



BROAD RIVER WATER AUTHORITY

WATER SHORTAGE RESPONSE PLAN (WSRP)

(PWSID: 01-81-035)

I. AUTHORIZATION

The Board of Directors of the Broad River Water Authority (BRWA) is responsible for enacting this Water Shortage Response Plan (WSRP). The contact is the General Manger. In the absence of the General Manager, the WTP Superintendent is responsible for enacting the Plan:

Maria Hunnicutt, Manager
Broad River Water Authority
P.O. Box 37
138 Duke Street
Spindale, NC 28160
828-286-0640

Brad Joyner, WTP Superintendent
Broad River Water Authority
P.O. Box 37
138 Duke Street
Spindale, NC 28160
828-286-0640

The Board will have the authority to declare water shortages. All municipalities or water companies purchasing water from the Broad River Water Authority's water system will, at a minimum, adopt and enforce water use reduction measures contained in this plan as a condition of water sales. Where minimum (take or pay) requirements are specified in a water sales agreement these threshold minimum use requirements will be suspended during the duration of water shortage declarations. When the thresholds established in Section III & IV of this plan are reached the Manager, or an agent designated by the Manger, shall recommend that the Board of Directors declare a water shortage and institute the provisions of this plan. In addition, the Board reserves the right to enact or lift voluntary or mandatory restrictions at any time under circumstances deemed appropriate by the Board.

II. NOTIFICATION

Existing customers will be notified of the enactment of this WSRP by bill stuffers to all customers, press releases to media outlets, signs posted at the business office, and on the website at www.ncbrwa.com.

Upon the declaration of a water shortage by the Board, a press release will be forwarded to the following media outlets: WLOS Channel 13 News (TV), and the Daily Courier (newspaper).

Public outreach will include any of the following methods of communication:

- Independent Mailings to Users
- Water Audits
- Website
- Presentations
- Bill Announcements to all Customers
- Press Releases
- Flyers/Handouts
- Signs & Posters
- Radio (public service announcements)

III & IV. LEVELS OF RESPONSE AND TRIGGERS

When the following water supply thresholds (TRIGGERS) are reached, the Board shall initiate the following STAGE reduction measures as outlined under the corresponding RESPONSE. The staged reduction measures will be communicated as indicated in Section C: Activation of Conservation Measures.

BRWA has two wholesale customers:

- Polk County (direct) and Inman-Campobello Water District (secondary) via a 3-party agreement
- Grassy Pond Water Company

Both wholesale customers will be asked to reduce their usage accordingly at each stage of the response plan. These customers will be asked to evaluate the viability of obtaining water through interconnects with surrounding water systems.

STAGE I: WATER SHORTAGE CONDITION VOLUNTARY WATER USE REDUCTION FOR BRWA CUSTOMERS
TRIGGERS
<p>A reduction in the flow of the Broad River at the raw water intake, as quantified as three times the flow measured by the United States Geological Survey (USGS) gauge at the Cove Creek tributary to Broad River, to 65 million gallons per day (MGD) for a period of seven (7) consecutive days (65 MGD represents the 7Q10 of the river¹); The Board shall declare the Stage I reductions prior to the 7th day of the conditions above if it is determined to be necessary.</p>

RESPONSE
<ol style="list-style-type: none"> 1. Limit car washing to a minimum. 2. Limit lawn and garden watering to that which is necessary. 3. Do not wash down outside areas such as sidewalks, patios, parking lots, service bays, aprons, etc. 4. Do not leave faucets running while shaving, brushing teeth, showering, or rinsing dishes. 5. Water shrubbery to a minimum required reusing house-hold water when possible. 6. Limit use of clothes washers and dish washers and when used, operate fully loaded. 7. Use showers for bathing rather than bathtubs and limit showers to no more than four minutes. 8. Limit flushing of toilets by multiple usage. 9. Usage of disposable and biodegradable dishes is encouraged. 10. The use of flow restrictive and water saving devices is encouraged. 11. Limit hours of operation of water cooled air conditioners. 12. All residents, businesses, and institutions are requested to temporarily delay new landscape work until the water shortage has ended. 13. Wholesale customers will be asked to decrease their usage by implementing similar restrictions.

Notes:

1. *Source: Rutherford County Land Use Plan, 2001*

**STAGE II: WATER SHORTAGE CONDITION
MANDATORY WATER USE REDUCTION FOR BRWA CUSTOMERS**

TRIGGERS

A reduction in the flow of the Broad River at the raw water intake to 32 million gallons per day (MGD) for a period of seven (7) consecutive days (32 MGD is the flow needed such that 20% of the flow could yield 6.4 MGD for BRWA's use);

The Board shall declare the Stage II reductions prior to the 7th day of the conditions above if it is determined to be necessary.

RESPONSE

The following activities are prohibited:

1. To water lawns, grass, shrubbery, trees, flowers, and vegetable gardens with a hose, sprinkler, etc. is prohibited; however, the use of a bucket or container of 5 gallon capacity or less is permitted.
2. To fill newly constructed swimming and/or wading pools or refill swimming and/or wading pools which have been drained.
3. To wash automobiles, trucks, trailers, boats, airplanes, or any other type of mobile equipment. The operations of commercial businesses are excluded, such as car washes, etc.
4. To wash down outside areas such as streets, driveways, service station aprons, parking lots, office buildings, exteriors of newly constructed homes or apartments, sidewalks, patios, or to use water for similar purposes.
5. To use water from public or private fire hydrants for any purpose other than fire suppression or other public emergency. Hydrant use for system flushing by BRWA staff will be delayed if possible, but is permitted if necessary to maintain appropriate water quality. Flushing of newly constructed water lines will only be allowed with permission from BRWA staff.
6. To operate or induce water into any ornamental fountain pool or pond or other structure making similar use of water.
7. To serve water in restaurants, cafeterias, or other food establishments, except upon request.
8. To operate water cooled air conditioners or other equipment that does not recycle cooling water, except when health and safety would be adversely affected.
9. To use water for any unnecessary purpose or to intentionally waste water.

Wholesale customers will be asked to decrease their usage by the reduction goal of 10%.

**STAGE III: EMERGENCY WATER SHORTAGE CONDITION
MANDATORY WATER USE REDUCTION FOR BRWA CUSTOMERS**

TRIGGERS

A reduction in the flow of the Broad River at the raw water intake to 24 million gallons per day (MGD) for a period of seven (7) consecutive days (24 MGD is the flow needed such that 20% of the flow could yield

4.8 MGD for BRWA's use);

The Board shall declare the Stage III reductions prior to the 7th day of the conditions above if it is determined to be necessary.

RESPONSE

All Stage II restrictions shall apply to Stage III. The following activities are also prohibited:

1. To induce water into any pool.
2. To use water outside any structure for any use other than an emergency involving a fire.
3. The use of disposable utensils and plates is encouraged at all eating establishments.

Wholesale customers will be asked to evaluate utilizing water from other cross-connected systems. BRWA will review autometer reading data to identify potential leaks and inform property owners. Wholesale customers will be asked to decrease their usage by the reduction goal of 25%.

**STAGE IV: CRISIS WATER SHORTAGE CONDITION
MANDATORY WATER USE REDUCTION FOR BRWA CUSTOMERS**

TRIGGERS

A reduction in the flow of the Broad River at the raw water intake to 16 million gallons per day (MGD) for a period of seven (7) consecutive days (16 MGD is the flow needed such that 20% of the flow could yield

3.2 MGD for BRWA's use); OR the Authority is unable to meet minimum pressure requirements in the water distribution system;

The Board shall declare the Stage IV reductions prior to the 7th day of the conditions above if it is determined to be necessary.

RESPONSE

All Stage II and Stage III restrictions shall apply to Stage IV. The following will also apply:

Flow to wholesale water customers will be asked to implement alternate supply if available.

V. ENFORCEMENT

In lieu of enforcement penalties, a Drought Surcharge rate structure has been developed and approved by the Board. This structure follows the rates implemented July 1, 2019. The Drought Surcharge rates will increase as retail rates increase in the future. Note that Tier 1 is a fixed minimum charge for the first 1,000 gallons based on meter size. This Tier remains unchanged.

Residential:

	No Drought	Stage 2 Drought	Stage 3 Drought
Tier 2 (1,001 – 20,000)	\$ 5.30	\$ 7.16	\$ 11.04
Tier 3 (> 20,001)	\$ 4.25	\$ 6.30	\$ 12.14

Non-Residential:

	No Drought	Stage 2 Drought	Stage 3 Drought
Tier 2 (1,001 – 20,000)	\$ 5.30	\$ 7.16	\$ 11.04
Tier 3 (20,001 – 1,000,000)	\$ 5.10	\$ 6.89	\$ 12.29
Tier 4 (> 1,000,0001)	\$ 2.25	\$ 4.68	\$ 14.52

VI. PUBLIC COMMENT

This plan will be made to the public for review and comment at BRWA's business office and on BRWA's website at www.ncbrwa.com for a period of 30 days prior to enactment. Comments can be provided to the address in section A.

VII. VARIANCE PROTOCOLS

1. Submission and contents of request: A request for a variance must be submitted to the board in writing. The Board will consider variance requests at scheduled meeting times.

Each request must contain the following information:

- a. The reason for the request;
- b. The alternative measures that will be taken if a variance is granted;
- c. The length of time for which a variance is requested; and
- d. Any other relevant information necessary to properly evaluate the request for the variance.

2. Decision on variance: The board shall grant a variance if it determines that:

- a. the variance will not adversely affect directly or indirectly, the health, safety, or well-being of the existing customers
- b. The alternative measures to be taken, if any, are equivalent or superior to those prescribed in the part for which the variance is requested; and
- c. Compliance with the part for which the variance is requested would impose an undue burden upon the applicant.

The board shall deny, revoke, or refuse to renew a variance if the board determines that item a, b, or c has not been met.

3. Notification: The board shall notify the applicant in writing within 30 days of the board's decision. If a variance is granted, the notification shall specify the period of time for which the variance will be effective and the alternative measures or conditions, if any, to be met by the applicant.

4. Renewal: Any request for the renewal of a variance shall be submitted in writing prior to the expiration date of the existing variance. Renewal requests shall contain the information specified in subpart 1. A variance may be renewed by the board if the applicant continues to satisfy the criteria contained in subpart 2 and demonstrates compliance with the alternative measures or conditions imposed at the time the original variance was granted.

VIII. EFFECTIVENESS

The Manager shall determine the effectiveness of the water shortage response protocols. If reduction goals are not met for each stage, the Board may consider moving to the next stage of conservation.

	Reduction Goal (Average Daily Water Usage)
Stage I Voluntary	5%
Stage II Mandatory	10%
Stage III Emergency	25%
Stage IV Crisis	>25%

Wholesale customers will also be asked to decrease their usage by the reduction goals listed above.

IX. REVISION

The water shortage response plan will be reviewed and revised as needed to adapt to new circumstances affecting water supply and demand, following implementation of emergency restrictions, and at a minimum of every five years in conjunction with the updating of our Local Water Supply Plan.