010 Georgia Water Stewardship Act.

### ***Audit Validation***

EPD is right to formalize and standardize the audit validation process. It is important to design a framework that can advance continuous improvement for all water systems, especially those systems that may struggle to complete the audit in an effective and useful manner. It is also important for water system customers, community members, advocates, and other stakeholders to have confidence in the information presented annually in the audits.

We trust that EPD will oversee the development of a validation process in concert with water utilities. It is important that this process be robust enough, over a sufficient period of time, to ensure that utilities experience continual improvement in audit validity at all stages of water loss auditing and across the spectrum of validity scores.

### ***Demonstrable Progress, Metrics and Benchmarks***

The draft rule appropriately requires public water systems to show "demonstrable progress" in relation to water loss auditing and control. It is also appropriate for the rule to focus on individualized goals for each water system. However, what constitutes "demonstrable progress" remains unclear.

EPD can look to other states to some extent for examples of regulatory approaches to defining demonstrable progress in water loss auditing and control. (Some states have taken approaches that are not necessarily advisable, such as using percentage reductions in key indicators as metrics. Other states have established components of a successful approach to water loss in the regulatory context.) The California Urban Water Conservation Council's (CUWCC) Best Management Practice 1.2, adopted in 2009, is a good example.<sup>4</sup> Although not all aspects of the CUWCC approach would apply well to Georgia given the water loss activities already taking place here in recent years (both through the Metropolitan North

---

<sup>4</sup> <http://www.cuwcc.org/Resources/Memorandum-of-Understanding/Exhibit-1-BMP-Definitions-Schedules-and-Requirements/BMP-1-Utility-Operations-Programs#BMP%201.2>

Georgia Water Planning District and under the Georgia Water Stewardship Act), it serves as an example of an intelligently nuanced and detailed approach to the topic of demonstrable progress. Certain aspects of the CUWCC approach are referenced in our comments below.

We recommend that the rule require water systems demonstrate progress in the areas of both performance metrics and process-based metrics.

### *Performance Metrics*

- EPD is right to include improvement in infrastructure leakage index (ILI), real losses and apparent losses among the metrics for showing demonstrable progress. In addition to requiring improvement in each of these metrics, EPD should also consider establishing numerical benchmarks to accompany these metrics.

That said, we do not recommend that the draft rule use percentage improvements to measure progress on performance measures. Percentage scores of the key water loss performance measures are not fixed and can change from year to year for a given utility.

A reasonable numeric benchmark for Infrastructure Leakage Index (ILI) is a score of less than three (3.0) and approaching one (1.0). ILI of less than 3 is an indication that the system's real losses are approaching the unavoidable annual real losses [UARL] value, which is positive for any system.

We recommend that EPD look for decreasing trends over time, such as five (5) year intervals.

- Additionally, we recommend that the rule recognize that small systems, and/or those with a small number of connections per mile of main, demonstrate progress using the Op 24 metric (per the AWWA audit software) or Operational Basic Real Losses. It is not realistic for all small systems to find the ILI to be a helpful metric. In some cases, an appropriate requirement would be that the utility shows a decreasing trend in Operational Basic Real Losses over a five-year period in order to demonstrate progress.
- For reference, for the above types of performance measures, the CUWCC approach requires a utility to achieve a score either:
  - less than its score the previous year, or
  - less than the average of its scores for the previous three years, or
  - in the top quintile (20%) of other systems reporting that indicator (and achieving high data validity), or
  - showing reduction in losses below a previously-set individualized benchmark derived from water loss audit results.

Although the CUWCC creates different requirements for numerical improvement in key performance measures from our suggestions above, it offers rational and objective methods of demonstrating progress. It is important that EPD defines demonstrable progress with clear metrics and steps that water utilities can use.

### *Process-Based Metrics*

Process-based metrics are those that relate to utility business practices, specifically those practices that are fundamental to successful water loss auditing and control. Clearly specifying process-based metrics for system-specific improvement will help keep EPD's proposed rule objective, rigorous and fair.

- The most important process-based metric to incorporate into the rule is data validity score. Utilities should demonstrate continuous improvement in data validity over time.<sup>5</sup>

For example, a data validity score at or below 65 (out of 100) can be used as a benchmark for planning purposes for water systems. A score at or below 65 indicates that the utility's efficiency efforts should be focused on improving data validity. A score above 65 is a good sign and can indicate that the water utilities should begin working on water loss control planning in addition to continuing to improve data validity.

Additionally, EPD should consider requiring water systems to produce a plan documenting how they plan to address the top three components to improve their validity score. This information is a product of the auditing as determined by the AWWA audit software (i.e. the "Priority Areas for Attention" according to the software worksheet). We recommend this requirement be included in the reporting requirement described in the draft rule under Water Use Efficiency and Effectiveness Improvement.

EPD should establish a timeframe for all water utilities to demonstrate progress toward improved validity. This clause should not exclude those utilities with relatively high validity scores from continuously improving those scores. Consider establishing a range from 3 to 10 years' worth of data as a starting point for examining trends in validity improvement.

- Other process-based measures that should be incorporated into the draft rule include:
  - Progress toward universal metering of all accounts and connections, as well as source water metering, a very common source of error in water loss auditing. For reference, the CUWCC requires utilities to test source, import and production meters annually.
  - Volumetric billing of all billed accounts, as well as meter "right-sizing" (i.e. calibration and/ or replacement).
  - Completion of a component analysis of real losses by the end of the fourth year of implementation of water loss reporting for the water system. Systems should also update this analysis no less than every four years. For reference or more details, see the CUWCC BMP manual.

### **Other Areas of Georgia Water Stewardship Act Implementation**

Finally, we recommend the state supplement the water efficiency rules for water permittees with audits of all local governments to document strides they are taking to

---

<sup>5</sup> Georgia Water System Audits and Water Loss Control Manual Version 1.1, January 2014, Section 3.1, p. 20

implement the conservation measures required by the 2010 Georgia Water Stewardship Act. The act calls for sub-metering for new multi-tenant buildings, high efficiency plumbing fixtures for new buildings, and high efficiency cooling systems for new industrial buildings. We are pleased that these measures have been incorporated into Georgia State Minimum Standard Plumbing and Building Codes. However, an additional measure is the daytime outdoor watering restrictions for select users. An audit of local governments could document that local governments are implementing the plumbing and building codes as well as implementing the ordinances or programs designed to uphold the outdoor watering restrictions.

The Georgia Water Coalition firmly believes that widespread implementation of these and additional conservation and efficiency measures will demonstrate Georgia's good water stewardship, thereby helping the state secure an equitable water-sharing agreement with Florida and Alabama over ACF river basin allocation, informing negotiations and litigation over other interstate waters such as the ACT basin, and promoting stewardship and cooperation over water resources among communities within Georgia as well.

### **Conclusion**

We thank EPD for the opportunity to provide comment ahead of a formal rulemaking process. We look forward to continuing to participate in this important stakeholder process. If you have any further questions regarding this letter or this proposed rulemaking, please contact Ben Emanuel at American Rivers, at [bemanuel@americanrivers.org](mailto:bemanuel@americanrivers.org) or 404-373-3980.

Sincerely,

The Georgia Water Coalition

GRIFFIN

## Cash, Tim

---

**From:** Brant D. Keller PhD <BKeller@cityofgriffin.com>  
**Sent:** Wednesday, November 12, 2014 5:02 PM  
**To:** Cash, Tim  
**Cc:** Joseph Johnson, P.E.  
**Subject:** Public Comments  
**Attachments:** GAEPD 11.12.14 Comments - Water Efficiency Rule.docx

Tim

Please find attached Griffin's comments on the first draft.

Thanks allowing us to be part of this important issue

**Brant D. Keller PhD**  
Public Works | Director



100 S. Hill Street  
Griffin, GA 30223

**P:** 678-692-0391  
**F:** 678-692-0392  
**C:** 770-318-8051  
**E:** [BKeller@cityofgriffin.com](mailto:BKeller@cityofgriffin.com)  
**W:** [cityofgriffin.com](http://cityofgriffin.com)

---

CONFIDENTIALITY: The information transmitted is intended only for the person or entity to which it is addressed and may contain confidential, proprietary, and/or privileged material. Any review, retransmission, dissemination or other use of, or taking of any action in reliance upon this information by persons or entities other than the intended recipient is prohibited. If you received this email in error, please notify the sender and delete the material from all computers.





Georgia Environmental Protection Division  
Watershed Protection Branch  
Tim Cash  
2 Martin Luther King Jr., Drive  
Suite 1152 East  
Atlanta, GA 30334

RE: Georgia Rules for Water Efficiency – Chapter 391-3-33  
Public Comment

The City of Griffin respectfully submits the following comments for your review and consideration on this important subject.

#### 391-3-33-.02 Definitions

“Certified Water Loss Auditor” – This definition needs to be refined. What qualifies the individual to conduct the audit. Validation of the audit in our opinion should be conducted by a third party for review. Whether GAEPD conducts the audit review in house or sub-contracts out the review, the audit conducted should be consistent in addressing the Validity Score as well as the review of data imputed to calculate the ILI score. By using one individual or team, the scores would be consistent to their view of the methodology. The scoring has consequences whether intended or not, that is the reality of the real world when reviewing and comparing scores. We have first hand experience as the first audits were published. We personally were contacted by the AWWA to discuss the scores. We even went to far as to volunteer to Beta Test 5.0 version.

#### 391-3-33-.04 Water Use Efficiency and Effectiveness Improvement

##### Water Loss Control Program

(2) Individualized Goals (b) Water Audit Data Validity Score. This score can be skewed by the auditor or individual performing the data entry. It is a measure to understand the internal operations of the water system but is subject to interpretation.

(4) Demonstrable Progress.

(a) Improving water efficiency and measuring progress obviously is necessary to the rule. Webster's dictionary states the definition of demonstrable as :“clearly apparent or capable of being logically proved”. With that being said, interpretation of progress would clearly be needed to be defined. In an analytical world, progress would be tied to measurable targets. As written this is open ended to interpretation. With the ever changing of staff at GAEPD both at the Directors position and the Branch Chief over the last several years, as well as lower levels – “Demonstrable Progress could and more than likely would change.



(b) Demonstrable Progress may be evaluated by the Division as part of the review of the following applications:

1. Application to renew a water withdrawal permit
2. Application to modify an existing water withdrawal permit
3. Application to to increase the number of permitted service connections

“Failure to make demonstrable progress may result in denial of water permit application to increase water withdrawal or drinking water service connections or reduction in permitted water withdrawal quantity”

There are real consequences to the “Efficiency Rule” making which would not only affect Griffin but many other systems in Georgia.

Griffin looks forward in working with GAEPD on this important issue not only for our system but for the all water systems in Georgia.

Observations:

1. The age of the system has a direct relationship to leakage.
2. Targets to be considered processes implemented already such as leak detection, meter replacement, pressure management, modeling of system, programs promoting efficient fixture replacement, SCADA controls of system and others. Targets can be measure by resources allocated and short, intermediate and long term demonstrated plans. Pipe rehab, repair and replacement obviously should be considered.
3. Financial stability of the system and ability to generate revenue based on median per capita income must be taken into consideration.
4. Water treatment and supply costs are a real variable in the overall achievement. There has to be a balance of treatment and it's requirements as well as the distribution aspect. Affordability is key

# GWINNETT COUNTY

## Cash, Tim

---

**From:** Susan.Lee@gwinnettcountry.com  
**Sent:** Friday, November 14, 2014 12:41 PM  
**To:** Cash, Tim  
**Cc:** Charlotte.Nash@gwinnettcountry.com; Glenn.Stephens@gwinnettcountry.com; Ron.Seibenhener@gwinnettcountry.com; Forrest.Fields@gwinnettcountry.com; Kevin.Farrell@gwinnettcountry.com; Debbie.Savage@gwinnettcountry.com; Rebecca.Flickinger@gwinnettcountry.com; TEdwards@ACCG.org  
**Subject:** Drought Management and Water Efficiency Rules Stakeholder Meeting

Good afternoon, Tim –

Per the instructions provided at our last stakeholder meeting, I'm forwarding comments on the proposed rules from the Gwinnett County Government.

### *Gwinnett County's Comments on EPD's Draft Rules for Drought Management & Water Efficiency*

#### Regarding the Draft Drought Management Rule:

- There does not appear to be anything significant gained by EPD including mention of “rebuttable presumption” of a denial for variance request if withdrawal is made from a COE lake.
- The proposed language of “Numeric Water Use Reduction Requirements” should be revised back to “Numeric Water Use Reduction Targets” as stated in earlier versions of the draft rule language.

#### Regarding the Draft Water Efficiency Rule:

- Validation of annual water loss audits by a “Certified Water Loss Auditor” (likely a third party) is not needed for Gwinnett County as Department of Water Resources’ staff currently submits a very well-scrutinized, accurate and professional audit, and the additional cost would be another unfunded mandate.
- There are currently many submittals required by various EPD permits that don't call for third party “certification”. Therefore, the requirement for this additional audit would be inconsistent and precedent-setting.
- The proposed requirement of showing “demonstrable progress” in improving water use efficiency is not well defined.
- The stated possibility of actually reducing a current permitted withdrawal quantity for “failure to make demonstrable progress” is an overreach.

- The proposed language leaves the door open for a permittee to be negatively cited for going from 3% to 4% in water loss, while another gets praise for going from 20% to 17% loss.
- Consideration should be given to applying a better defined “demonstrable progress” provision only to those permittees above a certain percentage water loss threshold.

**Thank you for the opportunity to provide input. Please let me know if you have questions or need additional information.**

*Susan Lee* 

**Legislative Liaison  
Gwinnett County Board of Commissioners  
770.822.7427**

*NOTE: Email is provided to employees for the administrative needs of the county. Email correspondence to/from a county email account is considered public information and subject to release under Georgia laws or pursuant to subpoena.*

# HENRY COUNTY

## Cash, Tim

---

**From:** tara brown <tara.brown@hcwsa.com>  
**Sent:** Friday, November 14, 2014 2:16 PM  
**To:** Cash, Tim  
**Cc:** lindy farmer; tony carnell; scott sage  
**Subject:** Comments on Proposed Water Use Efficiency Rule  
**Attachments:** Comments on Water Use Efficiency Rule.pdf

Mr. Cash,

On behalf of the Henry County Water Authority, please take the attached comments into consideration.

Feel free to contact me with any questions.

Thanks,

### **Tara Brown**

Environmental Compliance Coordinator  
Henry County Water Authority  
100 Westridge Industrial Blvd  
McDonough, Georgia 30253  
Office: (678) 583-3810

Confidentiality Notice: The information contained in this email and any attachments may be privileged, confidential, and/or proprietary and is intended solely for the use of the person(s) to whom it is addressed. If you are not the intended recipient, any review, retransmission, dissemination or any other use of the information contained in this email and any attachments is strictly prohibited. If you have received this communication in error, please notify the sender immediately by replying to this email and then delete this material from any system that it may be on. Henry County Water Authority does not accept responsibility for any changes made to the information contained in this communication after it was originally sent.



# Henry County Water Authority

---

Engineering Department  
100 Westridge Industrial Blvd.  
McDonough, GA 30253  
(770) 914-3688 (770) 914-3359 Fax

November 14, 2014

James A. Capp  
Chief, Watershed Protection Branch, EPD  
2 Martin Luther King Jr. Drive, Suite 1152 East  
Atlanta, GA 30334

**RE: Comments on Water Use Efficiency Rule**

Dear Mr. Capp:

As a stakeholder, Henry County Water Authority appreciates the opportunity to provide comments on possible modifications to the Water Use Efficiency Rule.

It is the opinion of the Authority that a professional engineer working for a local utility is just as qualified to complete a water loss audit as a "Certified Water Loss Auditor." Professional engineers are responsible for making decisions, executing and reviewing documents and plans, and making calculations that are much more complex and much more of a risk to a public water system than completing a water loss audit form. In essence, completing a water loss audit form inaccurately poses no risk whatsoever to the public.

In addition, the EPD already requires the Authority to have professional engineers on staff as part of its delegated authority to review plans and specifications. This type of plan review is much riskier to our system than completing the water loss audit form. A professional engineer's signature should be acceptable for completing the audit document.

As far as guidance for completing the audit, the EPD has already published the "Georgia Water System Audits and Water Loss Control Manual" and the AWWA has published the "Water Audits and Loss Control Programs Manual (M36)" as reference guides. Any professional engineer completing the audit form would certainly refer to these documents. Having a third party evaluate and approve the audits each year is the equivalent of the Authority paying someone to approve water distribution and wastewater collection systems plans after they have already paid a professional engineer on staff to approve them.

If EPD feels that the professional engineers need to have a better understanding of the water loss audit process, then perhaps EPD can simply offer a few "free" annual seminars on completing the audit form and require the professional engineer completing the form attend a seminar at least every two years, and maybe even receive PDH credits for attending. (Other professional organizations already offer seminars on this topic.)





# Henry County Water Authority

---

Engineering Department  
100 Westridge Industrial Blvd.  
McDonough, GA 30253  
(770) 914-3688 (770) 914-3359 Fax

Also, “demonstrable progress” is a term that needs to be more clearly defined. This term can be interpreted many ways and it would be in the best interest of all parties involved to have a better understanding of what is meant. For the Authority, water loss may never get below 15% because leaks and unavoidable losses will be continuous. There needs to be an acceptable “bottom line” number, and a way to measure progress towards that number.

As always, HCWA strives to maintain compliance with all EPD rules and requirements and will continue to be committed to fostering water conservation in our county. Please accept these comments and take them into consideration during the drafting of the new Water Use Efficiency Rule.

Sincerely,

A handwritten signature in blue ink that reads 'Scott Sage'.

Scott Sage, P.E.  
Engineering Division Manager  
Henry County Water Authority

CC: Lindy Farmer, General Manager, HCWA  
Tony Carnell, Deputy Manager, HCWA

