

**Environmental Management Commission  
Water Allocation Committee  
Minutes**

**July 11, 2018  
9:00 a.m.**

On July 11, 2018, the Water Allocation Committee or WAC met in the Ground Floor Hearing Room at the Archdale Building in Raleigh, North Carolina.

**WAC Members in Attendance:**

Julie Wilsey, EMC Vice-Chair (Acting WAC Chair)  
David Anderson  
Shannon Arata  
Charles Carter  
Charles Elam  
Bill Puette  
JD Solomon, EMC Chairman

**Others Present:**

Marion Deerhake  
Dr. Suzanne Lazorick  
Dr. Stan Meiburg  
George Pettus  
Dr. Albert Rubin  
Philip Reynolds, Attorney General's office

**I. Preliminary Matters:**

In accordance with North Carolina General Statute §138A-15, Chairwoman Wilsey asked if any WAC member knew of a known conflict of interest or appearance of conflict with respect to items on the July 11, 2018 WAC agenda. Chairman Solomon stated that he would recuse himself from the Pender County IBT agenda item due to a conflict of interest. At Chairwoman Wilsey's request, Mr. Elam made a motion to approve the May 9, 2018 meeting minutes. The motion was seconded by Mr. Puette and the May 9, 2018 minutes were unanimously approved.

**II. Action Items:**

**A. Request to approve the 2018 Central Coastal Plain Capacity Use Area Assessment Report (Nat Wilson, DWR)**

The Central Coastal Plain Capacity Use Area (CCPCUA) is made up of 15 counties in the central portion of the coastal plain where there is a ground water use permitting process to reduce ground water use in the region to encourage ground water level recovery. Currently there are 305 permit holders for ground water use above 100,000 gallons per day and 69 annual registrations for use between 10,000 and 100,000 gallons

per day. The Black Creek and Upper Cape Fear aquifers were the aquifers in danger due to declining ground water levels and consequently targeted for use restrictions.

The CCPCUA program established approved base ground water use rates according to 1997/1999 ground water use rates; the counties were required to reduce use by 30-75% from the base use rate over three reduction phases ending in 2008, 2013, and 2018. Reductions have been accomplished by switching water sources to surface water and/or surficial aquifers. There is a ground water monitoring network consisting of 662 wells at 228 sites.

Results of monitoring indicate that water levels in the Upper Cape Fear aquifer are recovering. Potentiometric surface maps illustrate a cone of depression (area impacted by pumping ground water) that is smaller and shallower due to less pumping from the Upper Cape Fear aquifer. Similarly, ground water levels in the Black Creek aquifer have also been recovering, along with a smaller and shallower cone of depression observed in this aquifer. The Pee Dee aquifer has displayed smaller cones of depression that are not growing, indicating sustainable use of the aquifer. There have been smaller cones of depression observed in the Castle Hayne aquifer over time as ground water users have switched to this aquifer. The Black Creek and Upper Cape Fear aquifers are more confined and therefore slower to recharge, while the Castle Hayne has higher transmissivity and recharges more quickly. Between 2007 and 2017, the Cretaceous aquifer has shown a rebound in ground water levels; water levels have recovered by approximately 80 feet in places. The current annual ground water withdrawal rates from the Cretaceous aquifer are already below the final reduction target for the third use reduction phase.

Monitoring and data collected in the CCPCUA have documented ground water level improvements. The center of the rebound area is stable and overall withdrawal outside the saltwater encroachment zone appears to be stable. Based on the 2018 CCPCUA Assessment, DWR is recommending that no action needs to be taken by the EMC to change the CCPCUA rules, reduction zone map or reduction percentages. The 2018 CCPCUA Assessment Report was available on the DWR website beginning April 18, 2018. There were over 1,400 downloads of the document, but no public comments were received during the public comment period.

Chairman Solomon asked about the authority for DWR to issue temporary permits, of which nine have been issued where aquifer conditions meet specific requirements. Mr. Wilson replied that the temporary permitting is allowed in the Water Use Act and the rules. Chairman Solomon also asked at what point the temporary permits become permanent. Mr. Wilson replied that the temporary permits are a different class of permit, but that they require more review and are more difficult to obtain.

Commissioner Puette asked whether saltwater intrusion is increasing. Mr. Wilson responded that it appears to be stable and the Lower Cape Fear aquifer is becoming fresher/less saline. Commissioner Meiburg asked looking out 50 years, what impact sea level rise will have to increasing salinity levels. Mr. Wilson responded that shallow

aquifers are more susceptible and that impacts of saltwater encroachment are already observed in the surficial aquifer from seasonal over wash events. Chairwoman Wilsey asked that since users in the CCPCUA have been switching water supply sources, whether DWR is confident about overall water use conservation. Mr. Wilson replied that the demand curve has remained mostly flat and users are required to meet conservation requirements.

Chairman Solomon made a motion to approve staff's recommendation that no action needs to be taken by the EMC to change the CCPCUA rules, reduction zone map, or reduction percentages. The motion was seconded by Commissioner Puette. The motion passed unanimously.

**B. Request approval to proceed to EMC for the Final Determination for an IBT certificate to Pender County (Kim Nimmer, DWR)**

Pender County submitted a petition for an Interbasin Transfer (IBT) certificate to transfer up to 14.5 million gallons per day (mgd) from the Cape Fear River IBT basin to the South River, New River, and Northeast Cape Fear River IBT basins. The transfer amount is based on water use demand projections through 2045. In addition to Pender County, other co-applicants for the IBT certificate include the Towns of Burgaw, Topsail Beach, Surf City, and Wallace as well as Utilities, Inc (for water service to the Belvedere Plantation and Olde Pointe developments). Hydrologic modeling that was conducted as part of the Environmental Assessment indicated that the proposed IBT certificate will not significantly change Cape Fear River elevations above or below Lock & Dam #1, downstream river flows, or water quality. Modeling results indicate the potential for additional low flow/lower stage days to occur. However, the predicted stage always remains above the dam crest elevation, allowing for continuous access to the fish ladder for passage at Lock & Dam #1. Modeling results further indicate that in-stream flow patterns will not be significantly impacted, which protects in-stream aquatic habitat, aquatic resources and water quality. The only other water supply intake downstream of Lock & Dam #1 for International Paper, which also supplies the Town of Riegelwood, is not projected to be affected by the proposed IBT.

Seven alternatives were considered for meeting Pender County's projected water demands through 2045. The preferred alternative would increase the amount of the transfer (currently below 2 mgd) to 14.5 mgd from the Cape Fear River IBT basin to the three receiving basins. There is an existing water treatment plant as well as existing transmission infrastructure, which is expanding into parts of Pender County currently not served by Pender County Utilities where residents are on private groundwater wells. The other alternatives considered either did not meet the projected water supply needs for Pender County through 2045, had greater environmental impacts, and/or were costlier than the recommended alternative. The Commission held one public hearing on the petition for an IBT certificate. The hearing was held on March 22, 2018 in the Town of Burgaw; a 30-day public comment period followed the hearing. Of the six combined oral and written public comments received, one comment opposed the proposed IBT while the other five comments were in support of the proposed IBT certificate.

The Division of Water Resources requested that the Water Allocation Committee move the requested IBT certificate for Pender County and its co-applicants to transfer up to 14.5 mgd from the Cape Fear River IBT Basin to the South River, New River, and Northeast Cape Fear River IBT basins to the full EMC at their July 12, 2018 meeting for a final determination.

Commissioner Elam spoke in support of the requested IBT certificate, stating that he is aware of the need for the water supply as a resident of Pender County. Commissioner Elam then made a motion (with clarification from EMC Counsel Philip Reynolds) that the IBT certificate request be sent to the full Commission for consideration at its July 12, 2018 meeting. The motion was seconded by Commissioner Carter. The motion passed unanimously.

## **II. Information Items:**

### **A. Overview of the 2018 Watauga River Basin Water Resources Plan (Michelle Raquet, DWR)**

The 2018 Watauga River Basin Water Resources Plan includes both water quality and water quantity, water use, and monitoring data. The Watauga is the second smallest river basin in the state. Information in the plan was derived from different sources both internally and externally. There is a little over 2 million gallons of water per day used in the basin, with 51% used by public water systems or community wells. There are 20 public water systems in the basin, of which five are required to submit Local Water Supply Plans. Recreation in the basin affects seasonal water use, with increased water use in the summer (golf course irrigation) and winter (snow making). The Town of Beach Mountain is the only system in the basin that relies on surface water; all other public and private water systems rely on ground water. There are currently no groundwater monitoring wells in the basin through DWR's Groundwater Management Branch. A hydrologic model for the basin is in the process of being developed.

The 2018 Basin Plan includes the detailed text that is typical of the basin plans; additionally, there is a more interactive component referred to as a story map, which allows for more frequent updates. The story map makes the source data more easily accessible.

Much of the text in the 2018 Basin Plan has already been reviewed by local stakeholders as well as DWR staff. The next step is to go out for a public comment period in late July through August. Any public comments received will be addressed. The final 2018 Watauga Basin Plan will come before the EMC for final approval.

Chairman Solomon suggested using consistent color coding for the water use sectors illustrated on the pie charts in the presentation, and to use the actual water use numbers rather than percentages. Commissioner Puette asked about the schedule for the update to the New River Basin Plan. Ms. Raquet replied that staff will have to get back to the

Commission regarding the schedule for the update to the New River Basin Plan, and stated that she is the New River Basin planner. Ms. Raquet also commented that the New River Basin has an active local stakeholder base.

**B. Update on periodic review of 02G rules including public comments received (Linwood Peele, DWR)**

The 02G Rules are currently in the first of three steps, which is agency determination. There is a total of 27 rules with five different sections, of which 20 rules (sections .0100, .0500, and .0600) were found to be necessary without substantive public interest and 7 rules (sections .0300 and .0400) were found to be unnecessary. Based on the initial determination, the rules identified as necessary without substantive public interest were found to need technical corrections, such as removing or updating obsolete references.

A public comment period was open from March 15 through May 24, 2018. No comments were submitted for three sections of the rules (.0100, .0300, and .0400). The remaining two sections (.0500 and .0600) received one comment each, both favorable and in support of the respective rules.

The next step in the process is for the full EMC to approve the determinations at the September 13, 2018 meeting. Following that decision, a report will be due to the RRC no later than November 15, 2018.

Chairman Solomon asked whether the Beach Inlet and Waterway Association was copied on the comments submitted regarding the review of the rules. Mr. Peele replied that he would have to check with DWR staff who handled the public comments.

**III. Concluding Remarks:**

Chairman Wilsey asked if there was anything else that needed to be discussed or if there were other comments. There were no additional comments by the committee members or staff. The meeting was adjourned.