



# State of the Utility Report

2008

## I. Background

Charlotte-Mecklenburg Utilities (*Utilities*) was formed in 1972 when the City of Charlotte and Mecklenburg County combined water and sewer systems. Consolidation continued during the 1980s, when Utilities entered into operating agreements with and accepted water/sewer assets from the towns of Huntersville, Davidson, Cornelius, Mint Hill, Matthews and Pineville. Our service area is generally considered to be Mecklenburg County; however, we convey some wastewater from the eastern part of the county for treatment in Cabarrus County through a regional sewer service agreement. We treat a small amount of wastewater from the Six Mile Creek basin of Union County at the McAlpine Creek Wastewater Treatment Plant in southern Mecklenburg. Utilities also has a few metered drinking water interconnections with the City of Concord (3), Union County, Lancaster County, S.C and York County, S.C.



The Charlotte-Mecklenburg water & sewer system includes two drinking water intakes from impounded lakes on the Catawba River (Lake Norman and Mountain Island Lake), three water treatment plants, five wastewater treatment plants, 73 sewage lift stations and a whopping 7,715 miles of water and sewer pipe countywide. All told, our community's water and sewer infrastructure carries a net book value of \$2.6 billion.

## II. Advisory Committee

The Utilities Advisory Committee is comprised of seven members representing neighborhoods, civil engineers, water-sewer contractors, financial experts, real estate developers and the Mecklenburg towns. The Advisory Committee is charged with reviewing all:

- Capital Improvement Programs
- Proposed changes in the method for determining water and sewer charges; and
- Proposed changes in the policy for extending water and sewer service.



## Competitive Operation & Rates

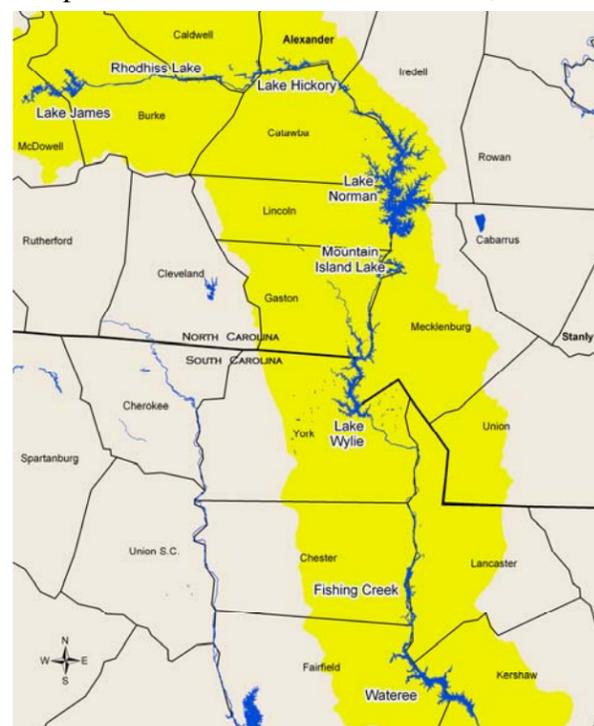
Utilities has taken many steps over the years to maintain operating efficiency and low rates while serving a growing customer base. Our Managed Competition program is a significant strategic tool used for competing against the private sector to provide certain water and sewer services. We apply lessons learned during specific, competitive bidding efforts to *optimize* similar operations throughout the organization, and keep costs down. Among our most notable achievements during the past year were:

- Our successful competitive bid to continue providing water and sewer utility line locate services, and
- A national Gold Award for Competitiveness Achievement received in January 2008 from the Association of Metropolitan Water Agencies (AMWA).

Since starting Managed Competition 15 years ago, Charlotte-Mecklenburg Utilities has never lost a competitive bid, and the ongoing competition/optimization program is among several management tools used to retain our superior AAA utility revenue bond ratings. As a result, AAA ratings bring us the lowest possible borrowing interest rates so we can keep water/sewer rates affordable for customers. These achievements were cited within the AMWA competitiveness award.

## IV. Looking Ahead—Regional Solutions

The signal is clear: Charlotte-Mecklenburg Utilities, its leaders and our neighbors must continue thinking and acting regionally when dealing with common issues affecting the services we provide. Where water is concerned, we are in this together, even if our partnering and



collaborative efforts are presently experiencing different degrees of success. While South Carolina has legally challenged the water policies of its northern neighbor, partners in both states continue working together like never before in many areas related to environmental protection, river flows and downstream supply.

Union County has asked Charlotte-Mecklenburg to consider providing them with sewer capacity, and we are making similar plans with Cabarrus County to serve future growth in eastern Mecklenburg. Just over the Catawba Basin ridgeline to the northeast, Concord seeks help providing drinking water to its thriving community. To the west, we are working with the Town of Mount Holly on a jointly-operated wastewater plant to serve both communities in the future and better protect the river.

From all directions, we find ourselves learning from each other, sharing information and partnering for basin-wide growth planning, environmental protection and cost-sharing. And that's effective government at work.

### III. Major Issues

A strong water-sewer system is crucial to the safety, economic prosperity and environmental health of any community. **More than 41 billion gallons of premium-quality drinking water were delivered to citizens in 2007, and 30 billion gallons of wastewater were safely collected, treated and recycled into our local waterways.** With these achievements, Utilities faces several ongoing issues and challenges affecting our operation's current and future service to customers.

#### Drought

No water-related issue or event has affected our community and region more than the record-breaking drought of 2007-08. Rainfall has improved some in 2008, but the soaring temperatures and extended dry spell last summer and fall took a rapid and severe toll on our shared water supplies, leading to the most stringent and prolonged local water use restrictions ever enacted.

On the plus side, our regional drought response plan has worked well, and communities along the Catawba River have acted together to curtail water usage. Charlotte-Mecklenburg citizens have answered the call and cut their water use by as much as 37%. We have averted the need for emergency restrictions, but future weather patterns remain uncertain and the value of water has surely changed. Some fairly sweeping N.C. legislation has been introduced this spring that could significantly affect our operation, including a proposal requiring separate meters for irrigation accounts, and a change that authorizes local governments to regulate water usage from all sources during times of drought, even from sources that are not publicly owned (i.e. wells and private water systems).



Meanwhile, the necessary months of sustained restrictions and lower water usage in Charlotte-Mecklenburg has inevitably affected water revenues and were a key driver behind a higher than normal (15%) and earlier than normal water rate increase that became necessary in May 2008. We do not yet know how customers' water usage habits will change when this drought is past us. We are doing everything we can to continuously monitor changing weather conditions, communicate frequently, protect and plan for current and future water supply needs and balance environmental concerns with operational and economic needs.

#### Building For The Future

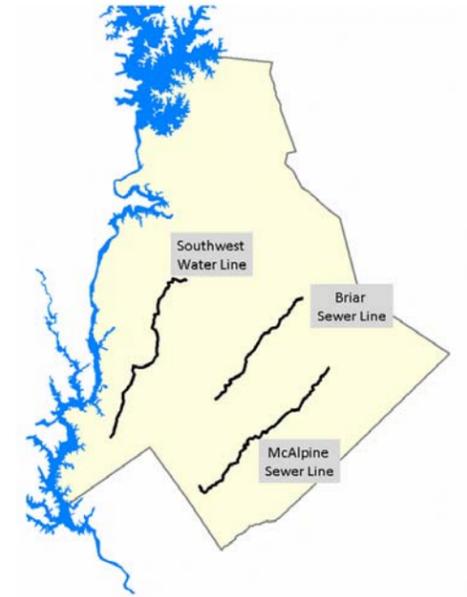
Sixty-two percent of this year's \$252.4 million budget is dedicated specifically to capital improvements — new pipes, plant expansions and related system upgrades — that support a growing community and reinvest in an aging water and sewer system. This year we continued planning, building and completing dozens of projects, including completion & activation of the Southwest Water Main (phase I), started construction of phase II and began installing the Briar Creek and McAlpine Creek relief sewer projects. We also wrapped up and dedicated a multi-year expansion project at the McDowell Creek Wastewater Treatment Plant. The five-year pricetag to fund recent, ongoing and future water/sewer improvements will exceed \$1 billion, and these costs will only trend upward.

While continuing this mammoth effort to maintain and grow a healthy water/sewer system, we are also faced with:

- The rising costs of construction materials and energy (fuel, electricity)
- Higher bond interest rates to finance projects due to the national economic downturn, and
- Lower incoming revenues (to fund projects) due to continuing water use restrictions made necessary by the drought.

#### Wastewater Capacity Needs

In 2007 a study of the McAlpine, Irwin and Sugar creek basins was completed to help identify our community's future wastewater treatment capacity needs through the year 2030. Two of the larger, near-term projects include an expansion at the Sugar Creek Wastewater Treatment Plant and a new regional wastewater treatment plant along the Catawba River, near its intersection with Long Creek. Both projects will take years and tens of millions of dollars to complete, and stakeholder input and sustainable design practices are critical components of each. Our stakeholder meetings for both Long Creek and Sugar Creek got off to an excellent start during the past year and helped project schedules stay on course. We are currently finishing up an *Environmental Impact Study* for the Long Creek plant, and wrapping up an *Environmental Assessment* for the Sugar Creek plant expansion. As we proceed with the wastewater master plan, we will remain challenged to address environmental and regulatory needs while designing sustainable facilities and staying within budget, given all the construction costs increases we are experiencing. On another note, the drought and water conservation have resulted in lower-than-projected flow rates at our wastewater plants, and it is unclear yet whether these patterns will persist over time such that wastewater capacities may be extended further than we originally projected.



#### Sewer Overflows

Based on spill incidents to date and projections through the fiscal year ending June 30, we expect a decline in sewer overflows this year compared to FY07. While we have a long way to go to consistently and drastically reduce spills toward our goal of zero, we have effectively focused this year on improving our sewer line cleaning program, including tree root control, the quantity of pipe cleaned, our inspection processes and the methods and equipment used to clean pipe. We are meeting all reporting deadlines and exceeding requirements of the federal EPA Administrative Order to reduce spills, and the EPA recently approved two of our key reports regarding our *Sewer Capacity Assurance* and *Fats, Oils and Grease* prevention programs.

