

**OCONEE COUNTY  
BOARD OF COMMISSIONERS**



**DROUGHT CONTINGENCY PLAN**

**FEBRUARY 2020**

**Prepared By:**



---

---

## DROUGHT CONTINGENCY PLAN

### TABLE OF CONTENTS

<b>SECTION</b>	<b>DESCRIPTION</b>	<b>PAGE NO.</b>
1.	Introduction .....	1
2.	Drought Condition Indicators .....	1
3.	Drought Management Actions .....	1
4.	Drought Severity Stages .....	3
5.	Conditions or Events for Declaration of Drought Response .....	4
	Levels and Water Use Reductions	
6.	Potable Water Use Priorities Program .....	5
7.	Implementation of Water Use Reductions .....	5
8.	Exemptions .....	8
9.	Emergency Powers .....	9
10.	Enforcement .....	9
11.	Low Flow Protection and Monitoring .....	11
	A.    Depletion of Instream Flow .....	11
	B.    Instream Flow Requirements .....	11
	C.    Low Flow Monitoring Plan .....	12
12.	Water Storage Availability .....	12
	A.    Reservoir and Water Plant Storage .....	12
	B.    Distribution Storage .....	13
	C.    Available Alternate Sources of Finished or Raw Water .....	14
13.	Approvals .....	14

### APPENDICES

Appendix A: Oconee County Outdoor Water Use Ordinance

## 1. Introduction

The goal of drought contingency planning is to increase the reliability of surface and ground water sources. The Drought Contingency Plan (DCP) identifies alternative system and resource management strategies to be implemented under drought or water shortage conditions. This document was developed in accordance with the Georgia Department of Natural Resources (DNR), Environmental Protection Division's (EPD) Rules and Regulations for Water Quality Control, Chapter 391-3-6 and Oconee County's Outdoor Water Use Ordinance (see Appendix A). The purpose of the DCP is to install emergency procedures to prevent threats to the public health and safety arising from periods of water shortage and drought. Additionally, it prevents acts that cause, or can reasonably be expected to cause, significant imminent harm to limited water resources.

Currently, the greater majority of Oconee County's water is supplied by the Upper Oconee Basin Water Authority (Authority) via water withdrawn from the Bear Creek Reservoir with only about 5% from the County's own groundwater wells. Due to the reliance on water from Bear Creek Reservoir, Oconee County's management of water supplies is highly dependent on the water needs and practices of all of the Authority partners. Therefore, Oconee County's DCP is in line with the practices and requirements of the Drought Management Policy/Contingency Plan (DMP), as issued by the Authority and its member governments and most recently updated on March 10, 2016.

The following sections discuss the drought condition indicators and water conservation measures to be implemented in response to declared droughts based on the guidelines developed by EPD.

## 2. Drought Condition Indicators

As established by the Authority, the following drought condition indicators, in addition to other appropriate indicators, as part of the decision making process outlined in the DMP:

1. Streamflow levels (current versus historic)
2. Soil moisture content (current versus historic as measured by the Palmer-Hydrologic Drought Index (PHDI))
3. Reservoir storage or levels (current)
4. Rainfall accumulation (current versus historic and 90-day outlook)

## 3. Drought Management Actions

The identification of drought severity stages, the need for drought management actions, and the selection of drought response levels will be determined by the Authority Board based upon recommendations from its Joint Engineering/Operations Committee which will consider outputs from the Authority's Bear Creek Reservoir Drought Management Water Supply Model (Model) in formulating such recommendations.

The Model is a proactive, highly flexible computer simulation that allows the Authority to consider different probable stream flows, levels of water usage, durations of drought protection period, low flow protection, etc. to effectively manage the Bear Creek Reservoir during periods of low streamflow. The referenced Model is the basis of this updated Drought Management Policy/Contingency Plan and the Authority's efforts to ensure water availability to the member governments. The Model is intended solely as a management tool and is not intended to replace or update the hydrologic model on which the Authority's withdrawal permits are based.

Selection of the projected streamflow trend range will consider the following primary indicators:

1. Actual streamflow during the previous 90-day period relative to the historic streamflow in the Middle Oconee River as indicated by the Arcade United States Geological Service (USGS) gage (02217475) and the Middle Oconee USGS gage (02217500) located near Mitchell Bridge Road, and in the North Oconee River as indicated by the North Oconee USGS gage (02217770) located near College Avenue.
2. Actual Palmer Hydrologic Drought Index (PHDI) during the previous 90-day period compared to the historic PHDI during prior significant periods.
3. Actual rainfall during the previous 90-day period compared to the historic rainfall.
4. 90-day rainfall outlook from National Weather Service Climate Prediction Center (CPC).

The anticipated drought protection period will be the duration of time from the beginning of a potential drought through November 30 of that same calendar year. The anticipated water usage needs of each member government during the anticipated drought protection period will be the actual monthly average day and monthly maximum day usage of the member government during the same drought protection period in the previous non-drought year, plus any documented increase resulting from new residential and/or commercial customers. Each member government will be expected to submit its monthly average day and monthly maximum day for each month during the previous 12 months, plus the above noted proposed adjustments for growth, by no later than March 30th of each year for use with the upcoming drought protection period evaluation.

The Authority, through its Joint Engineering/Operations Committee, will utilize its Model to assess and manage the reservoir by following its Georgia EPD-approved Bear Creek Reservoir Management Model's User's Guide (User's Guide). At a minimum, the Authority staff will monitor the primary indicators on a monthly basis and keep the Model updated to current conditions. These current conditions will be reported on a monthly basis to the Joint Engineering/Operations Committee. As resources permit and potential new indicators become available, improvements to the Model may be made by the Authority.

## 4. Drought Severity Stages

The drought severity stages will be designated by the Authority Board based upon a recommendation from the Joint Engineering/Operations Committee. The purpose for designating drought severity stages is to provide advance warning to the member governments and the public of potential drought conditions and potential water usage reductions based on hydrological and meteorological conditions.

The Joint Engineering/Operations Committee will recommend drought severity stages utilizing parameters and designations as outlined below. Once the Authority has designated a drought severity stage, Authority staff will so advise the member governments and the general public. Further, the Joint Engineering/Operations Committee will begin to meet, on a frequency determined to be appropriate by the Chairpersons of the Engineering and Operations Committees, to evaluate the need for modification of the drought severity stage.

These severity stages range from less severe, Stage A1, to most severe, Stage D3. When indices are trending towards a significant drought event, the Authority's staff and/or Joint Engineering/Operations Committee may choose to run the Model more frequently than noted above.

Using the current member government allocations, the reservoir begins to deplete when streamflow rates are below the 40th percentile probability, water usage is at the full allocation share, and the anticipated drought protection period is greater than 120 days. Therefore, the 40th percentile streamflow rate probability and/or 120-day anticipated drought protection period are considered critical points at which to evaluate drought severity stages. PHDI probabilities ranging from the 25th to 10th percentiles also are used to develop drought severity stages. These percentiles were developed through a review of the PHDI values associated with moderate to extreme drought conditions using the Palmer classifications for drought severity, where the 25th percentile typically aligns with a PHDI value of -2, and the 10th percentile aligns with PHDI values of -3.

Stages of drought severity, relative streamflow, PHDI probabilities, and CPC Rainfall Outlooks to be utilized within the Authority's Model, are shown in Table 1.

**Table 1 – Drought Severity Stages and Associated Streamflow Probabilities, PHDI Probabilities and CPC Rainfall Outlook**

Sub-Level	CPC Rainfall Outlook	Stage A PHDI<25%	Stage A PHDI<20%	Stage A PHDI<15%	Stage D/ Emergency PHDI<10%
Non-Drought		$Q_p > 40\%$			
1	Above Normal	$Q_p = 35-30\%$	$Q_p = 30-25\%$	$Q_p = 25-20\%$	$Q_p = 20-15\%$
2	Normal	$Q_p = 30-25\%$	$Q_p = 25-20\%$	$Q_p = 20-15\%$	$Q_p = 15-10\%$
3	Below Normal	$Q_p = 25-20\%$	$Q_p = 20-15\%$	$Q_p = 15-10\%$	$Q_p = 10-5\%$

CPC - National Weather Service Climate Prediction Service

$Q_p$  - streamflow percentile probability

PHDI - Palmer Hydrologic Index percentile probability

## 5. Conditions or Events for Declaration of Drought Response Levels and Water Use Reductions

When current and/or projected water use demands and fire protection requirements of users of the Bear Creek Reservoir exceed, or are projected to exceed, the availability of water supply due to drought conditions in an anticipated drought protection period, a drought water use reduction condition will be deemed to exist, and the Joint Engineering/Operations Committee will notify the Authority Board that there is a need for water use reductions and recommend a Drought Response Level. Drought Response Levels and associated water use percent reduction ranges shown in Table 2 will be considered for implementation.

**Table 2 – Drought Response Levels and Water Use Percent Reduction Ranges**

Drought Response Levels	Water Use Percent Reduction
1	0 - 5
2	6 - 10
3	11 - 15
4	16 - 20
5	> 20

The Authority Board will subsequently determine appropriate collective water use reduction actions and Authority staff will so advise the member governments and the public.

Depending on the time of the year that a drought emergence is trending (based on the monitoring of the primary indicators and water supplies), the Authority Board will make its determination as to the actions necessary to retain adequate water supply to avoid or relieve local water shortages. Once a drought response level has been determined, the Joint Engineering/Operations Committee will meet, on a frequency determined to be appropriate by the Chairpersons of the Engineering and Operations Committees in coordination with the Chairperson of the Authority Board, to review the latest climatic indicators and water supply conditions and possibly render a determination that the drought severity stage and/or drought response level needs to be raised, reduced, or lifted. Drought progression will predominantly track the stream flows which will result from precipitation events and changes in soil moisture content (PDHI). While short-term precipitation may begin trending towards normal, drought effects will linger in the soil moisture and stream flows. The major indication of drought conditions ending will be if streamflow trends increase to above the 40th percentile probability. When this occurs, the flows will be high enough that water supply needs by the member governments can be met and the excess flows can be used to re-fill the reservoir.

## **6. Potable Water Use Priorities Program**

When the Model, based upon current and/or anticipated drought conditions, calls for a reduction in water usage, the member governments will generally follow the Authority's recommended potable water use priorities listed below. However, each member government will be responsible for establishing and implementing its own list of priorities, and associated enforcement procedures, in order to achieve reductions determined to be necessary by the Authority.

The following potable water use priorities are generally recommended by the Authority:

1. Emergency facilities for essential life support measures.
2. Domestic and personal uses, including drinking, cooking, washing, sanitary, and health related.
3. Farm uses to meet plant and animal needs.
4. Industrial/commercial uses (including those industries/businesses on public water systems).
5. Other uses such as lawn sprinkling and non-commercial car washing.
6. Outdoor recreation uses.

## **7. Implementation of Water Use Reductions**

If the Authority enacts a required reduction in water use by the member governments, the Authority will notify the Georgia EPD within 7 days of deciding to implement such a specific drought management response. The Authority will provide evidence that it is following its Guidance Document and this Drought Management Policy/ Contingency Plan.

The reduction needs identified by the Model will be provided to all member governments for application within their individual systems. Each member government will be responsible for implementing the water use reductions within 5 business days of the notice of action by the Authority Board.

Oconee County's protocol and methodology for achieving these reductions are as follows:

### **A. Outdoor Water Use Schedule During Non-Drought Periods**

Outdoor water use other than exempted activities shall occur only as follows:

1. Odd-numbered addresses: Outdoor water use is allowed on Tuesdays, Thursdays and Sundays.
2. Even-numbered addresses: Outdoor water use is allowed on Mondays, Wednesdays and Saturdays.
3. Drip irrigation and hand watering is allowed on any day and at any time.

B. Outdoor Water Use Schedule During Declared Response Levels

1. When the Environmental Protection Division makes drought declarations as authorized by state law and the rules and regulations of the EPD, or the Upper Oconee Basin Water Authority or the Oconee County Board of Commissioners, acting through its Chairman, make a drought declaration based on water usage and availability, water conservation measures, other than activities deemed exempt, shall occur during scheduled hours on scheduled days. Notice of any such drought declaration shall be published in the County legal organ and posted at the Oconee County Water Resources Department and the Oconee County Courthouse.
2. Water Use Percent Reductions, adopted by the Oconee County Board of Commissioners, shall be implemented corresponding to Drought Response Levels:
  - a. Level One shall target a 5% reduction.
  - b. Level Two shall target at 10% reduction.
  - c. Level Three shall target a 15% reduction.
  - d. Level Four shall target a 20% reduction
3. Declared Drought Response Level One. Outdoor water use may occur on scheduled days within the hours of 12:00 midnight to 10:00 a.m.
  - a. Scheduled days for odd-numbered addresses are Tuesdays, Thursdays and Sundays.
  - b. Scheduled days for even-numbered addresses are Mondays, Wednesdays and Saturdays.
  - c. Use of hydrants for any purpose other than firefighting, public health, safety or flushing is prohibited.
  - d. No outdoor water use shall be allowed on Fridays.
  - e. Drip Irrigation and Hand Watering is allowed from 12:00 midnight to 10:00 a.m. and 4:00 p.m. to 12:00 midnight on scheduled days.
4. Declared Drought Response Level Two. Outdoor water use may occur on scheduled days within the hours of 12:00 midnight to 10:00 a.m.
  - a. Scheduled days for odd-numbered addresses are Thursdays and Sundays.
  - b. Scheduled days for even-numbered addresses and golf course fairways are Wednesdays and Saturdays.
  - c. No outdoor water use shall be allowed on Mondays, Tuesdays and Fridays, with the exception of drip or hand irrigation that is allowed the additional day of Tuesdays for odd numbered addresses and Mondays for even numbered addresses.

d. The following uses are prohibited:

- i. Using hydrants for any purpose other than firefighting, public health, safety or flushing.
- ii. Washing hard surfaces, such as streets, gutters, sidewalks, houses and driveways except when necessary for public health and safety.

5. Declared Drought Response Level Three. Outdoor water use may occur on the scheduled day within the hours of 12:00 midnight to 8:00 a.m.

- a. The scheduled day for odd-numbered addresses is Sunday.
- b. The scheduled day for even-numbered addresses and golf course fairways is Saturday.
- c. No outdoor water use shall be allowed on any day except Saturday and Sunday.
- d. The following uses are prohibited:
- e. Drip Irrigation and Hand Watering is allowed within the hours of 12:00 midnight and 10:00 a.m. on scheduled days.
  - i. Using hydrants for any purpose other than firefighting, public health, safety or flushing.
  - ii. Washing hard surfaces, such as streets, gutters, sidewalks, houses, driveways, except when necessary for public health and safety.
  - iii. Filling installed swimming pools except when necessary for health care or structural integrity.
  - iv. Washing vehicles, such as cars, boats, trailers, motorbikes, airplanes, golf carts.
  - v. Washing buildings or structures except for immediate fire protection.
  - vi. Non-commercial fund-raisers, such as car washes.
  - vii. Using water for ornamental purposes, such as fountains, reflecting pools, and waterfalls except when necessary to support aquatic life.

6. Declared Drought Response Level Four: No outdoor water use is allowed, other than for activities exempted in Subsection 8 of this ordinance, or as the Environmental Protection Division may allow.

C. In addition to the response procedures, Oconee County may authorize altering, diminishing, or shutting off flow in the water distribution system due to water shortages, emergencies, or repairs. When exercising this discretion, the County Chairman shall make water available to private consumers through water hydrants

that are equipped to dispense water to the consumers' private containers; OCUD also shall fully consider the needs of medical facilities; and if possible, avoid the interruption of fire protection. When determining "extreme cases", the County Chairman shall consider loss of service, available water supply, and the threat posed to public health and safety by contained water usage.

## **8. Exemptions**

In accordance with the Oconee County Drought Water Conservation Ordinance, the following activities are exempt from the outdoor water use schedules described under Subsection 7:

- A. The outdoor water use schedules shall not apply to the following water uses:
  - 1. Capture and re-use of cooling system condensate and collected rainwater.
  - 2. Re-use of gray water in compliance with applicable local ordinances.
- B. The following established landscape water uses are exempt from the outdoor water use schedules:
  - 1. Use of reclaimed wastewater by a designated user from a system permitted by the EPD to provide reclaimed wastewater.
  - 2. Irrigation of personal food gardens if done by Hand Watering or Drip Irrigation.
- C. Newly (in place less than 30 days) installed landscapes are subject to the following:
  - 1. Upon application to the Oconee County Water Resources Department and issuance of a permit, irrigation of newly installed landscapes is allowed any day of the week, but only during allowed hours for the drought response level in effect, for a period of 30 days following installation. No watering is allowed during drought response level four.
  - 2. For new landscapes installed by certified or licensed professionals, commercial exemptions apply.
- D. The following golf course outdoor water uses are exempt from the outdoor water use schedules:
  - 1. Use of reclaimed wastewater by a designated user from a system permitted by EPD to provide reclaimed wastewater.
  - 2. Irrigation of fairways during times of non-drought and declared drought response level one.
  - 3. Irrigation of trees during times of non-drought and declared drought response levels one, two and three.
  - 4. Irrigation of greens.

E. The following commercial outdoor water uses are exempt from the outdoor water use schedules:

1. Professionally certified or licensed landscapers, golf course contractors, and sports turf landscapers: during installation and 30 days following installation only. Professional landscapers must be certified or licensed for commercial exemptions to apply.
2. Irrigation contractors: during installation and as needed for proper maintenance and adjustments only.
3. Sod producers.
4. Ornamental growers.
5. Fruit and vegetable growers.
6. Retail garden centers.
7. Hydro-seeding.
8. Power-washing.
9. Construction sites.
10. Producers of food and fiber.
11. Car washes that recycle a demonstrable portion of their water use.
12. Other activities essential to daily business.
13. Watering-in of pesticides and herbicides on turf.

## **9. Emergency Powers**

- A. In the event of a non-drought situation which threatens a water shortage or if a potential shortage exists, to the extent that the water system may not have sufficient supply for domestic service and fire protection, non-essential water usages may be restricted as ordered by the Chairman of the Board of Commissioners.
- B. The Water Resources Department Director, the Administrative Officer, or the Chairman of the Board of Commissioners, shall have the authority to temporarily suspend service to any water customer of the Oconee County Water Resources Department in the event that such customer is in violation of any provision of this ordinance for which suspension of service is authorized until such time as the matter is heard by the court, so long as the determination is made that such suspension will further the stated purposes of this ordinance and prevent the unnecessary waste of water.

## **10. Enforcement**

- A. In accordance with the Oconee County Drought Water Conservation Ordinance, the Oconee County Sheriff and Oconee County Water Resources Department or other County employees as required have the authority and responsibility to enforce with the outdoor water use schedules and other restrictions required under drought and/or other water supply emergency situations.

B. Penalties for violation of the outdoor water use schedules and other restrictions are as follows:

1. Declared Drought Response Levels One and Two:
  - a. First Violation - A first violation under declared drought response level one or two may be punished by a written warning. Such warning shall include notification that future violations may include the following penalties: a fine or termination of water services for a period of time as determined by the court.
  - b. Second Violation -A second violation under declared drought response level one and two may be punished by a fine of not more than \$1,000.00. The surcharge amount shall be \$250.00
  - c. Third or Subsequent Violation - A third or any subsequent violation under declared drought response level one and two may be punished by a fine of not more than \$1,000.00, and may result in termination of water services for a period of time as determined by the court. The surcharge amount shall be \$1,000.00.
2. Declared Drought Response Level Three:
  - a. First Violation -A first violation under declared drought response level three may be punished by a fine of not more than \$1,000.00. The surcharge amount shall be \$500.00.
  - b. Second Violation -A second violation under declared drought response level three may be punished by a fine of not more than \$500.00, and may result in termination of water services for period of time as determined by the court. The surcharge amount shall be \$1,000.00.
  - c. Third or Subsequent Violation - A third or any subsequent violation under declared drought response level three may be punished by a fine of not more than \$1,000.00, and may result in termination of water services for a period of time as determined by the court. The surcharge amount shall be \$1,000.00.
3. Declared Drought Response Level Four:
  - a. All Violations -A first violation under declared drought response level four may be punished by a fine of not more than \$1,000.00, and may result in termination of water services for a period of time as determined by the court. The surcharge amount shall be \$1,000.00.
  - b. Second or Subsequent Violation - A second or subsequent violation under declared drought response level four may be punished by a fine of not more than \$1,000.00 and may result in termination of water services for a period of time as determined by the court. The surcharge amount shall be \$1,000.00.

C. Upon citation for violation, the water system customer may elect to pay the specified surcharge amount by adding same to the customer's water bill or may elect to appear in court for a judicial determination of the fine and penalty.

## 11. Low Flow Protection and Monitoring

A. Depletion of Instream Flow

Under no circumstances will water be withdrawn from the Middle Oconee River - or future withdrawals from Hard Labor Creek or Apalachee River - which would cause stream flow in any of the water sources to drop below their respective 7Q10 flows.

B. Instream Flow Requirements

1. Current Water Sources:

7Q10 Flow

Bear Creek = 4.0 cfs

2. Future Water Sources:

a. 7Q10 Flow

Hard Labor Creek = 5.2 cfs

Apalachee River = 19.6 cfs

b. Non-Depleteable Flow

As required by 404 Permit Number 990012220 as issued by the United States Army Corps of Engineers (USACOE), withdrawals from the Apalachee River and releases from the Hard Labor Creek Dam shall be conducted in accordance with Table 3:

**Table 3 – Water Source Flow Multiple Trigger Framework**

WATER SOURCE	AVAILABLE USABLE STORAGE IN RESERVOIR		
	Upper One-Third	Middle One-Third	Lower One-Third
Apalachee River Let-by Flow (MIF)	25% MAF	18% MAF	10% MAF
Hard Labor Creek Dam Release	25%MAF	18% MAF	7Q10

MIF - Minimum In-Stream Flow

MAF - Mean Annual Flow

3. Other Instream Flow Limits

No other instream flow limits are currently required. Additional flow limits will be established if and when required by EPD.

### C. Low Flow Monitoring Plan

#### 1. Current Water Sources:

The current Low Flow Monitoring Plan (LFMP) is administered by the Authority in accordance with the Bear Creek Reservoir Drought Management Water Supply Model and tied in with the devices used as drought and stream level indicators in order to maximize efficiency of Oconee County's and the Bear Creek partners' distribution systems while protecting the water source. These include:

- a. Lake level indicators on Bear Creek Reservoir.
- b. Flow meters at the Bear Creek Water Treatment Plant.
- c. Staff gauges on Bear Creek downstream of the reservoir.

#### 2. Future Water Sources:

The LFMP will be amended to include provisions for protecting flows at the future Hard Labor Creek and Apalachee River water sources. The revised plan is being prepared and will be submitted for EPD approval by June 1, 2020.

The revised LFMP will be tied in with the devices used as drought and stream level indicators for the two future water sources and will serve as the tool to allow Oconee County and Walton County Water Department maximize efficiency of water supplied by the Hard Labor Creek Reservoir while protecting the two new water sources. These include:

- a. Lake level indicators on Hard Labor Creek Reservoir.
- b. Flow meters at the future Hard Labor Creek Water Treatment Plant.
- c. Staff gauges on Hard Labor Creek downstream of the reservoir and both up- and downstream of the Apalachee River intake.

## 12. Water Storage Availability

### A. Reservoir and Water Plant Storage

#### 1. Current Water System Operations:

The total useable raw water storage in Bear Creek Reservoir is estimated at 4.9 billion gallons. Oconee County has the right to utilize a maximum of 558 million gallons (12%) of the reservoir volume. Approximately 80 percent (470 MG) of the 588 MG of Bear Creek Reservoir storage is considered usable storage.

The Bear Creek WTP provides 4.0 million gallons (MG) of total finished water storage, 19% (0.76 MG) of which is available for Oconee County's use.

There are currently no treatment facilities for the Hard Labor Creek Reservoir so there is no water supply storage at this time. Design for the proposed treatment facility is approximately 50% complete and projections indicate that the new facility - to include completion of Phase II of the reservoir intake structure and installation of transmission mains connecting the new plant to the Walton and Oconee County distribution systems - will be in operation by 2025. The proposed treatment facility will include clearwells to be for use in storing treated water prior to pumping into the distribution system. Withdrawals from the Apalachee River are not projected to be needed before 2030.

2. Future Water System Operations:

The total usable raw water storage in Hard Labor Creek is estimated at 11.7 billion gallons. Storage requirements for the new water treatment facilities have been established as part of the 50% facilities design. These will be finalized once the design is completed in accordance with the projected activity schedule shown in Table 4:

**Table 4 – Projected Hard Labor Creek Water Facilities Activity Schedule**

Description	Start	Finish	2022			2023			2024		
<b>Water Treatment Plant</b>											
Design and Permitting	01/22	09/22									
Bid Phase*	10/22	12/22									
Construction	01/23	12/24									
<b>Intake Tower (Phase II)</b>											
Design and Permitting	01/22	09/22									
Bid Phase*	10/22	12/22									
Construction	01/23	12/24									
<b>Transmission Mains</b>											
Design and Permitting	01/22	12/22									
Bid Phase	01/23	03/23									
Construction	04/23	12/24									

\* Water treatment plant and Phase II intake construction to be bid and constructed under one contract.

**B. Distribution Storage**

The distribution system has three active storage tanks with a combined storage capacity of 1,750,000 gallons. The capacities and critical elevations for the three tanks are given in Table 5:

**Table 5 – Water Tank Storage Information**

TANK NAME	VOLUME, GALLONS	OVERFLOW ELEVATION, ft	ELEVATION AT 25% FULL, ft
Mars Hill 1	500,000	974	946
Mars Hill 2	1,000,000	974	944
Watkinsville	250,000	920	901

#### C. Available Alternate Sources of Finished or Raw Water

Oconee County has interconnections with several adjacent water systems. Upon completion of the Hard Labor Creek reservoir and treatment facility, the uses of these interconnections will be adjusted. Many of the water system interconnections may be used as emergency finished water providers. The interconnections are identified below by water system owner and current use.

1. Athens-Clarke County: Emergency Water Supplier and Customer
2. Barrow County: Emergency Water Supplier and Customer
3. Walton County: Wholesale water customer

### **13. Approvals**

The Oconee County Water Resources Department has read the above document and approves the requirements and recommendations set forth for the customers of the Water System.

---

Oconee County Water Resources Department Representative

---

Date

## **APPENDIX A**

**OCONEE COUNTY**  
**DROUGHT WATER CONSERVATION ORDINANCE**

**WHEREAS**, the Georgia Department of Natural Resources, Environmental Protection Division, issues permits for withdrawal of water from waters of the State and for the operation of public drinking water supply systems; and

**WHEREAS**, the Oconee County Board of Commissioners, in complying with its responsibilities to its citizens and to the customers of the drinking water system, has determined that regulation of water use is required to comply with existing regulations promulgated by the Georgia Department of Natural Resources, Environmental Protection Division, and has also determined that regulation of water use is required to encourage water conservation; and

**WHEREAS**, the existing Oconee County Outdoor Water Use Ordinance does not adequately set forth all needed rules and regulations; and

**WHEREAS**, this ordinance shall apply only to public drinking water supply systems; and

**WHEREAS**, regulations and programs that regulate water use and encourage water conservation are adopted as an exercise of the police power of the County for the purpose of ensuring adequate water supplies and of protecting the public health, safety, environment and general welfare;

**NOW THEREFORE BE IT ORDAINED** by the Oconee County Board of Commissioners that the following Oconee County Drought Water Conservation Ordinance is and the same is adopted.

**I. Short Title, Authority and Applicability.**

- A. This ordinance shall be known and may be cited as the Oconee County Drought Water Conservation Ordinance.
- B. Oconee County has the authority to adopt this ordinance pursuant to Article 9, Section 2, Paragraph I and Article 9, Section 2, Paragraph III of the Constitution of the State of Georgia, Section 31 of Chapter 5 of Title 12 of the Official Code of Georgia Annotated, and the Georgia Department of Natural Resources Rules for Outdoor Water Use, Ga. Comp. R. & Regs. Ch. 391-3-30 (hereinafter, the "rules").

**II. Purpose and Intent.**

- A. The purpose of this ordinance is to protect the public health, safety, environment, and general welfare through adopting and enforcing water use measures that encourage water conservation and ensure adequate supplies of water for the citizens of the County.
- B. It is the policy of the County to promote water conservation by regulating water use and by complying with the laws and regulations imposed by the State of Georgia regarding drought management.

### **III. Definitions.**

#### **A. When used in this ordinance:**

1. *Address*, means the "street address or service address" (a numeric or alphanumeric designation) that, together with the street name, describes a physical location of a specific property. "Even numbered address" means a house number ending with the number 0, 2, 4, 6, 8, or no house number. "Odd numbered address" means a house number ending with the number 1, 3, 5, 7, or 9.
2. *Declared Drought Response Level* means one of four levels of drought that can be declared by the Georgia Environmental Protection Division based on the severity of drought conditions, with one being the least severe and four being the most severe.
3. *Upper Oconee Basin Water Authority (UOBWA)* means the regional water supply agency created under the laws of the State of Georgia, to which Oconee County is an equity share member and whose function is to withdraw, store and treat the major portion of Oconee County's drinking water supply.
4. *Environmental Protection Division* means the Georgia Environmental Protection Division ("EPD") a division of the Georgia Department of Natural Resources, an agency of the State of Georgia, which is charged with issuing permits that authorize withdrawal of water and with administering the rules.
5. *Water Use Percentage Reductions* means the required reductions in the average daily water consumption by the Oconee County water system, as expressed on a monthly basis, and adopted annually, by the Oconee County Board of Commissioners. These reduction targets correspond to the Drought Response Levels, as declared by the Oconee County Board of Commissioners during periods of drought.
6. *Drip Irrigation*, also known as trickle irrigation, means an irrigation method that minimizes water use by allowing water to drip slowly to the roots of plants through a network of emitters or micro-spray heads, or may include the use of portable soaker bags.
7. *Hand Watering* means an irrigation method that distributes water directly to a plant or plants, but not to lawns, by means of a watering can or garden hose.
8. *Spray Irrigation* means an irrigation method that distributes water very quickly over a broad area by means of fixed or moving sprinkler devices.
9. *Gray Water* means spent water captured after domestic or other household use.
10. *Reclaimed Wastewater* means wastewater or sewage treated to reuse standards as defined and permitted by Georgia EPD.

#### **IV. Water Conservation Schedule During Non-Drought Periods.**

- A. Water conservation measures other than exempted activities shall occur as follows:
  - 1. Odd-numbered addresses: Outdoor water use is allowed on Tuesdays, Thursdays and Sundays.
  - 2. Even-numbered addresses: Outdoor water use is allowed on Mondays, Wednesdays and Saturdays.
  - 3. Drip Irrigation and Hand Watering is allowed on any day and at any time.

#### **V. Water Conservation Schedule During Declared Drought Response Levels.**

- A. When the Environmental Protection Division makes drought declarations as authorized by state law and the rules and regulations of the EPD, or the Upper Oconee Basin Water Authority or the Oconee County Board of Commissioners, acting through its Chairman, make a drought declaration based on water usage and availability, water conservation measures, other than activities deemed exempt, shall occur during scheduled hours on scheduled days. Notice of any such drought declaration shall be published in the County legal organ and posted at the Oconee County Utility Department and the Oconee County Courthouse.
- B. Water Use Percent Reductions, adopted by the Oconee County Board of Commissioners, shall be implemented corresponding to Drought Response Levels:
  - 1. Level One shall target a 5% reduction.
  - 2. Level Two shall target at 10% reduction.
  - 3. Level Three shall target a 15% reduction.
  - 4. Level Four shall target a 20% reduction.
- C. Declared drought response level one. Outdoor water use may occur on scheduled days within the hours of 12:00 midnight to 10:00 a.m.
  - 1. Scheduled days for odd-numbered addresses are Tuesdays, Thursdays and Sundays.
  - 2. Scheduled days for even-numbered addresses are Mondays, Wednesdays and Saturdays.
  - 3. Use of hydrants for any purpose other than firefighting, public health, safety or flushing is prohibited.
  - 4. No outdoor water use shall be allowed on Fridays.
  - 5. Drip Irrigation and Hand Watering is allowed from 12:00 midnight to 10:00 a.m. and 4:00 p.m. to 12:00 midnight on scheduled days.
- D. Declared drought response level two. Outdoor water use may occur on scheduled days within the hours of 12:00 midnight to 10:00 a.m.
  - 1. Scheduled days for odd-numbered addresses are Thursdays and Sundays.
  - 2. Scheduled days for even-numbered addresses and golf course fairways are Wednesdays and Saturdays.

3. No outdoor water use shall be allowed on Mondays, Tuesdays and Fridays, with the exception of drip or hand irrigation that is allowed the additional day of Tuesdays for odd numbered addresses and Mondays for even numbered addresses.
4. The following uses are prohibited:
  - i. Using hydrants for any purpose other than firefighting, public health, safety or flushing.
  - ii. Washing hard surfaces, such as streets, gutters, sidewalks, houses and driveways except when necessary for public health and safety.

E. Declared drought response level three. Outdoor water use may occur on the scheduled day within the hours of 12:00 midnight to 8:00 a.m. The scheduled day for odd-numbered addresses is Sunday.

1. The scheduled day for even-numbered addresses and golf course fairways is Saturday.
2. No outdoor water use shall be allowed on any day except Saturday and Sunday.
3. The following uses are prohibited:
  - i. Using hydrants for any purpose other than firefighting, public health, safety or flushing.
  - ii. Washing hard surfaces, such as streets, gutters, sidewalks, houses, driveways, except when necessary for public health and safety.
  - iii. Filling installed swimming pools except when necessary for health care or structural integrity.
  - iv. Washing vehicles, such as cars, boats, trailers, motorbikes, airplanes, golf carts.
  - v. Washing buildings or structures except for immediate fire protection.
  - vi. Non-commercial fund-raisers, such as car washes.
  - vii. Using water for ornamental purposes, such as fountains, reflecting pools, and waterfalls except when necessary to support aquatic life.
4. Drip Irrigation and Hand Watering is allowed within the hours of 12:00 midnight and 10:00 a.m. on scheduled days.

**VI. Declared Drought Response Level Four:** No outdoor water use is allowed, other than for activities exempted in subsection VI of this ordinance, or as the Environmental Protection Division may allow.

**VII. Exemptions**

A. This ordinance shall not apply to the following water uses:

1. Capture and re-use of cooling system condensate and collected rainwater.
2. Re-use of gray water in compliance with applicable local ordinances.

B. The following established landscape water uses are exempt from the outdoor water use schedules of this ordinance:

1. Use of reclaimed wastewater by a designated user from a system permitted by the EPD to provide reclaimed wastewater.
2. Irrigation of personal food gardens if done by Hand Watering or Drip Irrigation.

C. Newly (in place less than 30 days) installed landscapes are subject to the following:

1. Upon application to the Oconee County Utility Department and issuance of a permit, irrigation of newly installed landscapes is allowed any day of the week, but only during allowed hours for the drought response level in effect, for a period of 30 days following installation. No watering is allowed during drought response level four.
2. For new landscapes installed by certified or licensed professionals, commercial exemptions apply.

D. The following golf course outdoor water uses are exempt from the outdoor water use schedules of this ordinance.

1. Use of reclaimed wastewater by a designated user from a system permitted by EPD to provide reclaimed wastewater.
2. Irrigation of fairways during times of non-drought and declared drought response level one.
3. Irrigation of trees during times of non-drought and declared drought response levels one, two and three.
4. Irrigation of greens.

E. The following commercial outdoor water uses are exempt from the outdoor water use schedules of this ordinance.

1. Professionally certified or licensed landscapers, golf course contractors, and sports turf landscapers: during installation and 30 days following installation only. Professional landscapers must be certified or licensed for commercial exemptions to apply.
2. Irrigation contractors: during installation and as needed for proper maintenance and adjustments only.
3. Sod producers.
4. Ornamental growers.
5. Fruit and vegetable growers.
6. Retail garden centers.
7. Hydro-seeding.
8. Power-washing.
9. Construction sites.

10. Producers of food and fiber.
11. Car washes that recycle a demonstrable portion of their water use.
12. Other activities essential to daily business.
13. Watering-in of pesticides and herbicides on turf.

## **VIII. Emergency Powers**

- A. In the event of a non-drought situation which threatens a water shortage or if a potential shortage exists, to the extent that the water system may not have sufficient supply for domestic service and fire protection, non-essential water usages may be restricted as ordered by the Chairman of the Board of Commissioners.
- B. The Utility Department Director, the Administrative Officer, or the Chairman of the Board of Commissioners, shall have the authority to temporarily suspend service to any water customer of the Oconee County Utility Department in the event that such customer is in violation of any provision of this ordinance for which suspension of service is authorized until such time as the matter is heard by the court, so long as the determination is made that such suspension will further the stated purposes of this ordinance and prevent the unnecessary waste of water.

## **VIII. Enforcement**

The Board of Commissioners delegates the authority and responsibility to enforce the provisions set forth in this ordinance to the Oconee County Sheriff and Oconee County Utility Department or other County employees designated by resolution to enforce County ordinances.

## **IX. Penalties for Violation**

- A. Any person convicted by a court of competent jurisdiction of violating any provision of this ordinance is guilty of an ordinance violation and may be punished pursuant to this ordinance by a fine pursuant to o.C.G.A. § 15-10-60, or by termination of water service, or both, subject to the following specific limitations.
- B. The penalties for violation of this ordinance are as follows:
  1. Declared Drought Response Levels One and Two.
    - i. First Violation – A first violation under declared drought response level one or two may be punished by a written warning. Such warning shall include notification that future violations may include the following penalties: a fine or termination of water services for a period of time as determined by the court.
    - ii. Second Violation – A second violation under declared drought response level one and two may be punished by a fine of not more than \$1,000.00. The surcharge amount shall be \$250.00
    - iii. Third or Subsequent Violation – A third or any subsequent

violation under declared drought response level one and two may be punished by a fine of not more than \$1,000.00, and may result in termination of water services for a period of time as determined by the court. The surcharge amount shall be \$1,000.00.

2. Declared Drought Response Level Three.

- i. First Violation – A first violation under declared drought response level three may be punished by a fine of not more than \$1,000.00. The surcharge amount shall be \$500.00.
- ii. Second Violation – A second violation under declared drought response level three may be punished by a fine of not more than \$500.00, and may result in termination of water services for period of time as determined by the court. The surcharge amount shall be \$1,000.00.
- iii. Third or Subsequent Violation – A third or any subsequent violation under declared drought response level three may be punished by a fine of not more than \$1,000.00, and may result in termination of water services for a period of time as determined by the court. The surcharge amount shall be \$1,000.00.

3. Declared Drought Response Level Four

- i. All Violations - A first violation under declared drought response level four may be punished by a fine of not more than \$1,000.00, and may result in termination of water services for a period of time as determined by the court. The surcharge amount shall be \$1,000.00.
- ii. Second or Subsequent Violation – A second or subsequent violation under declared drought response level four may be punished by a fine of not more than \$1,000.00 and may result in termination of water services for a period of time as determined by the court. The surcharge amount shall be \$1,000.00.

C. Upon citation for violation, the water system customer may elect to pay the specified surcharge amount by adding same to the customer's water bill or may elect to appear in court for a judicial determination of the fine and penalty.

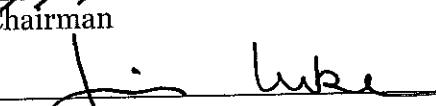
X. **Severability.** If any section, provision, or clause of any part of this Ordinance shall be declared invalid or unconstitutional, or if the provisions of any part of this Ordinance as applied to any particular situation or set of circumstances shall be declared invalid or unconstitutional, such declaration shall not be construed to affect the portions of this Ordinance not so held to be invalid, or the application of this Ordinance to other circumstances not so held to be invalid. It is hereby declared as the intent of the Board of Commissioners that this Ordinance would have been adopted had such invalid portion not been included herein.

**XI. Repealer.** All Ordinances or parts of Ordinances in conflict with this Ordinance, and not preserved hereby, are hereby repealed, including the "Oconee County Outdoor Water Ordinance" adopted November 27, 2007.

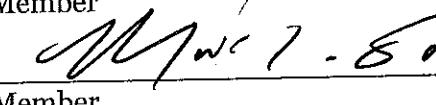
After a first reading on the 26th day of September, 2016, this Ordinance is hereby adopted and approved by the Board of Commissioners of Oconee County, Georgia, this 4th day of October, 2016, to be effective immediately, the public welfare demanding it.

OCONEE COUNTY BOARD OF  
COMMISSIONERS

  
Chairman

  
Member

  
Member

  
Member

Attest:

  
Karen Hayes  
County Clerk

(SEAL)