



HEALTHY ENVIRONMENT SUMMARY

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HEALTHY ENVIRONMENT

STRATEGIC FOCUS AREA MISSION

A healthy environment ensures that the places we live, work, and play are safe and conducive to overall good health. It includes such traditional measures as air and water quality, waste reduction and disposal, and policies that sustain our environment. In the broader context, a healthy environment also includes facilities and activities that foster good physical health.

STRATEGIC FOCUS AREA OBJECTIVES

- Protect Land and Reduce Sprawl
- Enhance Air Quality
- Support Green Initiatives
- Manage Water Quality and Quantity
- Develop Comprehensive Solid Waste Management Strategies

STRATEGIC FOCUS AREA CATEGORIES

Sanitation, Solid Waste Disposal, Stormwater Management, Sustainability, Water and Sewer System, Capital Projects

STRATEGIC FOCUS AREA TOTAL BUDGET

\$243,257,910

STRATEGIC FOCUS AREA PRIORITIES

Short Term Priorities

- 1) Evaluate sustainability needs based on STAR Community rating
- 2) Review policies for business and multi-family recycling
- 3) Create developer incentives for green and transit-oriented development

Mid Term Priorities

- 4) Design guidelines for mixed-use development
- 5) Provide additional recycling education programming
- 6) Address stormwater runoff and urban stream issues
- 7) Modify transportation strategies to mitigate traffic congestion

SANITATION

MISSION STATEMENT

The mission of the Sanitation Department is to ensure an aesthetically pleasant, healthy, and safe environment for the citizens of Winston-Salem, by providing economical and effective collection of refuse and yard waste, and by transporting these materials to state-approved disposal sites.

PROGRAM DESCRIPTIONS

Residential Refuse Collection: Provides weekly curbside collection to single-family residences, multi-family residences, the Housing Authority of Winston-Salem, and small businesses that generate the same amount of trash as a residential unit.

Central Business District Services: Provides refuse collection six nights per week for businesses and residences in the central business district, using crews who also clean sidewalks, empty trash receptacles, and maintain other common areas around downtown. Provides clean-up services for downtown special events.

Bulk Container Collection: Provides mechanized refuse collection for City departments on a regular schedule. Includes the collection of cardboard from the City's nine drop-off sites and the transportation of the material to a processing facility.

Curbside Collection: Collects brush every 21 working days, except during leaf collection months. Provides loose leaf collection from November 1st until three rounds of collection have been completed. Provides annual curbside bulky item collection from March through August.

Yard Waste Cart Collection: Provides year-round weekly curbside collection of containerized yard waste to residents who purchase the 96-gallon rollout carts and pay an annual fee for the service.

Sanitation Code Enforcement: Enforces the City's sanitation ordinances, including the regulation of refuse storage, improperly containerized yard waste, and illegal distribution of handbills and advertisements.

Sanitation Administration: Provides leadership, planning, employee safety training and enforcement, and fiscal stewardship for all sanitation programs.

EXPENDITURES AND REVENUES SUMMARY

EXPENDITURES BY PROGRAM	Actual FY 19-20	Budget FY 20-21	Proposed FY 21-22	Percent Change
Residential Refuse Collection	\$8,235,407	\$7,533,930	\$7,466,440	-0.9%
Curbside Collection	5,984,143	5,825,770	6,269,980	7.6%
Bulk Container Collection	574,485	567,250	422,470	-25.5%
Yard Waste Cart Collection	1,165,525	1,220,990	1,070,710	-12.3%
Sanitation Administration	721,307	834,800	1,042,020	24.8%
Central Business District Service	775,149	693,270	673,600	-2.8%
Sanitation Code Enforcement	159,900	158,330	162,070	2.4%
Subtotal	\$17,615,917	\$16,834,340	\$17,107,290	1.6%

EXPENDITURES BY PROGRAM- Continued	Actual FY 19-20	Budget FY 20-21	Proposed FY 21-22	Percent Change
Interdepartmental Charges	-\$74,910	-\$102,780	-\$102,780	0%
Total Expenditures by Program	\$17,541,007	\$16,731,560	\$17,004,510	1.6%
RESOURCES BY TYPE				
Bulk Container Service Charges	\$52,199	\$55,300	\$55,300	0%
Yard Waste Cart Collection Fee	981,705	803,500	924,000	15.0%
Other Charges for Service	37,569	30,330	30,330	0%
Miscellaneous Revenues	412,764	0	0	N/A
Transfer from Stormwater Management Fund	1,867,520	1,857,630	1,914,970	3.1%
Other General Fund Resources	14,189,250	13,984,800	14,079,910	0.7%
Total Resources by Type	\$17,541,007	\$16,731,560	\$17,004,510	1.6%

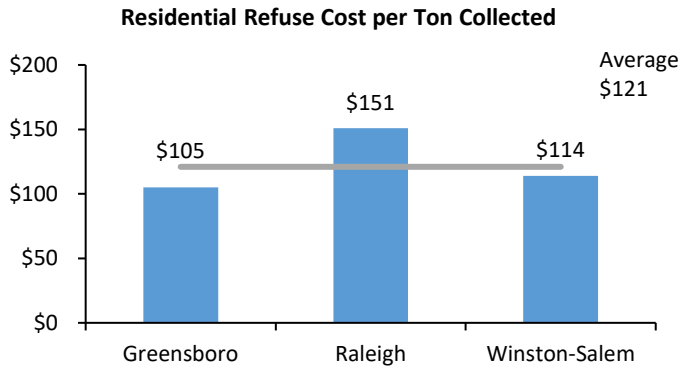
POSITION SUMMARY

POSITIONS	Amended FY 19-20	Amended FY 20-21	Proposed FY 21-22	Change
Full Time	147	145	145	0
Part-Time (FTE's)	17.9	17.9	17.9	0

PERFORMANCE MEASURES AND SERVICE TRENDS

	Actual FY 19-20	Estimated FY 20-21	Projected FY 21-22
Effectiveness			
Limit missed garbage collections to less than 0.5% per month	0.1%	0.1%	0.1%
Limit missed yard cart collections to less than 1% per month	0.2%	0.2%	0.2%
Complete 75% of brush collection routes on time	60%	60%	60%
Complete 75% of leaf collection routes on time	75%	75%	75%
Workload			
Tons of garbage collected	61,208	72,730	72,000

FY 2019-2020 NORTH CAROLINA BENCHMARKING PROJECT RESULTS



*Average is for all participants within the N.C. Benchmarking Project

Source: NC Local Government Performance Measurement Project, *Draft Report on City Services for Fiscal Year 2019-20, May 2021*

BUDGET HIGHLIGHTS

- Lease payments have been added for the replacement of 3,000 rollout refuse carts (\$30,000) and three automated side loaders (\$186,000) for Refuse Collection, as well as five hoist trucks (\$186,000), six scow bed dump trucks (\$108,000), and an automated leaf loader (\$45,000) in Curbside Collection. A lease payment has also been added for replacement of a dump truck for the Central Business District (\$12,000). There was a net decrease for vehicle and equipment lease expenses of \$349,390 for Sanitation.
- During FY 2019-20, the City temporarily suspended Yard Waste Cart service for six weeks at the start of the COVID-19 pandemic. Customers that were signed up for the service were eligible to receive a refund for the time in which the service was not provided. The adopted budget in FY 2020-21 was reduced to account for these refunds. The proposed budget for FY 2021-22 includes a 15.0% increase in revenue from Yard Waste Carts to bring the budget back to pre-pandemic levels.
- Expenditures for Sanitation Administration are increased 24.8% to account for an existing position that was moved during the current fiscal year to support the department. In addition, the facility costs for the Joycelyn V. Johnson Municipal Services Center are increasing due to a new contract for security services.

SUSTAINABILITY

MISSION STATEMENT

The mission of the Office of Sustainability is to provide leadership, direction, and assistance in providing services that enhance the energy and environmental awareness of the citizens of Winston-Salem through public education, recycling services, and volunteer opportunities.

PROGRAM DESCRIPTIONS

Sustainability: Provides supervision and direction of energy, efficiency, and environmental improvements pertaining to sustainability initiatives and policies. Provides services that reflect the city's leadership in energy and environmental awareness.

Keep Winston-Salem Beautiful: Responsible for enhancing the appearance of the city through clean-up events, beautification projects, and educational activities.

Curbside/Multi-Family Recycling: Administers a contract for single stream, bi-weekly residential curbside recycling and multi-family roll-out cart collection. Materials collected include: newspaper, magazines, junk mail, telephone books, chipboard, aluminum, steel, all plastics, cardboard, glass (clear, brown, and green), and aerosol cans.

EXPENDITURES AND REVENUES SUMMARY

	Actual <u>FY 19-20</u>	Budget <u>FY 20-21</u>	Proposed <u>FY 21-22</u>	Percent <u>Change</u>
EXPENDITURES BY PROGRAM				
Sustainability	\$201,768	\$211,090	\$238,170	12.8%
Keep Winston-Salem Beautiful	134,433	119,290	120,400	0.9%
Curbside/Multi-Family Recycling	1,674,964	1,784,830	2,035,220	14.0%
Total Expenditures by Program	\$2,011,165	\$2,115,210	\$2,393,790	13.2%
RESOURCES BY TYPE				
Proceeds from Sale of Recyclables	\$127,589	\$135,000	\$99,840	-26.0%
Other General Fund Revenues	1,883,576	1,980,210	2,293,950	15.8%
Total Resources by Type	\$2,011,165	\$2,115,210	\$2,393,790	13.2%

POSITION SUMMARY

	Amended <u>FY 19-20</u>	Amended <u>FY 20-21</u>	Proposed <u>FY 21-22</u>	<u>Change</u>
POSITIONS				
Full-Time	4	4	4	0

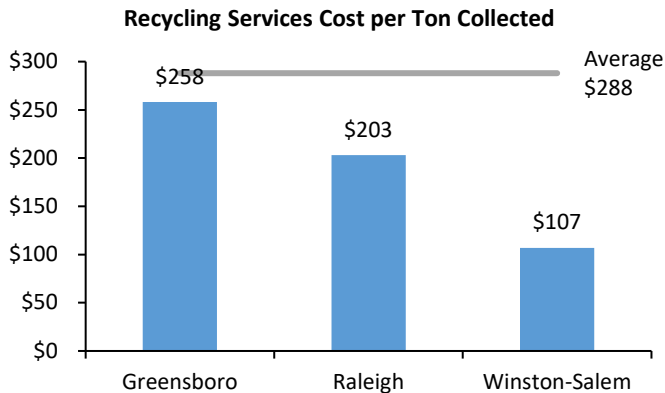
PERFORMANCE MEASURES AND SERVICE TRENDS

	Actual FY 19-20	Estimated FY 20-21	Projected FY 21-22
Effectiveness			
Percent of fleet using alternative fuel vehicles	1.25%	2.30%	2.30%
Community Air Quality Score ¹	241	237	245
LEED for Cities Score	N/A	58	58
Achieve a recycling set-out rate of 50% of the total number of eligible households	68.1%	68.5%	65%
Recycling tons collected as a percent of refuse tons collected	23.2%	21.3%	22.2%
Efficiency			
CO2 emissions/Carbon footprint from city facilities ²	154,550	153,600	155,600
Workload			
Tons of recycling collected	15,154	15,400	14,500
Pounds of trash collected from the Great American Cleanup	N/A	8,750	9,000
Pounds of trash collected from Big Sweep Program	6,475	13,000	14,000
Number of Native Pollinator plants utilized in landscape maintenance	3	6	6
Number of community recycling presentations	8	8	9
Number of Keep Winston-Salem Beautiful community presentations	4	4	6

¹ Data from EPA, which is annually submitted by Forsyth County; this is specifically measuring the number of "good" days.

² The City's actual use of electricity, fuel, and natural gas is converted into carbon dioxide (CO2) emissions using a multiplier of 2.1 pounds of CO2 emitted for every kilowatt hour of energy consumed (per the ICLEI Local Governments for Sustainability protocol).

FY 2019-2020 NORTH CAROLINA BENCHMARKING PROJECT RESULTS



*Average is for all participants within the N.C. Benchmarking Project

Source: NC Local Government Performance Measurement Project, *Draft Report on City Services for Fiscal Year 2019-20, May 2021*

BUDGET HIGHLIGHTS

- The proposed budget for Sustainability increased 12.8% to include new charges for the use of office space in City Hall (\$22,780), as well as an annual lease payment to replace an electric vehicle charging station (\$1,440).
- The City's contract to provide recycling services will expire in April 2022. The proposed budget for Curbside/Multifamily Recycling includes an increase of \$250,000 to cover the estimated cost for a partial year of the new contract (April – June 2022). The new contract could include changes to the reimbursement rate for the sale of recyclables to better align with current market trends. As a result, the proposed revenue budget for the sale of recyclables is projected to decrease (-\$35,160).

SOLID WASTE DISPOSAL

MISSION STATEMENT

The mission of the Solid Waste Disposal Division is to provide, as an enterprise, environmentally sound and cost-effective means of integrated solid waste management and disposal for current and future waste generated in Forsyth County.

PROGRAM DESCRIPTIONS

Municipal Solid Waste Disposal: Operates a state-permitted, active, Subtitle D lined municipal solid waste landfill on Hanes Mill Road. Maintains closed landfills on Ebert Street, Overdale Road, and Martin Luther King, Jr. Drive.

Construction and Demolition Waste Management: Operates a state-permitted, active landfill on Old Salisbury Road for construction and demolition materials. Accepts and recycles concrete, brick, and asphalt inert debris.

Leaf Composting/Yard Waste Processing: Operates two facilities for processing yard waste and composting leaves – one located off Overdale Road and the other located off Highway 65 in the Forum 52 Industrial Park.

County-Wide Waste Reduction Programs: In conjunction with Forsyth County, administers contracts for drop-off recycling sites in Kernersville, Pfafftown, and at the Hanes Mill Road Landfill; operates a school recycling program. Administers a contract for the recycling or disposal of household hazardous materials including paints, pesticides, used oil, solvents, and electronic equipment (e.g., computers and televisions). Provides recycling of “white goods” (used appliances) and scrap tires through private contractors at the Hanes Mill Road Landfill.

Solid Waste Disposal Administration: Provides leadership, planning, administrative oversight and fiscal stewardship for solid waste disposal programs.

EXPENDITURES AND REVENUES SUMMARY

	Actual FY 19-20	Budget FY 20-21	Proposed FY 21-22	Percent Change
EXPENDITURES BY PROGRAM				
Municipal Solid Waste Disposal	\$5,069,982	\$5,778,380	\$5,846,950	1.2%
Construction and Demolition Waste Disposal	1,481,361	1,646,740	1,768,050	7.4%
Leaf Composting/Yard Waste Processing	808,552	1,051,500	1,183,120	12.5%
County-Wide Waste Reduction Programs	1,375,169	1,668,940	1,624,300	-2.7%
Solid Waste Disposal Administration	1,188,530	1,418,690	1,426,700	0.6%
Total Expenditures by Program	\$9,923,594	\$11,564,250	\$11,849,120	2.5%
RESOURCES BY TYPE				
Service Charges	\$12,044,027	\$11,734,320	\$11,339,550	-3.4%
Resource Recovery	257,777	247,590	278,100	12.3%
State Scrap Tire Disposal Tax	416,934	545,730	510,860	-6.4%
State Solid Waste Disposal Tax	229,061	241,030	232,500	-3.5%
State E-Recycling Funds	0	23,320	15,000	-35.7%
Forsyth County	249,944	258,910	277,640	7.2%

RESOURCES BY TYPE - Continued	Actual FY 19-20	Budget FY 20-21	Proposed FY 21-22	Percent Change
Interest Income	\$1,215,921	\$0	\$0	N/A
Other/Miscellaneous Revenues	511,003	0	0	N/A
Transfer from Water & Sewer Fund	308,001	379,100	371,970	-1.9%
Transfer from Stormwater Management Fund	154,000	189,540	185,980	-1.9%
Total Resources by Type	\$15,386,669	\$13,619,540	\$13,211,600	-3.0%
Addition to Fund Balance	\$5,463,075	\$2,055,290	\$1,362,480	-33.7%

POSITION SUMMARY

POSITIONS	Amended FY 19-20	Amended FY 20-21	Proposed FY 21-22	Change
Full-Time	38	38	39	+1
Part-Time (FTE's)	6.2	6.2	6.2	0

PERFORMANCE MEASURES AND SERVICE TRENDS

	Actual FY 19-20	Estimated FY 20-21	Projected FY 21-22
Effectiveness			
Received notice of violations for all solid waste disposal facilities	0	0	0
Number of operational complaints received for solid waste disposal facilities	1	4	0
Efficiency			
In-place waste density of municipal solid waste landfill airspace (pounds per cubic yard)	1320	1325	1350
In-place waste density of construction and demolition landfill airspace (pounds per cubic yard)	1040	1029	1040
Workload			
Tons of waste disposed per capita in Forsyth County	0.83	0.80	0.79

BUDGET HIGHLIGHTS

- On May 10, 2021, the City-County Utility Commission approved a resolution recommending to the Mayor and City Council the adoption of the FY 2021-22 budget for solid waste disposal operations. The recommended budget includes no rate increases.
- The proposed budget includes the addition of one heavy equipment operator. This position is needed to maintain operational service levels under increasing workload. The total cost of salary and benefits for the position is \$51,080.

BUDGET HIGHLIGHTS - Continued

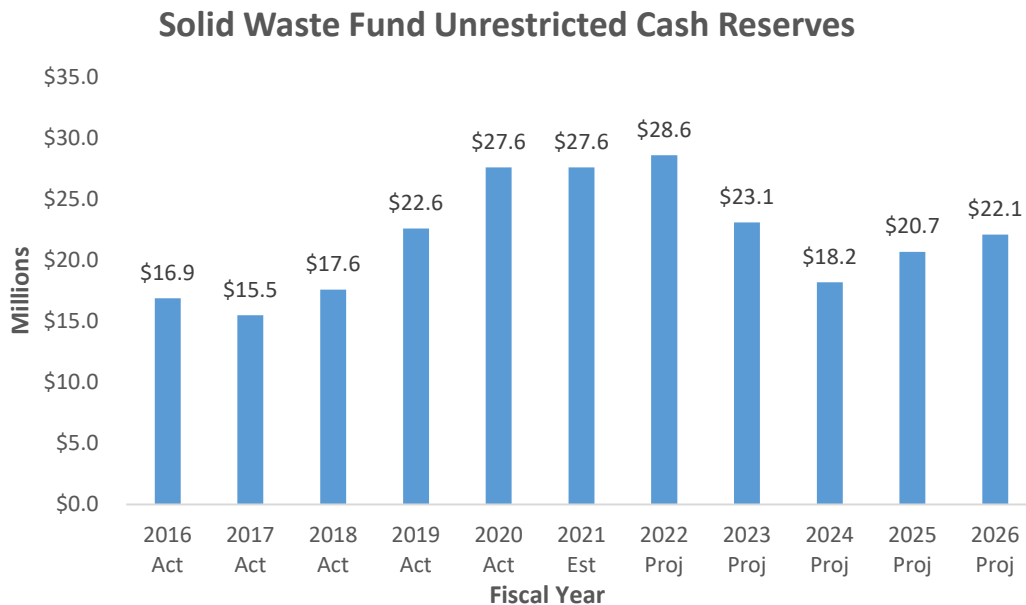
FY 2020-21 Year-End Outlook

- The following table provides estimated year-end revenues and expenditures for the solid waste disposal fund operations.

	Budgeted	Estimated
	<u>FY 20-21</u>	<u>FY 20-21</u>
Operating Revenues	\$11,981,910	\$11,757,298
Operating Expenditures	(9,616,430)	(9,038,219)
Operating Income	\$2,365,480	\$2,719,079
Intergovernmental Revenue	1,068,990	987,854
Transfers from Other Funds	568,640	473,551
Debt and Lease Expenses	(1,947,820)	(976,537)
Net Gain/(Loss)	<u>\$2,055,290</u>	<u>\$3,203,947</u>

Long-Range Financial Outlook

- The following chart provides a projection of the unrestricted cash reserves for the solid waste disposal fund. This long-range outlook assumes 3% annual increases in personnel costs and 2% annual increases in operations and maintenance costs. It also includes capital improvements for existing facilities.



WATER AND SEWER SYSTEM

MISSION STATEMENT

The mission of the Utilities Water and Sewer Division is to treat and distribute water to the public and collect and treat the wastewater in a manner that is in compliance with federal and state regulations.

PROGRAM DESCRIPTIONS

Water Treatment: Operates three conventional water treatment plants, the R.W. Neilson plant, the R.A. Thomas plant, and the P.W. Swann plant, with a combined capacity of 91 million gallons per day. Operates and maintains 14 tanks and seven distribution pump stations for distributing water throughout the system's five pressure zones.

Wastewater Treatment: Operates two wastewater treatment plants, the Archie Elledge plant and the Muddy Creek plant, with a combined capacity of 51 million gallons per day and 49 wastewater lift stations. Manages two programs that impact treatment facilities:

- Regional Dryer Facility – Operates the drying facility, which provides beneficial reuse of biosolids.
- Industrial Waste Control – Regulates commercial and industrial discharges to the wastewater system, determines surcharge bills for commercial and industrial customers, and enforces discharge permits that protect the wastewater treatment facilities.

Field Operations: Provides water distribution and wastewater collection services to residential, commercial, and industrial customers. Maintains a distribution system consisting of approximately 2,324 miles of water mains and a collection system of approximately 1,770 miles of sewer mains. Installs water/wastewater connections at the request of customers and/or Revenue. Field Operations also cleans, rehabilitates, and installs various water and wastewater mains throughout the service area.

Utilities Technical Services: Provides support and technical services related to capital projects, plan review and information systems for the Utilities Department.

Meter Services: Provides meter reading, meter maintenance, and meter-related customer service for approximately 128,000+ water meters throughout the utility.

Billing and Customer Service: Provides water and sewer billing and customer support. Works closely with the Meter Shop, Utilities Administration, and CityLink to provide accurate and timely billing, as well as convenient and timely customer service.

Utilities Administration: Provides executive leadership for the management of each division within the Utilities Department and staff support to the Winston-Salem/Forsyth County Utility Commission.

Debt Service: Provides funding for payment of principal and interest on long-term debt such as revenue bonds and state revolving fund loans.

EXPENDITURES AND REVENUES SUMMARY

EXPENDITURES BY PROGRAM	Actual FY 19-20	Budget FY 20-21	Proposed FY 21-22	Percent Change
Water Treatment	\$9,825,198	\$10,462,320	\$10,484,640	0.2%
Wastewater Treatment	13,672,755	15,067,080	15,639,150	3.8%
Field Operations	15,730,088	17,275,330	16,664,310	-3.5%
Utilities Technical Services	0	0	1,556,570	N/A
Meter Services	3,196,143	4,116,770	4,032,840	-2.0%
Billing and Customer Service	2,373,883	2,431,290	2,592,740	6.6%
Utilities Administration	4,480,428	2,944,490	3,176,800	7.9%
Debt Service	34,221,665	40,456,180	44,755,650	10.6%
Total Expenditures by Program	\$83,500,160	\$92,753,460	\$98,902,700	6.6%
RESOURCES BY TYPE				
Water Charges	\$54,712,492	\$53,977,720	\$58,710,000	8.8%
Sewer Charges	50,328,018	50,456,350	54,590,000	8.2%
Charges for Service	6,938,773	4,465,600	5,790,000	29.7%
System Development Fees	2,734,556	2,000,000	4,530,000	126.5%
Assessments to Benefit Property	2,457	0	0	N/A
Federal Bond Interest Subsidy	1,184,171	0	0	N/A
Interest Income	3,987,727	0	0	N/A
Miscellaneous Revenues	1,091,731	30,000	0	-100.0%
Transfer from Stormwater Management Fund	120,720	120,720	120,720	0%
Total Resources by Type	\$121,100,645	\$111,050,390	\$123,740,720	11.4%
Addition to Fund Balance	\$37,600,484	\$18,296,930	\$24,838,020	35.7%

POSITION SUMMARY

POSITIONS	Amended FY 19-20	Amended FY 20-21	Proposed FY 21-22	Change
Full-Time	341	344	346	+2

PERFORMANCE MEASURES AND SERVICE TRENDS

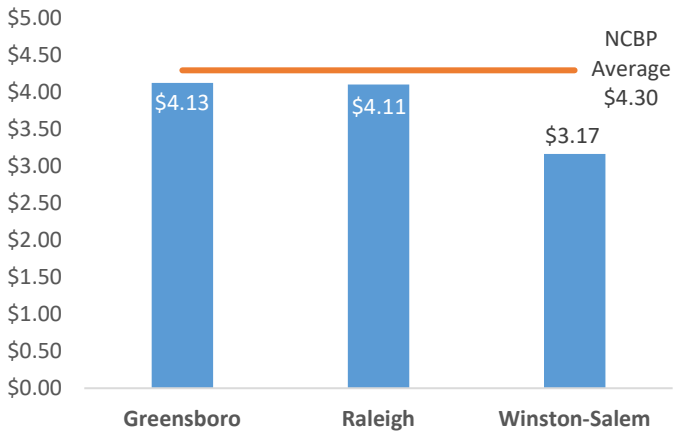
	Actual FY 19-20	Estimated FY 20-21	Projected FY 21-22
Effectiveness			
Maintain 100% compliance with federal and state drinking water quality standards	100%	100%	100%
Respond to 100% of sewage overflows within two hours as required by the State Clean Water Act	97%	93%	100%
Receive zero federal and state violations at wastewater treatment plants (returning clean water back to rivers and streams)	0	1	0

PERFORMANCE MEASURES AND SERVICE TRENDS - Continued

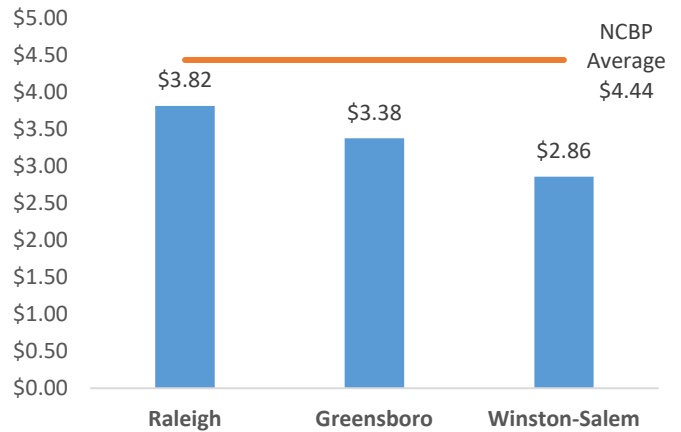
	Actual FY 19-20	Estimated FY 20-21	Projected FY 21-22
Efficiency			
Meet 100% of average daily water demand throughout water system	100%	100%	100%
Meet 100% of average daily sewer demand throughout sanitary sewer system	100%	100%	100%
Collect and treat 100% of wastewater throughout sanitary sewer system (minimize back-ups and overflows)	99.9%	99.9%	99.9%

FY 2019-20 NORTH CAROLINA BENCHMARKING PROJECT RESULTS

Total Cost per Thousand Gallons of Billed Water



Total Cost per Thousand Gallons of Treated Wastewater



*Average is for all participants within the N.C. Benchmarking Project
 Source: NC Local Government Performance Management Project, *Draft Files for Fiscal Year 2019-20*

BUDGET HIGHLIGHTS

- On May 10, 2021, the City-County Utility Commission approved a resolution recommending to the Mayor and the City Council the adoption of the FY 2021-22 budget for the water and sewer system and approved volumetric and readiness to serve rate increases of 3.5% for water and sewer services.

These rate increases will generate sufficient revenues to meet the net operating income-to-debt service ratio requirements of approved revenue bonds. These requirements are part of the revenue bond covenants and are intended to ensure that there are sufficient revenues to meet the debt obligations of the water and sewer system. If the system did not generate sufficient revenues to pay off the bonds, the covenants would require the City to increase water and sewer rates. The additional revenue required to meet existing bond obligations will also allow for additional pay-as-you-go financing for future projects. The approved rate increases would be effective July 1, 2021.

- Additions to fund balance are used to fund pay-as-you-go (PAYGO) capital expenses and maintain debt coverage ratios, among other purposes. The ability to fund PAYGO capital projects reduces reliance on revenue bonds and other debt-based funding sources.

BUDGET HIGHLIGHTS - Continued

- The proposed budget includes an increase for revenue generated by system development fees. This increase accounts for expected growth and development within the service area, generating additional connections. There have not been changes to the system development fee schedule.
- Revenue generated from charges for service has also increased in the proposed budget. This increase is driven by the reinstatement of late fees in FY 2021-22. Due to the COVID-19 crisis and the North Carolina Governor's Executive Order No. 124, which disallowed charging late fees as of March 31, 2020, revenue from these charges was removed from the FY 2020-21 budget. The proposed FY 2021-22 budget restores these revenues. The Winston-Salem/Forsyth County Utilities resumed charging late fees in October 2020.
- In FY 2020-21, staff identified opportunities to align personnel and operating costs to more clearly define roles and responsibilities between divisions. This resulted in the creation of the Utilities Technical Services Division, from which personnel and operating costs for utilities information systems, capital projects and plan review were moved from the Field Operations as part of the FY 2021-22 budget process.
- The proposed budget includes two new positions, an Assistant Water Treatment Plant Superintendent and an Assistant City Attorney. The total cost of salary and benefits for these positions is \$201,510.

FY 2020-21 Year-End Outlook

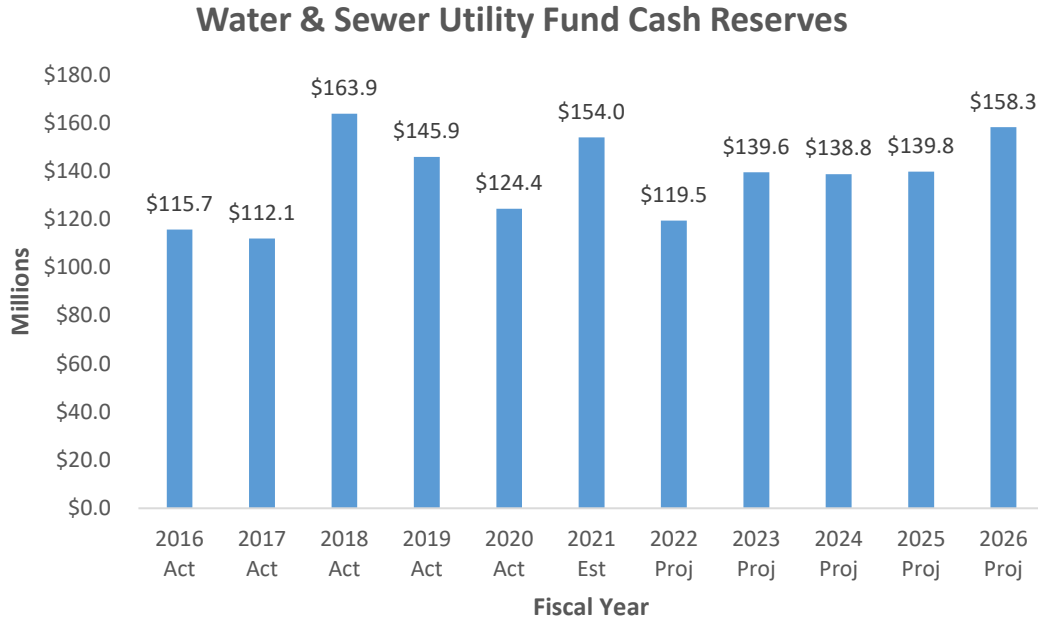
- The following table provides estimated year-end revenues and expenditures for the water and sewer utility fund operations.

	Budgeted	Estimated
	<u>FY 20-21</u>	<u>FY 21-22</u>
Operating Revenues	\$110,929,670	\$120,000,000
Operating Expenditures	(50,528,250)	(48,000,000)
Operating Income	\$60,401,420	\$72,000,000
Federal Bond Interest Subsidy	0	0
Debt and Lease Expenses	(40,609,410)	(37,870,338)
Program Support for Vector Control	(9,200)	(9,200)
Program Support for Safety Inspector	(76,470)	(76,470)
Program Support for Household Hazardous Waste Collection	(379,100)	(379,100)
Transfer In from Stormwater Management Fund	120,720	120,720
Net Income/(Loss)	<u>\$19,447,960</u>	<u>\$33,785,612</u>

BUDGET HIGHLIGHTS - Continued

Long-Range Financial Outlook

- The following chart provides the outlook for the water and sewer utility fund’s cash reserves for both operations and capital projects. The outlook assumes future bond issuances of \$58 million in FY 2021-22 and a \$60 million addition to the revolving state loan over fiscal years 2022 through 2025. The outlook also assumes annual expenditure growth of 3% each year.



STORMWATER MANAGEMENT

MISSION STATEMENT

The mission of Stormwater Management is to restore, protect, and preserve the surface waters within the City of Winston-Salem and to maintain, repair, map, and evaluate drainage systems within the street right-of-ways.

PROGRAM DESCRIPTIONS

Stormwater Monitoring and Administration: Manages the day-to-day operations of the Stormwater Management Program. Implements the requirements of the City’s Municipal Separate Storm Sewer System (MS4) permit. Performs watershed master planning by developing maps and inventories of the entire drainage system within the City. Monitors stormwater run-off as part of the program’s efforts to improve water quality. Provides educational programming to increase public awareness of water quality issues.

Drainage Maintenance: Repairs, replaces, and upgrades the City’s drainage system within street right-of-ways. Provides for drainage system repairs on private property through the 70/30 program in which the City covers 70% of the cost for qualified projects. Removes debris from culverts and bridge abutments with many streams and creeks.

Erosion Control: Provides for the enforcement of regulations pertaining to land-disturbing activity, watershed and floodplain requirements by reviewing development plans and issuing grading permits for all commercial and multi-family sites over 10,000 square feet in all areas of Forsyth County, excluding Kernersville. Monitors single family construction sites to ensure that sediment is controlled. Identifies tree save and potential critical areas, controls sedimentation, and limits the time of exposure on all applicable construction sites through plan review and field inspection. Maintains up-to-date floodway district maps to enforce floodway and floodway fringe regulations contained in the Unified Development Ordinance. Reviews survey and plan information and conducts field inspections to ensure that permitted structures comply with floodplain regulations. Enforces watershed regulations for density and impervious coverage on developed properties.

Street Sweeping: Regenerative street sweepers are used year-around to remove litter, debris, and sediment from roads. Sweeping protects water quality by preventing materials from entering the storm drains. All debris swept is disposed of in the sanitary landfill.

EXPENDITURES AND REVENUES SUMMARY

EXPENDITURES BY PROGRAM	Actual	Budget	Proposed	Percent
	<u>FY 19-20</u>	<u>FY 20-21</u>	<u>FY 21-22</u>	<u>Change</u>
Monitoring and Administration				
Administration	\$3,056,847	\$3,474,540	\$3,623,550	4.3%
Water Quality Monitoring	670,180	1,302,540	1,439,880	10.5%
Support for Seasonal Leaf Collection	1,867,520	1,857,630	1,914,970	3.1%
Subtotal	\$5,594,547	\$6,634,710	\$6,978,400	5.2%
Drainage Maintenance	3,349,389	3,559,550	3,340,960	-6.1%
Erosion Control	360,502	386,930	386,680	-0.1%
Street Sweeping	313,769	408,390	402,250	-1.5%
Total Expenditures by Program	\$9,618,207	\$10,989,580	\$11,108,290	1.1%

RESOURCES BY TYPE	Actual FY 19-20	Budget FY 20-21	Proposed FY 21-22	Percent Change
Stormwater Fees:				
Residential	\$4,137,870	\$4,250,000	\$4,250,000	0%
Non-Residential	5,837,609	5,950,000	5,950,000	0%
Replacement Fee	82,178	40,810	40,810	0%
Miscellaneous Revenues	25,021	3,000	3,000	0%
Interest Income	852,814	0	0	N/A
Interfund Charges	182,926	0	0	N/A
Forsyth County	70,679	82,370	115,720	41.0%
Erosion Control Revenues	209,567	173,600	173,430	-0.1%
Fund Balance Appropriation	0	489,800	575,330	14.8%
Total Resources by Type	\$11,398,664	\$10,989,580	\$11,108,290	1.1%
Addition to Fund Balance	\$1,780,457	\$0	\$0	N/A

POSITION SUMMARY

POSITIONS	Amended FY 19-20	Amended FY 20-21	Proposed FY 21-22	Change
Full-Time	56	56	56	0

PERFORMANCE MEASURES AND SERVICE TRENDS

	Actual FY 19-20	Estimated FY 20-21	Projected FY 21-22
Effectiveness			
Respond to 100% of illicit discharge complaints by citizens within 24 hours	100%	100%	100%
Complete 100% of compliance schedules for water quality resolutions within 30 days	100%	100%	100%
Complete 100% of plan reviews within 10 days of receipt	100%	100%	100%
Provide 30 federally required educational programs a year	42	30	50
Ensure 100% of stormwater devices are built in accordance with approved plans	100%	100%	100%
Complete 90% of erosion control initial reviews within 10 days for development projects	100%	100%	100%
Keep 80% of active development sites in compliance (when inspected)	79%	75%	80%

BUDGET HIGHLIGHTS

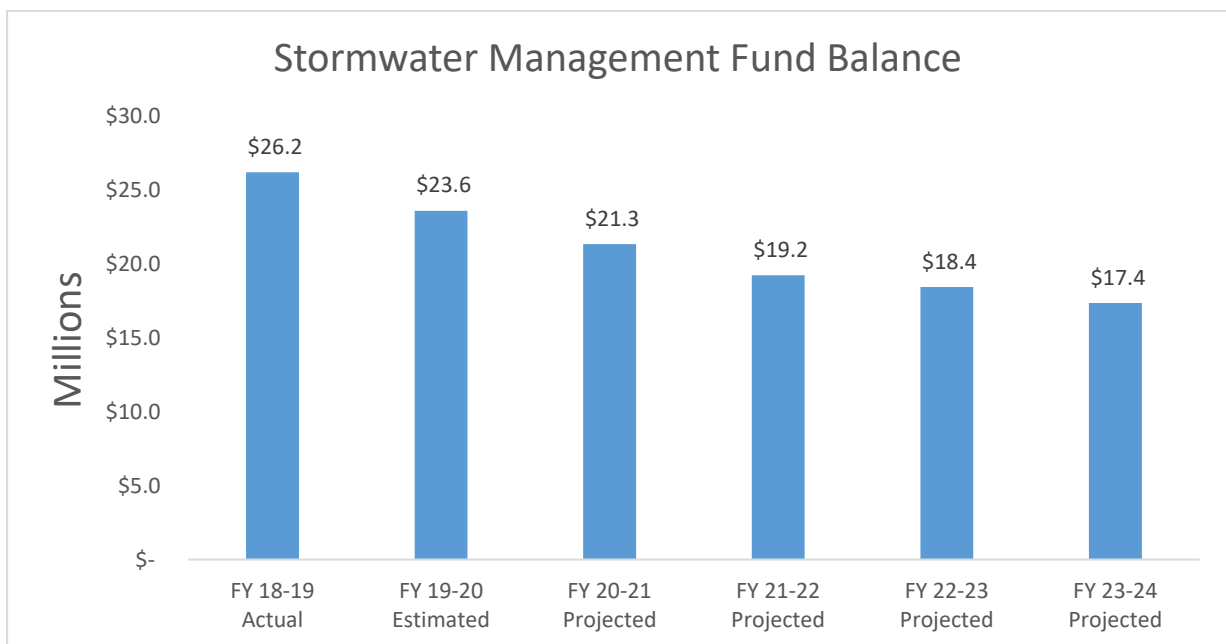
FY 2020 - 21 Year-End Outlook

- The following table provides estimated year-end revenues and expenditures for Stormwater Management operations. Capital project revenues and expenditures are not included.

	Budgeted FY 20-21	Estimated FY 20-21
Operating Revenues	\$10,417,410	11,012,229
Operating Expenditures	(7,235,760)	(9,917,714)
Operating Income	\$3,181,650	\$1,094,515
Debt and Lease Expense	(1,494,360)	(1,480,502)
Transfer to General Fund	(1,866,830)	(1,928,546)
Transfer to Solid Waste	(189,540)	(194,279)
Transfer to Water/Sewer	(120,720)	(123,738)
Net Income	<u>(\$489,800)</u>	<u>(\$2,632,550)</u>

Long Range Financial Outlook

- The following chart provides a projection of the Stormwater Management fund balance. This outlook includes capital project expenditures, assuming all future projects are pay-as-you-go.



HEALTHY ENVIRONMENT CAPITAL PROJECTS

Listed below are the adopted capital projects for the Healthy Environment strategic focus area.

EXPENDITURES	Proposed FY 21-22
<u>Solid Waste Disposal</u>	
Hanes Mill Road Landfill – Mechanically Stabilized Earthen Retaining Wall	\$449,000
 <u>Water and Wastewater Treatment</u>	
Archie Elledge Wastewater Treatment Plant Rehabilitation and Upgrades	\$250,000
Biosolids Dryer Facility Upgrade	500,000
Muddy Creek Wastewater Treatment Plant Rehabilitation and Upgrades	250,000
R.W. Neilson Water Treatment Plant Rehabilitation and Upgrades	40,000,000
Water Treatment Rehabilitation and Upgrades	3,000,000
 <u>Water Distribution and Wastewater Collection</u>	
Asset Management Program / Studies	\$1,500,000
Collection System Improvement Program	15,000,000
Facility Improvements Program	300,000
Lift Station Capacity/Condition Improvements	750,000
NCDOT Road Widening Project Utility Relocations	2,000,000
Water Distribution System Improvements	10,000,000
Water Tank Rehabilitation	250,000
 <u>Stormwater Management</u>	
Basin Study Updates	\$300,000
Drainage Improvements on Private Property	250,000
Stormwater Infrastructure Renovations	1,000,000
 Total Expenditures	 \$75,799,000
 FUNDING SOURCES	
<u>Bonds</u>	
Revenue Bonds	\$22,000,000
 <u>Intergovernmental Resources</u>	
State Water Revolving Loan	\$20,000,000
 <u>Reserves</u>	
Water and Sewer Fund	\$31,800,000
Stormwater Management Fund	1,550,000
Solid Waste Disposal Fund	449,000
 Total Funding Sources	 \$75,799,000