

FUNDING FOR CRITICAL INFRASTRUCTURE NEEDS IN NORTH CAROLINA

There are a wide range of water infrastructure needs facing the state of North Carolina. These include new drinking water and wastewater treatment facilities and upgrades, operations and maintenance needs, stormwater management, technical assistance and training for owners and managers. Coupled with these is the need for increased attention to water resources planning for our state's future.

Meeting these needs for investment is critical to the economic future of this state. We have made significant progress in addressing public health needs, environmental protection and in providing needed infrastructure for businesses that contribute to the state's economy. But there is more work to be done. Costs of construction and operations and maintenance continue to rise. Systems across the state struggle to keep pace with inflation and only the most financially secure are prepared to address today's escalating construction cost overruns pushed by global forces such as increases in petroleum prices that affect the cost of water and sewer pipe.

The North Carolina State Water Infrastructure Commission has recommended to the Governor and members of the General Assembly a proposal to provide permanent, regular funding for these infrastructure investments. A permanent stream of revenue would provide a dependable source and help local systems to maximize their funds contributed toward projects while ensuring that citizens pay their fair share of these costs through rate structures.

Recognizing that it will take time to put such a funding system in place, the Commission has also recommended a \$50 million appropriation in the current 2007-2008 Session to address the most critical of these needs.

FACTS ABOUT DRINKING WATER NEED

Public water systems are the primary providers of water, serving 67% of the state's population as of 2005

We are a state with many small and very small drinking water systems. Systems with 2500 or fewer connections comprise 52 percent of drinking water systems and 54 percent of sewer systems.

The very small water systems in the State served approximately 277,000 customers for an average 1,000 connections per system in 2004. In contrast, the 37 very large systems served over 3.7 million people or an average of 100,000 connections per system. These numbers represent an economy of scale that cannot be achieved by these small systems functioning independently.

In 15 Coastal Plain counties, groundwater supplies are dwindling, due in part to overuse. Communities in these counties must reduce their use of groundwater by as much as 75% and find other sources.

FACTS ABOUT WASTEWATER NEED

There are 409 sewer systems in North Carolina. Most of them are in small and very small towns.

Public sewer systems serve 51% of the population in North Carolina, as of 2005. Three-quarters of the wastewater comes from residential users.

After heavy rains, wastewater exceeds the treatment capacity at 40% of the wastewater treatment plants, due to cracked and leaking sewer pipes. Statewide, the amount of rain and groundwater entering sewer lines on these high-flow days is the equivalent of twice the average daily flow of the Charlotte-Mecklenburg system.

WHY INVEST NOW?

The needs are significant. North Carolina communities face nearly \$7 billion in capital needs by 2010. In a January 2007 survey, the State Department of Environment and Natural Resources has identified over \$500 million in immediate capital needs for drinking water and wastewater alone.

Funding from other sources is dwindling. Federal EPA funding for capital wastewater projects peaked in 1977. At that time funding accounted for more than 60 percent of annual capital expenditures on wastewater projects. By 2000, federal funding represented about 15 percent. The exhaustion of the 1998 State Clean Water Bonds coupled with the diminishing role of the federal government as a funder of infrastructure have left many North Carolina communities without the funding needed to make system improvements.

The environment and public health are at risk. Contamination of drinking water in wells due to leaching from failed septic systems is a common problem in North Carolina. In addition, according to the 2000 Census, there are 19,295 households (about 48,000 people) living in housing lacking complete plumbing – no running water to the house and no indoor bathroom facilities. Health risks typically associated with lack of safe drinking water include diseases such as hepatitis A, salmonellosis, shigellosis, tuberculosis and gastroenteritis. Rural and minority citizens are disproportionately affected. Rural households are still four times as likely as urban households to lack adequate infrastructure service. Minority citizens comprise 46 percent of those in houses without complete plumbing.

The future of many North Carolina communities depends upon fast action.

WHAT WILL THE \$50 MILLION DO?

Assist systems operating under State Orders.

There are 45 water or wastewater systems currently under state mandated moratoria and 37 systems under Special Orders of Consent. These are located in 32 counties across the state.

Help communities address needs revealed by the 2002 drought.

In August 2002, over 90 Piedmont water systems came dangerously close to exhausting their supplies. These systems mandated water conservation to deal with the emergency at that time, but longer term solutions such as those offered through regional projects and interconnections between systems are needed to assure adequate supply.

Assist small and very small systems to fund critically needed projects. Challenged by a low number of customers, small systems cannot rate base the costs of needed improvements. If the cost of the next five year's worth of needed investments were spread across their customer bases during that period, the smallest water systems would need to raise the monthly charge to each customer by \$43.50. By contrast, the result for the largest systems would be an additional \$16.32 a month per connection. Sewer costs would rise even more dramatically in the same scenario: an additional \$75.38 for customers of the smallest systems compared with \$52.03 for customers of the largest systems.

Provide technical assistance and planning funds.

Funds will be used to assist systems with developing management plans, to facilitate the planning necessary to comply with State Orders, to develop conservation and water resource management plans, and for the planning and management of water supply reliability and system capacity.

The State Water Infrastructure Commission was created by act of the North Carolina General Assembly in 2005. The purpose of the Commission is to identify the State's water infrastructure needs, develop a plan to meet those needs, and monitor implementation of the plan. The Commission is comprised of 13 members representing State agencies and non-profits, organizations representing North Carolina local governments and members of the water infrastructure and water resources professions.

North Carolina State Water Infrastructure
Commission
c/o the CWMTF
1651 Mail Service Center
Raleigh, NC 27699

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WHY INVEST NOW?



Environmental Protection



Planning for Needed Projects



Protection of Public Health