

Town of Mooresville North Carolina

Office of the Town Manager

September 6, 2024

Mr. John D. Solomon, Chair NC Environmental Management Commission c/o EMC Recording Clerk Director's Office – Division of Water Resources 1617 Mail Service Center Raleigh, NC, 27699-1617

SUBJECT: Notice of Intent to Request an Interbasin Transfer Certificate – Town of Mooresville

Dear Mr. Solomon:

The Town of Mooresville (Town) respectfully requests that you consider this letter our Notice of Intent (NOI) to request an Interbasin transfer (IBT) certificate. The Town is evaluating several alternatives to expand wastewater treatment capacity for our rapidly growing service area. Some of these alternatives would require an increase to our approved legacy IBT. In consultation with the Division of Water Resources (DWR) staff, we determined the most appropriate way to proceed with our evaluation of alternatives is through the framework of an IBT evaluation.

The Town is in Iredell County immediately north of Mecklenburg County and Charlotte, along I-77. It has a current population approaching 55,000 people. The Town has a water supply intake in Lake Norman and has historically received its water supply from the Catawba River. Our withdrawal from the Catawba River predates Lake Norman which was impounded by Duke Energy in the early 1960s. The ridgeline between the Catawba and Yadkin-Pee Dee River basins is located through the middle of the Town, with railroad tracks being the approximate basin divide. Wastewater is treated at the Rocky River Wastewater Treatment Plant (RRWWTP) and discharged to Dye Branch, which is a tributary to the Rocky River. Treated effluent eventually flows into the Pee Dee River between Lake Tillery and Blewett Falls Lake in North Carolina. The Town currently has a permitted wastewater discharge capacity of 7.5 MGD and needs to begin expansion of this capacity in the next five years to meet its growing population.

As of July 1, 1993, the capacity of our water and wastewater facilities to transfer water (referred to as our approved legacy IBT) has been determined to be 9.54 MGD (on a maximum day basis and equivalent to 8.0 MGD on a maximum calendar monthly basis). To meet growth needs, the Town needs to expand its wastewater treatment capacity. A preliminary screening of alternatives identified in a comprehensive master plan reduced the alternatives to three, and an engineering alternatives analysis has been performed on the following alternatives (as shown in the attached map):

- Expand treatment capacity at the RRWWTP and continue to discharge to Dye Branch. This would require an IBT certificate with a total transfer of about 12.6 MGD (maximum calendar monthly basis) with a transfer of 9.2 MGD to the Rocky River Sub-basin and 3.4 MGD to the South Yadkin Sub-basin (a separate basin under the NC IBT Statute).
 - [Note: these are preliminary numbers that could be refined based on an ongoing comprehensive planning process and updates to projections during the environmental documentation process]
- Expand treatment capacity at the RRWWTP and build a pipeline to discharge a portion of the treated wastewater into Lake Norman in the Catawba River Basin. This would allow the Town to stay under the approved legacy IBT.
- Divert a portion the Town's wastewater to Charlotte Water's system to be treated at the McDowell Wastewater Facility. This facility discharges to a tributary to Mountain Island Lake below Lake Norman in the Catawba River Basin, therefore allowing the Town to stay under the approved legacy IBT.

Regarding the Lake Norman option, the Town has requested speculative permit limits from the DWR for increased discharge to Dye Branch and a discharge to Lake Norman. The Town has hired a consultant who is developing the necessary water quality modeling tools for DWR to conduct this evaluation.

The Town is aware of the IBT requirements and will follow NCGS 143-215.22L(c). Public meetings will be conducted within 90 days of this NOI to solicit input on these, as well as other, alternatives to address our wastewater capacity issues and IBT. The Town is also following the requirements of the December 3, 2010 Settlement Agreement between South Carolina and North Carolina. To this end, the Town and consultants have been communicating with NC DWR staff and SC Department of Environmental Services (DES) staff on public notification requirements, meeting locations, and format for the meetings.

If you have any questions regarding this NOI, please contact Allison Kraft, Town Water Resources Director at 704-799-4066 or our consultant project director, Mike Osborne, PE with Black & Veatch at 704-510-8451.

Sincerely,

Tracey Jerome

Town Manager

Water Resources Director

Attachment

CC:

Elizabeth Weese, EMC Water Allocation Committee Chair Linwood Peele, Division of Water Resources, NCDEQ Harold Brady, Division of Water Resources, NCDEQ





