

Stormwater Management Financing Case Study Griffin, Georgia

Griffin, Georgia

The City of Griffin is located in west-central Georgia about forty miles south of Atlanta. The city's population is approximately 25,000 people. The city encompasses a 15.5 square mile area and it is the county seat of Spalding County. The city is part of the Atlanta Metropolitan Statistical Area but its population has remained fairly stable over the past decade.

Stormwater Management History

Griffin began the process of establishing a stormwater utility in the mid-1990's. The Director of the Department of Public Works first heard about stormwater utilities while attending a conference in Florida. He realized that a stormwater utility would allow the city to solve many of its flooding problems so he returned from the conference and began to lobby the city's leaders for a stormwater utility in Griffin. The city had several reasons for establishing a utility including a deteriorating stormwater system, flooding problems, a lack of drainage in some areas of the city, unplanned channels created by stormwater, and the onset of Phase II of the EPA's NPDES stormwater permit system. The city's administration, led by the mayor, the director of public works, and the city commissioners, decided to be proactive with regards to the NPDES Phase II permit requirements and began to investigate the idea of a stormwater utility. The City of Griffin hired two consulting firms with considerable experience in setting up stormwater utilities and obtained assistance from the members of the Florida Association of Stormwater Utilities. The city's attorney researched the laws of the State of Georgia to determine whether or not there was legal authority in place for the city to establish a stormwater utility.

The combined experiences of the consulting firms and the Florida stormwater professionals resulted in a well-designed program. The City of Griffin spent \$180,000 on the planning of its stormwater utility and did background research for four years until they had designed a system that would withstand legal challenges and be acceptable to the public. During the research phase, the City of Griffin mounted a large-scale public education program to reduce opposition to the stormwater utility project and demonstrate the need for additional stormwater management funding. In 1997, Griffin's Board of Commissioners enacted the ordinances that established the stormwater utility and its rate structure and the City of Griffin became the first community in Georgia to have a stormwater utility.

Stormwater Program Organization

The City of Griffin's stormwater program, which is funded by the utility fee, is a separate department from the Department of Public Works but both share the same director. The program has a staff of around fifteen people with the majority of them working in the field full-time to correct stormwater problems and maintain the stormwater system. The department has two full-time environmental technicians and a GIS technician to assist with the mapping and master planning efforts. The stormwater program also has its own administrative assistant. The city

stormwater program works cooperatively with the county on projects that affect both jurisdictions.

Stormwater Program Responsibilities

The city’s stormwater management program began with several environmental and organizational goals in mind. The city wanted to reduce flooding, improve water quality, decrease the pollutant loads entering the city’s bodies of water, improve wildlife habitats, and reduce erosion and sedimentation problems. The city also wanted to be prepared for Phase II of the NPDES stormwater permit system and increasingly stringent state water quality standards.

The program made significant progress toward its goals in its first several years of operation. Griffin implemented a GIS/GPS system and mapped out the city using aerial photography. The city’s staff created a hydrologic modeling system, assessed the needs of each of the city’s six major drainage basins, wrote a master plan for capital improvements, and enacted a comprehensive land use plan. The program’s staff obtained additional funding for stormwater management from other local, state, and federal grant and loan programs and began the process of repairing and replacing the city’s failing stormwater system components.

Rate Structure

Griffin has two residential property classes and one non-residential property class in its rate structure. Single-family parcels are classified based on the number of square feet included on the parcel. Single-family residential properties that have a total area of more than 1600 square feet are classified as large and charged \$2.95 per month for stormwater service. Single-family parcels with a total area of less than 1600 square feet are classified as small and charged 60% of the large residential parcel rate, or \$1.77 per month. Non-residential properties are charged \$2.95 per month for each equivalent residential unit (ERU) on their parcel (See Table 1). The ERU was calculated using aerial photographs and digital maps to determine the average amount of impervious area on a single-family residential parcel. One ERU is equal to 2200 square feet.

Table 1: Griffin, Georgia Stormwater Utility Rate Structure

Property Classification	Stormwater Charge
Undeveloped property and railroad rights-of-way	Exempt
Small Single-Family Residential Parcels (< 1600 square feet)	60% of the rate for one ERU Currently \$1.77 per month
Large Single-Family Residential Parcels (> 1600 square feet)	100% of the rate for one ERU Currently \$2.95 per month
Non-residential parcels	Area of parcel/one ERU x rate for one ERU Currently equal to (Area/2200) x \$2.95

Credits and Exemptions

The City of Griffin does not have any exemptions for developed parcels within the stormwater service area. Undeveloped land and railroad rights-of-way are the only properties that are not liable for stormwater service fees. The city even charges itself for city-owned developed property and city streets, making the city its own largest stormwater service customer.

Peak Flow Reduction Credits

The stormwater utility fee has two types of credits available. Non-residential customers and groups of homeowners like neighborhood associations can apply for a peak flow reduction credit of up to 50% for onsite stormwater control facilities. All peak flow reduction credit applications must be completed by a certified public engineer that is registered to practice in the State of Georgia and inspected by the stormwater department before the credit is approved to ensure that all of the control equipment is installed properly and the system is being adequately maintained. A credit of 20% is available to customers who install onsite control systems that reduce the peak discharge rate for a ten-year storm to no more than 10% greater than the peak rate before development. A credit of 30% is available if the peak rate is reduced to a level that is equal to the pre-development rate or provides less than a 10% reduction below the pre-development peak flow rate. Finally, a credit of 50% is available to customers that implement onsite controls that result in a 10% reduction in the pre-development peak flow rate. The City of Griffin is also considering adding a water quality credit but that program has not been finalized.

Table 2: Peak Flow Reduction Credits Available in Griffin, Georgia

Reduction in Peak Discharge Rate	Credit Available
1% to 10% above pre-development rate	20%
0 to 10% below pre-development rate	30%
10% or more below pre-development rate	50%

Education Credit

The Griffin stormwater utility fee also has an education credit that is available to public and private schools in the stormwater service area that have 1,000 or more students in their system. The credit offers up to a 50% reduction in the schools' stormwater charges for teaching the Water Wise program to students. The Water Wise program teaches children about the importance of water resources and how they can help to improve water quality in their communities. Schools that are interested in obtaining a credit for teaching the Water Wise program must apply in writing to the stormwater utility and certify how many students attend the school, what proportion of the students in each grade will take the curriculum, and the amount of time during the school year that the students will take the program.

Stormwater Program/Utility Budget

Griffin's stormwater user fees amount to approximately \$1.2 million dollars each year. Approximately 80% of the utility's user fee revenue is from non-residential customers. The remaining 20% comes largely from the large residential customers with small residential parcel

revenue amounting for less than 1% of the utility's total revenue. The user fees are spent on mainly on stormwater administration and operations. The program's largest expenses are for capital outlays, personal services and benefits, and purchased and contract services (See Table 3).

Table 3: Griffin, Georgia Stormwater Utility Audited Expenses, Fiscal Year 1999 and Projected Expenses, Fiscal Year 2000*

Expenditure	Audited Expenses, 1999	Projected Expenses, 2000
Personal Services and Benefits	\$265,184	\$417,300
Purchased and Contracted Services	\$236,901	\$465,341
Supplies	\$133,429	\$139,010
Capital Outlays	\$343,001	\$2,393,330
Other Financing Uses	\$80,400	-
Debt Service	\$18,659	\$38,579
Other Costs	-	\$944
Total	\$1,077,574	\$3,519,135

*Adapted from Griffin, Georgia Stormwater Utility Budget Summary, Fiscal Year 2000

Other Funding Sources

The city's master planning and public education efforts combined with the steady stream of revenue from the stormwater utility fees have made it possible for the city to seek other sources of funding for its stormwater management programs.

Grants

Griffin has received several grants to fund stormwater management projects. The city was awarded a \$750,000 Hazardous Mitigation Grant from the Georgia Emergency Management Agency (GEMA) that will pay for five projects to reduce drainage problems and repair damages caused by flooding. The city received \$158,000 from the Georgia Department of Natural Resources Environmental Protection Division's Section 319 Nonpoint Source Management grant program that will pay for a portion of a stormwater quality demonstration project that will include a wet detention pond to treat pollutants in stormwater runoff. A \$209,000 Section 319 grant will pay for the retrofitting of an existing detention pond with water quality components and a TEA-21 Grant of \$840,000 will be used to research pollutant efficiency levels of removal on a state highway in conjunction with EPA and National Science Foundation protocol verification.

Loans

Griffin's stormwater program is currently using a \$2.6 million dollar loan from the Georgia Environmental Facilities Authority's (GEFA) revolving loan fund to pay for five stormwater management projects. The GEFA revolving loan fund money also helped the utility to purchase a Jet-Vac truck that will be used to clean out components of the storm drain system.

Taxes

The public education campaign financed by the Griffin stormwater utility fee raised voters' awareness of the area's mounting infrastructure repair and replacement needs. In 1996, voters in Spalding County, Georgia approved a five-year special purpose local option sales tax (SPLOST) that pays for roads, parks and recreation facilities, stormwater projects, recycling centers, and facilities for a new industrial park. The tax is a one-percent sales tax that is levied on all sales within Spalding County that is expected to generate nearly \$45 million for infrastructure improvements over a five-year period. Stormwater management officials will receive \$1 million of the tax revenue to improve stormwater systems throughout Griffin and the unincorporated county.

Bonds

Griffin is currently working on a series of stormwater utility revenue bonds that will be backed by user fee revenues. The first stormwater bonds are scheduled to be sold in 2001.

Public Information

Initial Program

Griffin's stormwater management public information campaign has been very successful in educating the public about stormwater problems. Stormwater program officials spent a year and a half holding public hearings, doing presentations, sending out pamphlets, writing newspaper articles, and advertising throughout the city to educate the public and get support for the utility project before it became a reality. The public works director of Griffin involved the city's most prominent leaders and gained their valuable support early in the program's development to make sure that the city's leadership understood the scope of the problem and the reasons that a stormwater utility fee would be a valuable addition to the community. The city's leaders then used every form of media available to them and conducted meetings wherever they were accepted to speak. When a community member published a letter to the editor in the local newspaper that was against the stormwater utility, the person would often get a personal phone call from the city's public works director preaching the benefits of the project. All of the utility's future customers got mailings, inserts in their utility bills, or inserts in their newspapers explaining what the stormwater utility fee would fix, how much the fee would cost, and how the charges were calculated. There was little vocal opposition to the stormwater utility fee and the City Commission passed the ordinances that established it in the summer of 1997.

Ongoing Program

The City of Griffin's stormwater program has kept its intensive public education program going strong since the establishment of the utility fee. Several newspaper and journal articles have been published about the utility fee, giving the small city national attention. The program has also kept the residents of Griffin involved by posting current construction projects and other information about the stormwater department on their website (<http://www.griffinstorm.com>), sending out brochures and newspaper inserts on the projects the utility fee has paid for, and

providing classroom materials to schools that teach the Water Wise program. Educational materials are available to interested residents at the stormwater program's office and the stormwater program's staff is always available to answer customers' questions. When city residents and construction companies apply for residential building permits, they receive a copy of the stormwater program's erosion and sediment control guidelines for construction sites and must sign a Residential Erosion Control Affidavit.