

Chatham County



*Approved FY 2024-2030
Capital Improvements Program*

Table of Contents

Introduction	3
Readers Guide	6
Action Summary	7
Total Cost of Projects by Year	8
Funding Sources	10
Operating Budget Effects	13
Completed Projects	14
Projects:	
General	15
<u>Central Carolina Business Campus</u>	<u>16</u>
<u>Chatham County Detention Center Generator</u>	<u>18</u>
<u>Community College Pittsboro Campus Roof Replacement</u>	<u>19</u>
<u>County Buildings – Agriculture & Conference Center Phase II</u>	<u>20</u>
<u>County Buildings – Animal Shelter Expansion and Renovation</u>	<u>22</u>
<u>County Buildings – Complete Detention Center Final Cell Blocks</u>	<u>25</u>
<u>County Buildings – Emergency Operations Center Expansion</u>	<u>27</u>
<u>County Buildings – New Emergency Services Medical Base</u>	<u>29</u>
<u>County Buildings – Solar Panels at CCA&D&CC</u>	<u>31</u>
<u>County Capital Maintenance and Replacement Plan</u>	<u>33</u>
<u>Emergency Communications Radio System Upgrade</u>	<u>35</u>

<u>Parks – Athletic Field Lighting at Northeast District Park</u>	<u>37</u>
<u>Parks – Briar Chapel Park Improvements</u>	<u>38</u>
<u>Parks – Northwest District Park Dam</u>	<u>41</u>
<u>Parks - Parker’s Ridge Park</u>	<u>42</u>
<u>Schools – Margaret Pollard Expansion</u>	<u>44</u>
<u>Schools – Mobile Classrooms</u>	<u>45</u>
<u>Schools – New Central Services Building</u>	<u>47</u>
<u>Schools – New Elem. School at Chatham Park (Northern Village)</u>	<u>49</u>
<u>Schools – Paving Repair</u>	<u>51</u>
<u>Schools – Replace Gymnasiums at Bennett, Silk Hope, & Bonlee</u>	<u>52</u>
<u>Schools – Resurface Tracks</u>	<u>54</u>
<u>Schools – Seaforth High School</u>	<u>55</u>
<u>Schools – Wastewater Replacement at Silk Hope School</u>	<u>57</u>
<u>Technology – County Fiber Extension to Siler City</u>	<u>58</u>
<u>Technology – Tax Software</u>	<u>60</u>
Water	62
<u>Water – Bynum Wastewater Treatment Plant Upgrade</u>	<u>63</u>
<u>Water – Haywood Water Main Replacement</u>	<u>65</u>
<u>Water – Western Intake and Water Treatment Plant</u>	<u>67</u>
<u>Water – WTP Granular Activated Carbon Upgrade</u>	<u>69</u>
Future Projects	70

Chatham County 2024-2030 Capital Improvements Program Introduction

About the Capital Improvements Program (CIP)

The CIP is a long-term plan for funding the County's major capital needs. It shows how facilities, equipment, and other projects that cost \$100,000 or more could be scheduled and funded over the next seven years, beginning in FY 2024.

It is important to state upfront that this is a PLAN, not a BUDGET, since a budget controls the actual spending of allocated funds. While staff attempts to be as accurate as possible, it is difficult to estimate project costs exactly, particularly early in the planning process. Before funds can be spent, they must be budgeted through the operating budget or, in most cases, through a separately adopted project ordinance.

The same is true for operating costs. As facilities are being planned, staff attempts to identify operating costs, such as staffing and utilities. The cost of these items depends on final square footage and operational issues that may not be apparent until the facility is far along in planning.

CIP Process

The CIP is a plan which is updated annually during the budget process and may be modified at any time to reflect changing conditions. A CIP is a systematic way of anticipating, planning, and budgeting for major projects. The adoption of a CIP can improve the credit worthiness (bond rating) of a jurisdiction.

Timeline for adoption:

- CIP requests originate at the department level. Requests were submitted by departments on or before September 26, 2022.
- The Manager's Office is responsible for reviewing new and existing requests and recommending a proposed CIP to the Board of Commissioners. The recommended CIP will be presented on November 7, 2022.
- Commissioners obtain public input on the CIP before discussing it. A public hearing is scheduled for November 21, 2022.
- Commissioners review the recommendation in detail and make changes. Commissioners have a work session scheduled on December 13, 2022.

- The final action is adoption of the CIP, tentatively scheduled for the December 19, 2022, meeting.

Overall Approach

Two new debt-funded projects are recommended in this CIP, a new elementary school (located in the Northern Village of Chatham Park) and new gymnasiums at Bennett, Silk Hope, and Bonlee Schools. Both projects were listed as future projects in last year's CIP. In FY 2022, the annual contribution to the debt reserve increased by 0.5 cents of the property tax to a total of 9.7 cents, depending on the actual costs for these new projects and any other debt funded projects that are approved in the future, this contribution may need to be increased in a future budget.

Staff tries to include reasonable escalation of costs in project budgets, but because projects are scheduled in the future actual inflation may prove higher than planned inflation. Due to the current high demand for construction and the increasing cost of materials, prior escalation of 5-8% is now too low, and higher rates are now being applied.

An additional point to consider is that the county's authority to levy school impact fees is being studied by the NC General Assembly. If that authority is repealed, approximately three additional cents on the property tax rate would be required to make up for this loss for approved projects in the debt model.

There are significant future projects on the horizon, namely the county complex master plan, the construction of additional elementary or middle schools, and the construction of a shared western intake and water plant on Jordan Lake. These projects will also require debt funding and will add significantly to the county's debt load, which is already projected to be the highest in our population group. To ensure capacity for these critical projects, additional debt-funded projects, which are not deemed an absolute necessity, should be avoided in the near future.

Recommended Changes

The FY2023 -2029 CIP was approved by the Board on December 20, 2021.

Changes to previously approved projects include the following:

Schools: School projects are recommended as requested by the Chatham County Board of Education, unless noted below.

- **Add a new project for a new elementary school in Chatham Park (Northern Village):** During the next 10 years, the Northwood/Seaforth attendance zones are projected to grow by over 1,900 students. This project will provide funding for a new elementary school to be located in the Northern Village of Chatham Park [+47,600,000].
- **Add a new project for an expansion to Margaret Pollard Middle School:** Additional classroom capacity is needed at Margaret Pollard Middle School due to the accelerating pace of growth in the northeast quadrant of the county. This project will provide funding for the installation of 2 additional 6 classroom pods (for a total of 12 additional classrooms) [+2,000,000]
- **Add a new project to replace the gymnasiums at Bennett, Silk Hope, and Bonlee schools:** These gyms were built in 1951 and are undersized and lacking in needed features for middle school athletics. This project will provide funding to replace the existing gymnasiums with new ones that meet the current size and features recommended by the NC Department of Public Instruction [+21,600,000]
- **Shift funding for Mobile Classrooms:** The school system does not anticipate spending any funding in FY 2023 in this project. The budgeted funds will be moved one year out for all years. There is no increase in the total cost of the project; however, with the change the project will now continue into FY 2028.

Other projects: Other projects are recommended as requested by the agency or department, unless otherwise noted.

- **Add a new project to extend County fiber to Siler City:** This project will extend the County's fiber network to the facilities located within Siler City. This project is being funded with ARPA Enabled funds and was previously approved by the Board of Commissioners when discussing priorities for the spending of ARPA funds [+1,000,000].

- **Add a new project to begin construction of Phase 2 of the Chatham County Agriculture & Conference Center:** This project will enhance and expand the ability of the CCACC to educate and exhibit agriculture and agricultural products to both producers and the public at large [+8,556,817].
- **Add a new project to remediate deficiencies at Northwest Park dam:** This project will address the deficiencies that were identified by the NC Department of Environmental Quality during a dam safety inspection in February 2022 [+1,100,000].
- **Add a new project to install upgrades/renovations to the Bynum Wastewater Treatment Plant:** The Bynum WWTP plan is 45 years old and the last improvements were performed in 2006. As a result, some infrastructure and equipment is reaching the end of its expected life cycle. Additionally, there are several safety issues related to the operation and maintenance of the WWTP that need to be addressed. This project will be funded with Utility capital reserves, not General Fund capital reserves [+2,760,000].
- **Add a new project to install Granular Activated Carbon (GAC) at Water Treatment Plant:** This project will install a granular activated carbon (GAC) system at the water treatment plant. The EPA has announced new regulations that will require drinking water to be treated for emerging contaminants such as per-and polyfluoroalkyl substance (PFAS) and 1,4 Dioxane. The existing water treatment plant current treatment processes do not provide treatment for emerging contaminants. This project will be funded with Utility capital reserves, not General Fund capital reserves [+12,100,000].
- **Increase the budget for New Emergency Medical Services Base:** The budget for this project has increased due to increased construction costs and the increased cost of materials (including furnishings and other equipment) [+425,000].

Add Future Projects:

- **New Elementary School at Chatham Park (Southern Village):** Construct a new elementary school in the Southern Village of Chatham Park to meet the projected population growth in the Northwood/Seaforth attendance zones.

The CIP includes both summaries of major projects, revenues and operating expenses and detailed descriptions of each project, including justifications, cost detail, funding sources, and impacts on the operating budget.

Debt-Model Assumptions

- 9.7 cents on the property tax rate is dedicated annually.
- 2% annual growth in property tax revenues/base.
- Impact fees are estimated to grow 3% until FY 2022, when Briar Chapel is expected to be built out and then drop back to 2%.
- No growth is projected for lottery proceeds.

Other Assumptions

- Construction costs are inflated 10-12% per year. Staff also recommends a 5-10% contingency for most projects.
- Other project costs, such as equipment, and operating costs are usually inflated by a factor of 5% per year, unless there is good reason to use another inflationary factor (which will be noted).
- Operating costs are generally inflated 3% per year unless costs are fixed by contract.

Bond Rating

Chatham's ratings are exceptional. Chatham is one of only 10 counties in North Carolina to hold a AAA rating from Standard and Poor's and is by far the smallest county. Both ratings were upgraded in October 2014 and confirmed in 2021:

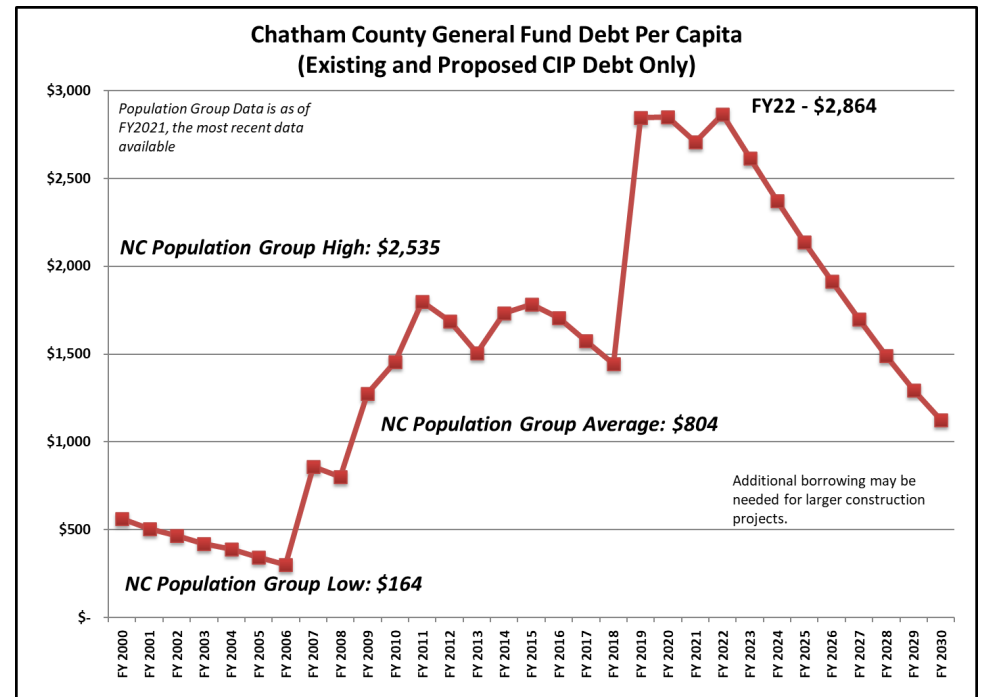
- Standard and Poor's (S&P): AAA (up from AA+)
- Moody's: Aa1 (up from Aa2/favorable outlook)

With a population more than twice as big as Chatham's, Orange County is the next largest county to hold a AAA. Of the surrounding counties, Chatham's combined rating is higher than Alamance, Lee, Harnett, Moore, and Randolph. Chatham holds the highest combined rating in its population group (50,000 to 99,999).

Debt Indicators

Debt indicators are factored as if all projects are approved as recommended.

- Debt as a percent of assessed value: With a projected high of 1.91% in FY 2021, the county's indicator is projected to be the second highest (as of June 30, 2021) within its population group (50,000 to 99,999) and below



the 8% legal maximum. The highest within Chatham's population group is 2.111%. (No county in NC is anywhere near the legal debt limit. The highest in the state is 3.239%)

- Debt per capita: The projected high of \$2,613 in FY 2023 may give Chatham the highest per capita debt in its population group based on the most current information available (June 30, 2021). The county per capita debt would exceed the current highest county (as of June 30, 2021) in its population group, \$3,671.
- Debt as a percent of the operating budget: Staff projects that, depending on decisions made in the operating budget, debt service may exceed the 15% maximum recommended by the Local Government Commission (LGC). While this is an issue, the county differs from other counties in that funds for debt service have been set aside in a reserve account. Therefore, increases in debt service do not decrease Chatham County's flexibility to manage the operating budget, the primary concern of the LGC's maximum.

Readers Guide

Project Budget: The project budget as approved by project ordinance or as approved in the FY 2023-2029 CIP or as recommended FY 2024-2030.

Project Status



Approved-Contracts Let (Part)

County Buildings – New Emergency Medical Services Base

Construct a new 3-bay Emergency Medical Service (EMS) base on 15-501 near Fearrington Village and Briar Chapel.

Project Budget		Budget	Prior to FY 2023	Current Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	Project Totals
Project Element	Project Element											
Expense	Architectural Design & Construction Ad	206,000	72,536	133,464	25,000	0	0	0	0	0	0	231,000
	Construction	1,053,360	0	526,680	926,680	0	0	0	0	0	0	1,453,360
	Contingency	100,000	0	0	100,000	0	0	0	0	0	0	100,000
	Furnishings & Equipment	320,000	0	0	320,000	0	0	0	0	0	0	320,000
	Total Project Element	1,679,360	72,536	660,144	1,371,680	0	0	0	0	0	0	2,104,360
Funding Source:	Funding Source											
Revenue	Capital Reserves	1,679,360	72,536	660,144	1,371,680	0	0	0	0	0	0	2,104,360
	Total Funding Source	1,679,360	72,536	660,144	1,371,680	0	0	0	0	0	0	2,104,360
Operating Effect:	Operating Effect											
Impact on Operating Budget.	Contribution to Capital Reserve	0	1,679,360	0	425,000	0	0	0	0	0	0	2,104,360
	Increased Operating Costs	0	0	0	430,091	442,993	456,283	469,971	484,071	496,593	513,551	3,295,552
	Total Operating Effect	0	1,679,360	0	855,091	442,993	456,283	469,971	484,071	496,593	513,551	5,399,912

Project Totals: Totals all expenditures and revenues, even those expended or received in previous years.

Define Problem

There is a gap in the 12-minute response times for EMS coverage along the 15-501 corridor from just north of Bynum to the Orange County line. A new EMS base near the intersection of 15-501 and Jack Bennett Road will allow for faster response times to some of the higher density populations in the unincorporated part of the county.

Recommended Solution

Construct a 3-bay EMS base on the property and possibly include a morgue in the construction. This location is the optimal spot for a new base to allow faster response times along the 15-501 corridor. The county owns roughly 2.5 acres of land that is occupied by an out of service elevated water tank.

Alternatives

This location is the optimal spot for a new base to allow faster response times along the 15-501 corridor. The county owns roughly 2.5 acres of land that is occupied by an out of service elevated water tank.

Current Stage of Project

Timmons Group has been awarded the design contract for the EMS station. The building and site design is complete. There have been several hurdles to secure the necessary real estate to accommodate the facility. Meetings between the county, Duke Energy Progress, and NCDOT are underway to finalize transference of an abandoned section of 15-501 old roadbed to allow the county to have the needed acreage to proceed with the project. The process to convey property to Duke Energy Progress (to then be conveyed to the County) has been abandoned due to several obstacles. The county is pursuing a Conditional Use Permit (CUP) along with the right-of-way (ROW) abandonment to allow for the construction of the EMS base. Resident notifications and hearings are being scheduled, and the CUP process is expected to be complete in early 2022. Once the CUP is complete the project can be put out to bid. The deed for the abandoned right-of-way has been approved by the NCDOT and is being processed by the County for final conveyance.

Action Summary

Below is a summary of the status of projects in the CIP. Those that are shown as "approved" have already been approved by the Board of Commissioners, either in the FY 2023-2029 CIP or by separate action and there is no substantial change in the project.

Substantially Complete (punch list items in progress)

- Central Carolina Business Campus
- Community College – Pittsboro Campus – Roof Replacement
- County Buildings - Animal Shelter Expansion and Renovation
- Schools - Seaforth High School

New (has not been in a previous CIP)

- County Buildings – Agriculture & Conference Center Phase II
- Parks – Northwest District Park Dam
- Schools - Margaret Pollard Expansion
- Schools - New Elementary School at Chatham Park (Northern Village)
- Schools - Replace Gymnasiums at Bennett, Silk Hope and Bonlee
- Technology - County Fiber Extension to Siler City
- Water – Bynum Wastewater Treatment Plant Upgrade
- Water – Water Treatment Plant (WTP) Activated Carbon Upgrade

Approved-No Contracts (approved in a previous CIP; all or part of the main contract has not been executed, but the project may be in design)

- Chatham County Detention Center Generator
- County Buildings Detention Center Cell Blocks
- County Capital Maintenance and Replacement Plan
- Parks – Parker's Ridge Park
- Parks – Athletic Field Lighting at Northeast District Park
- Schools – Paving Repair
- Schools – Wastewater Replacement at Silk Hope School
- Water - Haywood Water Main Replacement
- Water - Planning Western Intake and Plant

Approved-No Contracts (Part) (approved in a previous CIP; new phase of the project does not yet have contract executed, but the project may be in design.)

- Parks - Briar Chapel Park Improvements

Approved-Contracts Let (approved in a previous CIP; main contract has been executed and project is underway)

- County Buildings – Emergency Operations Center Expansion
- Emergency Communications – Radio System Upgrade
- Parks – Athletic Field Lighting at Northeast District Park
- Schools – New Central Services Building
- Schools - Locker Room Renovations
- Schools - Resurface Tracks
- Technology – Tax Software

Approved-Contracts Let (Part) (approved in a previous CIP; design contract has been executed and project is underway)

- County Buildings – New Emergency Medical Services Base
- County Buildings – Solar Panels at CCA&CC
- Schools - Mobile Classrooms

Future (projects on the horizon but not yet ready to be scheduled)

- Community College - Career and Technical Education Building
- Council on Aging – New Senior Center
- County Buildings - County Complex Master Plan
- County Buildings – New Sheriff's Office
- County Buildings - Northeast Library
- County Buildings – Sheriff's Boat Storage Facility
- County Buildings – Sheriff's Northeast Substation
- County Buildings - Sheriff's Office Warehouse
- Parks - Plans for New and Existing Parks
- Schools – HVAC Upgrades
- Schools - New Elementary School at Chatham Park (Southern Village)
- Schools - New Schools/Capacity Expansion

Total Cost of Each Project by Year

	Prior to FY 2023	Current Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	Totals
General										
Central Carolina Business Campus	8,593,110	500,000	0	0	0	0	0	0	0	9,093,110
Chatham County Detention Center Generator	0	0	627,738	0	0	0	0	0	0	627,738
Community College - Pittsboro Campus - Roof Replacement	0	478,500	0	0	0	0	0	0	0	478,500
County Buildings - Agriculture & Conference Center Phase II	0	0	0	0	0	0	0	0	8,556,817	8,556,817
County Buildings - Animal Shelter Expansion and Renovation	6,336,523	45,973	0	0	0	0	0	0	0	6,382,496
County Buildings - Complete Detention Center Final Cell Blocks	0	1,400,000	1,400,000	0	0	0	0	0	0	2,800,000
County Buildings - Emergency Operations Center Expansion	15,025,241	9,208,089	0	0	0	0	0	0	0	24,233,330
County Buildings – New Emergency Medical Services Base	72,536	660,144	1,371,680	0	0	0	0	0	0	2,104,360
County Buildings - Solar Panels at CCA&CC	0	375,000	0	0	0	0	0	0	0	375,000
County Capital Maintenance & Replacement Plan	295,208	1,700,000	1,530,425	799,027	525,380	659,238	547,526	548,499	4,111,135	10,716,438
Emergency Communications - Radio System Upgrade	12,642,701	7,322,535	0	0	0	0	0	0	0	19,965,236
Parks - Athletic Field Lighting at Northeast District Park	0	213,292	0	0	0	0	0	0	0	213,292
Parks - Briar Chapel Park Improvements	1,478,519	325,000	620,000	0	0	0	0	0	0	2,423,519
Parks - Northwest District Park Dam	0	0	100,000	100,000	100,000	0	0	0	800,000	1,100,000
Parks - Parker's Ridge Park	0	662,159	1,973,863	1,973,863	1,392,000	0	0	0	0	6,001,885
Schools - Margaret Pollard Expansion	0	0	250,000	1,750,000	0	0	0	0	0	2,000,000
Schools - Mobile Classrooms	224,292	0	254,400	261,600	268,800	157,803	164,800	0	0	1,331,695
Schools - New Central Services Building	9,504,338	6,959,542	0	0	0	0	0	0	0	16,463,880
Schools - New Elementary School at Chatham Park (Northern Village)	0	0	0	1,850,000	19,350,000	20,400,000	6,000,000	0	0	47,600,000
Schools - Paving Repair	0	308,359	0	0	2,372,353	0	1,374,776	989,419	0	5,044,907
Schools - Replace Gymnasiums at Bennett, Silk Hope and Bonlee	0	0	0	1,400,000	6,400,000	7,650,000	6,150,000	0	0	21,600,000

Total Cost of Each Project by Year

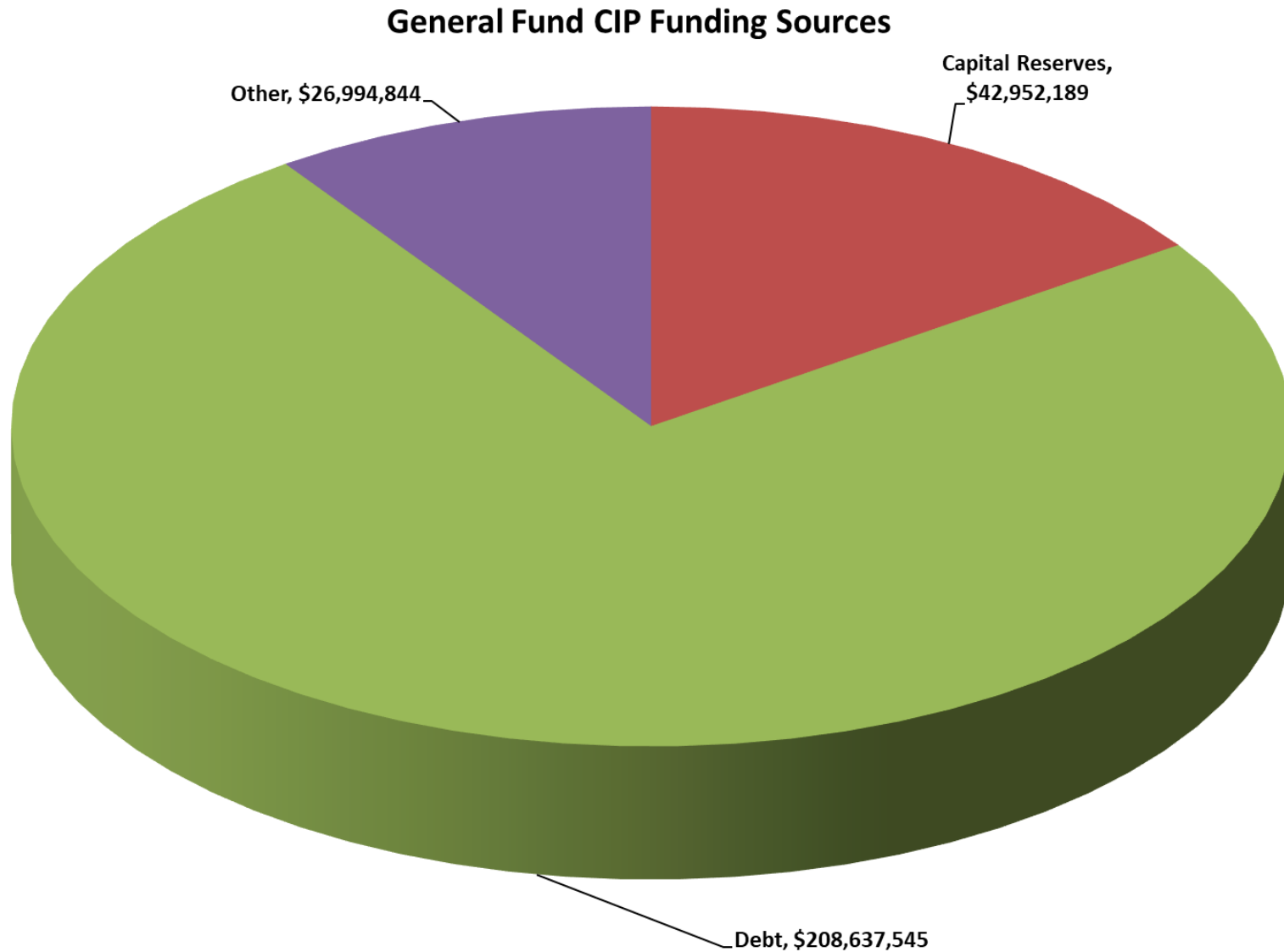
	Prior to FY 2023	Current Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	Totals
Schools - Resurface Tracks	59,459	415,021	0	0	0	0	0	0	0	474,480
Schools - Seaforth High School	85,461,367	1,419,664	0	0	0	0	0	0	0	86,881,031
Schools - Wastewater Replacement at Silk Hope School	0	0	0	643,500	0	0	0	0	0	643,500
Technology - County Fiber Extension to Siler City	0	0	1,000,000	0	0	0	0	0	0	1,000,000
Technology - Tax Software	236,329	177,035	60,000	0	0	0	0	0	0	473,364
Total General	139,929,623	32,170,313	9,188,106	8,777,990	30,408,533	28,867,041	14,237,102	1,537,918	13,467,952	278,584,578
<u>Water</u>										
Water – Bynum Wastewater Treatment Plant Upgrade	0	0	0	0	0	0	0	360,000	2,400,000	2,760,000
Water - Haywood Water Main Replacement	30,192	0	0	0	0	0	0	0	129,700	159,892
Water - Planning Western Intake and Plant	995,241	3,222,133	1,983,725	0	0	0	0	0	0	6,201,099
Water – Water Treatment Plant (WTP) Activated Carbon Upgrade	0	0	0	0	0	0	0	1,000,000	11,100,000	12,100,000
Total Water	1,025,433	3,222,133	1,983,725	0	0	0	0	1,360,000	13,629,700	21,220,991

Funding Sources

The table below shows a summary of the funding sources for CIP projects by year. The major revenue sources are installment and other debt, fund balance, and insurance.

	Prior to FY 2023	Current Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	Totals
General										
911 Grant	0	0	0	0	0	0	0	0	0	0
American Rescue Plan Act Enabled	0	1,162,159	4,273,863	563,978	0	0	0	0	0	6,000,000
Article 46 Sales Tax	0	100,000	142,857	952,742	734,857	0	0	0	571,429	2,501,885
Capital Reserves	7,415,047	7,312,226	4,151,386	3,511,270	3,223,676	817,041	2,087,102	1,537,918	12,896,523	42,952,189
Chatham Schools - DOT/Duke	289,529	0	0	0	0	0	0	0	0	289,529
Coal Ash Funds	0	0	0	500,000	500,000	0	0	0	0	1,000,000
Debt	31,982,379	21,676,263	0	0	0	0	0	0	0	53,658,642
Debt--Certificates of Participation (COPs)	7,364,593	0	0	0	0	0	0	0	0	7,364,593
Debt--Limited Obligation Bonds	76,994,646	1,419,664	0	3,250,000	25,750,000	28,050,000	12,150,000	0	0	147,614,310
General Fund Fund Balance	14,370	0	0	0	0	0	0	0	0	14,370
Grants, Gifts, Etc.	549,882	75,000	0	0	200,000	0	0	0	0	824,882
Interest	3,528,056	0	0	0	0	0	0	0	0	3,528,056
Recreation Exaction Fee--Briar Chapel	1,328,519	325,000	620,000	0	0	0	0	0	0	2,273,519
Transfer from General Fund	257,695	100,000	0	0	0	0	0	0	0	357,695
Transfer from Water Capital Reserve	337,814	0	0	0	0	0	0	0	0	337,814
Transfer in from Debt Reserve	9,867,094	0	0	0	0	0	0	0	0	9,867,094
Total General	139,929,624	32,170,312	9,188,106	8,777,990	30,408,533	28,867,041	14,237,102	1,537,918	13,467,952	278,584,578
Water										
Water Capital Reserve	1,025,433	3,222,133	1,983,725	0	0	0	0	1,360,000	13,629,700	21,220,991
Total Water	1,025,433	3,222,133	1,983,725	0	0	0	0	1,360,000	13,629,700	21,220,991

CIP Funding Sources



General Fund Capital Reserve

The recommended CIP continues the practice of funding pay-as-you-go General Fund projects through a capital reserve. The capital reserve has a balance of \$18,943,075.

Parks & Recreation

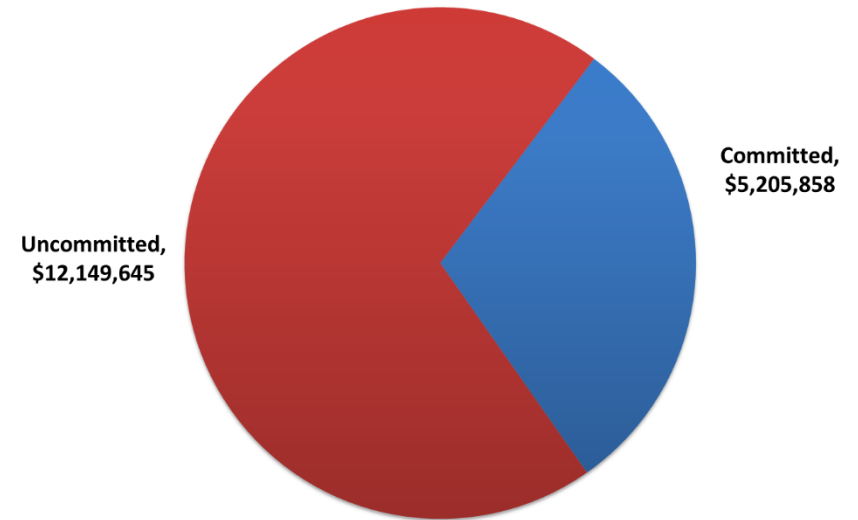
Recreation Fees: Recreation fees are established and collected in two districts. The fees must be spent in the district in which they are collected.

- Western District: Since the economic downturn the Western District, consisting of the Jordan-Matthews and Chatham Central High School districts, has generated very little revenue. Only \$9,316 was collected in FY 2022. These funds will be used to reimburse the general fund until it is made whole for the purchase of Northwest Park. At the current rate of development, this will take many years, leaving no funding for additional land in this district.
- Eastern District: The Eastern District, consisting of the Northwood and Seaforth High School districts, generated \$127,788 in FY 2022, excluding Briar Chapel fees. Note that funds generated in Briar Chapel will be used to pay for improvements in the Briar Chapel Park, as agreed to by the developer. Briar Chapel fees were \$185,200 in FY 2022. In prior years, funds generated by the Eastern District have been used to reimburse the general fund for the purchase of land for the Southeast District Park. However, the Board of Commissioners has approved using funds from the Coal Ash settlement to reimburse the General Fund, so recreation fees are available to purchase additional land for parks in the Northwood/Seaforth District. Since the county has updated the Parks and Recreation Master Plan, it is recommended that further spending of the recreation fee be guided by recommendations from the updated plan.

Water Capital Reserve

\$344,386 in system development fees were collected in FY 2022. Note that the scope of the regional western intake water plan is unknown and will require significant funding.

Uses of Water Capital Reserve



Operating Budget Effects

The table below shows the combined effect on the operating budget of the recommended projects for the next seven years. Operating effects include debt service, increased operating costs, decreased operating costs, additional revenues, and appropriation of revenue necessary to fund the project.

	Prior to FY 2023	Current Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030
General									
Additional Revenues	-1,820	-2,240	-18,740	-19,303	-28,471	-37,658	-38,787	-39,951	-41,150
Contribution to Capital Reserve	20,538,819	2,241,106	3,236,075	3,845,479	2,865,920	2,949,757	2,949,756	2,823,752	2,531,559
Debt Service	10,264,033	11,998,144	11,474,626	11,169,171	11,147,829	16,864,463	16,379,229	15,920,941	15,768,675
Decreased Operating Costs	-73,097	-81,675	-89,455	-59,043	-60,366	-61,509	-62,686	-63,895	11,451
Increased Operating Costs	3,380,073	3,605,642	4,445,006	4,606,039	4,849,157	5,008,761	6,923,325	7,118,943	7,323,381
Transfer from Debt Reserve	-10,264,033	-11,998,144	-11,474,626	-11,169,171	-11,147,829	-16,864,463	-16,379,229	-15,920,941	-15,768,675
Total General	23,843,975	5,762,833	7,572,886	8,373,172	7,626,240	7,859,351	9,771,608	9,838,849	9,825,241
Water									
Contribution to Water Capital Reserve	159,892	0	2,122,857	2,122,857	2,122,857	2,122,857	2,122,857	2,122,857	2,122,858
Total Water	159,892	0	2,122,857	2,122,857	2,122,857	2,122,857	2,122,857	2,122,857	2,122,858

Completed Projects

The following projects were completed as of June 30, 2022.

Project Name	Brief Description	Final Project Budget	Final Cost
Schools – Locker Room Renovations	Renovate locker rooms at Jordan Matthews, Chatham Central, Moncure, JS Waters, & Northwood schools	\$1,323,520	\$1,297,772

General Fund Projects

Central Carolina Business Campus

Substantially Complete

Construct the infrastructure for Chatham County's 458-acre Business Campus in Siler City, including construction of roadways, water lines, sewer lines, and sewer pump stations.

Project Budget	Budget	Prior to FY 2023	Current	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	Project Totals
			Year: FY 2023								
Project Element											
Construction	8,424,498	7,415,298	500,000	0	0	0	0	0	0	0	7,915,298
Design, Engineering & Construction Ad	1,031,146	1,040,346	0	0	0	0	0	0	0	0	1,040,346
Land	137,466	137,466	0	0	0	0	0	0	0	0	137,466
Total Project Element	9,593,110	8,593,110	500,000	0	0	0	0	0	0	0	9,093,110
Funding Source											
Capital Reserves	1,205,070	205,070	500,000	0	0	0	0	0	0	0	705,070
Debt--Certificates of Participation (COP)	7,364,593	7,364,593	0	0	0	0	0	0	0	0	7,364,593
Grants, Gifts, Etc.	399,882	399,882	0	0	0	0	0	0	0	0	399,882
Interest	28,056	28,056	0	0	0	0	0	0	0	0	28,056
Transfer from General Fund	257,695	257,695	0	0	0	0	0	0	0	0	257,695
Transfer from Water Capital Reserve	337,814	337,814	0	0	0	0	0	0	0	0	337,814
Total Funding Source	9,593,110	8,593,110	500,000	0	0	0	0	0	0	0	9,093,110
Operating Effect											
Contribution to Capital Reserve	0	1,048,759	159,773	0	0	0	0	0	0	0	1,208,532
Debt Service	0	608,606	588,726	323,922	315,304	552,676	286,150	277,753	269,355	212,853	3,435,345
Increased Operating Costs	0	56,174	57,860	59,596	61,383	63,224	65,122	67,075	69,088	71,161	570,682
Transfer from Debt Reserve	0	-608,606	-588,726	-323,922	-315,304	-552,676	-286,150	-277,753	-269,355	-212,853	-3,435,345
Total Operating Effect	0	1,104,933	217,633	59,596	61,383	63,224	65,122	67,075	69,088	71,161	1,779,214

Define Problem

Lack of property served by adequate infrastructure is a challenge for economic development. In 2000, Chatham County purchased property for a business campus in Siler City. At the time it was purchased, the property was located just outside the town limits of Siler City. The town has since annexed it and is providing water and sewer through infrastructure built by the county. In addition, the county has also provided roads to ensure easy access for potential development. Three entities are now located within the campus: Chatham Hospital, the Chatham Youth Development Center and Central Carolina Community College.

Recommended Solution

The project is substantially complete.

Current Stage of Project

The business park was substantially complete in November 2009. Many of the engineering design and construction administration problems are in the process of being resolved. All needed additional easements for the bridge and roadway and dedication of the additional right-of-way requested by NC Department of Transportation (NCDOT) have been obtained, except for two properties. Remaining issues include the DOT requirement for the county to post

a ten-year bond for future maintenance of the culverts.

Negotiations with the landowner for placement of a sign are in progress. Design and cost estimates for the sign are complete. Once negotiations for the sign easement are complete, the approval process will begin. Replacement of a temporary sign was negotiated with the landowner, and that sign is now in place.

Because of engineering design and construction administration problems, additional easements and rights-of-way must be obtained for NCDOT to accept and maintain roads; plats have been recorded for easements and rights-of-way obtained to date. Once the final two properties are resolved, a final plat that satisfies NCDOT will be executed and recorded. DOT has executed the maintenance agreement. The County has initiated a contract to clear the right of way (ROW) in preparation for transferring the maintenance of the roads and ROW to DOT.

DOT has completed a punch list for repairs needed before they will take ownership of the road. This punch list includes overlay of the entire length of Progress Blvd and full depth repair of the intersections of Progress Blvd with both Campus Drive and Technology Way. Additionally, the routine inspections of the bridge over Loves Creek identified required repairs, and DOT requires installation of a traffic signal at Progress Blvd and Highway 64.

The traffic signal project is complete. The work was accepted by NCDOT on February 9, 2021.

A new engineering firm is lined up to take over the project. Once a contract has been established, they will assist the county with further assessment and meetings with DOT to develop a scope of work that will meet DOT's requirements to take over maintenance of Progress Blvd. An independent inspector is reviewing the bridge and culverts to provide an assessment of potential repairs and the associated cost.

Relation to Other Projects

The Central Carolina Community College job training center is complete.

Professional Services Needed

Possible Engineering design work and construction management may still be needed.

Operating Impact

Funds are needed for bonds, grounds maintenance and electricity. As taxpaying entities locate in the business campus, the county would see an increase in property and sales tax revenues.

Chatham County Detention Center Generator

Approved-No Contracts

Purchase and install a second generator at the Detention Center.

Project Budget	Budget	Current									Project Totals
		Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	
Project Element											
Contract	43,709	0	0	43,709	0	0	0	0	0	0	43,709
Furnishings & Equipment	584,029	0	0	584,029	0	0	0	0	0	0	584,029
Total Project Element	627,738	0	0	627,738	0	0	0	0	0	0	627,738
Funding Source											
Capital Reserves	627,738	0	0	627,738	0	0	0	0	0	0	627,738
Total Funding Source	627,738	0	0	627,738	0	0	0	0	0	0	627,738
Operating Effect											
Contribution to Capital Reserve	0	209,246	209,246	209,246	0	0	0	0	0	0	627,738
Increased Operating Costs	0	0	0	15,750	15,750	15,750	15,750	15,750	15,750	15,750	110,250
Total Operating Effect	0	209,246	209,246	224,996	15,750	15,750	15,750	15,750	15,750	15,750	737,988

Define Problem

The generator that is currently integrated into the Detention Center’s electrical system does not power the entire building as well as all daily needs for a prolonged power outage. Additionally, the current generator only powers one water heater for the kitchen and does not power any water heaters for shower usage or other needs.

Recommended Solution

Purchase and install a second generator to ensure the availability of office space for shelter needs and as an alternative emergency operations center.

Alternatives

Option 1: Rent a second generator as needed. During Hurricane Florence (September 2018), the County was quoted a price of \$30,000 to transport the generator to the Detention Center and an additional \$21,000 per week rental fee.

Option 2: Do nothing at this time. This would make it impossible to utilize the administration section of the Detention Center and necessitate staff sheltering elsewhere. Additionally, during a prolonged weather event, this alternative would require additional transportation of inmates to other facilities, in order to meet North Carolina Administrative Code requirements.

Professional Services Needed

Electrical engineering services will be needed.

Operating Impact

Additional funds will be needed for fuel and a service contract.

Community College - Pittsboro Campus - Roof Replacement

Substantially Complete

Replace the roof on Building 42 on the Pittsboro Campus.

Project Budget	Budget	Prior to FY 2023	Current	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	Project Totals
			Year: FY 2023								
Project Element											
Architectural Design & Construction Ad	12,100	0	12,100	0	0	0	0	0	0	0	12,100
Construction	418,500	0	418,500	0	0	0	0	0	0	0	418,500
Contingency	41,850	0	41,850	0	0	0	0	0	0	0	41,850
Engineering & Construction Administrat	6,050	0	6,050	0	0	0	0	0	0	0	6,050
Total Project Element	478,500	0	478,500	0	0	0	0	0	0	0	478,500
Funding Source											
Capital Reserves	478,500	0	478,500	0	0	0	0	0	0	0	478,500
Total Funding Source	478,500	0	478,500	0	0	0	0	0	0	0	478,500
Operating Effect											
Contribution to Capital Reserve	0	387,357	91,143	0	0	0	0	0	0	0	478,500
Total Operating Effect	0	387,357	91,143	0	0	0	0	0	0	0	478,500

Define Problem

The current roof on building 42 on the Pittsboro campus is original to the building (1996). The roof is a membrane-type roof and will need to be replaced in by 2022. The college is not currently experiencing issues with the roof; however, college officials anticipate the likelihood that it will need to be replaced sometime within the timeframe of the County's CIP. Since the roof is no longer under warranty, the repair costs will be paid by the College and the county.

Recommended Solution

A new roof should be planned for this building by 2022.

Alternatives

Option 1: Replace the roof with a new roof. A roofing engineer would need to be hired to determine the best roofing option available.

Option 2: Make minor repairs to the roof as issues develop and work with a roofing engineer to determine whether there are short term solutions that will alleviate the need for a roof replacement.

Professional Services Needed

A roofing engineer would be needed.

County Buildings - Agriculture & Conference Center Phase II

New

Begin phase 2 development of Agriculture and Conference Center site to include: covering the arena, additional arena seating, arena amenities such as an announcer stand and bathrooms, and a covered space capable of supporting RV hookups, farmer's market, outdoor education, and outdoor event space.

Project Budget	Budget	Current									Project Totals	
		Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030		
Project Element												
Construction	0	0	0	0	0	0	0	0	0	0	8,556,817	8,556,817
Total Project Element	0	0	0	0	0	0	0	0	0	0	8,556,817	8,556,817
Funding Source												
Capital Reserves	0	0	0	0	0	0	0	0	0	0	8,556,817	8,556,817
Total Funding Source	0	0	0	0	0	0	0	0	0	0	8,556,817	8,556,817
Operating Effect												
Contribution to Capital Reserve	0	0	0	500,000	1,069,602	1,069,602	1,169,602	1,169,602	1,169,602	1,169,602	1,169,602	7,317,612
Increased Operating Costs	0	0	0	0	0	0	0	0	0	0	1,200	1,200
Total Operating Effect	0	0	0	500,000	1,069,602	1,069,602	1,169,602	1,169,602	1,169,602	1,169,602	1,170,802	7,318,812

Define Problem

Plan Chatham, the county's adopted comprehensive plan for the next 25 years, includes goals to preserve the rural character and lifestyle of Chatham County and to preserve, protect, and enable agriculture and forestry. Chatham County has limited venues where the county's agricultural products can be exhibited or utilized as teaching tools for both producers and the public at large. The projected growth of the county and the importance that agriculture plays in our local economy and way of life, make it important to have facilities in place to educate the public and producers. This education will enhance agricultural literacy and our county's agricultural impacts. The multipurpose nature of these facilities will facilitate their utilization by other county departments and the local public school system as well. These facilities will also serve as revenue-generating venues by outside/private entities that would have to travel to Raleigh, NC to find similar venue spaces.

Recommended Solution

Recommend moving forward with plans to develop phase 2a of the Agriculture and Conference Center site.

Alternatives

Alternative #1 – Full enclosing of the arena, but estimated cost on that is far higher (est. \$15M).

Alternative #2 – Non solarization, non-RV hook-up capability of outdoor covered pavilion area.

Alternative #3 – Do nothing at this time. This would make it impossible to increase the number and types of offerings at the Agriculture & Conference Center.

Description of Land Needs

Adequate acreage currently held by the county is available to house the construction of new facility on the grounds of the CCACC.

Professional Services Needed

Architectural, design, and constructions services may be needed in the future.

County Buildings - Agriculture & Conference Center Phase II

New

Operating Impact

Additional funding would be needed for operational expenses; however, many of these expenses would be related to revenue-generating events and programmatic efforts.

County Buildings - Animal Shelter Expansion and Renovation

Substantially Complete

Build a 7,931-square-foot addition to the existing Animal Control shelter and renovate the existing 2,600-square-foot building to meet the needs of animals, visiting public, and staff. Separation of adoptable animals from those who are ill or otherwise not available for adoption will facilitate adoptions of shelter animals. The new building will provide adequate space for staff, and conform to industry best practices.

Project Budget	Budget	Current									Project Totals
		Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	
Project Element											
Architectural Design & Construction Ad	567,750	537,582	0	0	0	0	0	0	0	0	537,582
Construction	5,597,191	5,576,419	0	0	0	0	0	0	0	0	5,576,419
Contingency	0	0	0	0	0	0	0	0	0	0	0
Feasibility Study	14,370	14,370	0	0	0	0	0	0	0	0	14,370
Furnishings & Equipment	208,817	137,544	45,973	0	0	0	0	0	0	0	183,517
Other Contracted Services	71,523	70,608	0	0	0	0	0	0	0	0	70,608
Permits & Connection Fees	0	0	0	0	0	0	0	0	0	0	0
Total Project Element	6,459,651	6,336,523	45,973	0	0	0	0	0	0	0	6,382,496
Funding Source											
Capital Reserves	6,445,281	6,322,153	45,973	0	0	0	0	0	0	0	6,368,126
General Fund Fund Balance	14,370	14,370	0	0	0	0	0	0	0	0	14,370
Total Funding Source	6,459,651	6,336,523	45,973	0	0	0	0	0	0	0	6,382,496
Operating Effect											
Contribution to Capital Reserve	0	6,322,153	45,973	0	0	0	0	0	0	0	6,368,126
Decreased Operating Costs	0	-14,000	-14,000	-14,000	-14,000	-14,000	-14,000	-14,000	-14,000	-14,000	-126,000
Increased Operating Costs	0	133,349	126,277	130,032	133,900	137,884	141,988	146,215	148,849	153,314	1,251,808
Total Operating Effect	0	6,441,502	158,250	116,032	119,900	123,884	127,988	132,215	134,849	139,314	7,493,934

Define Problem

The animal control shelter was built in 1993 and its space is inadequate for dogs, cats, staff and the public.

The shelter is overcrowded. The 20 dog runs and the small area for cats stay full, making overcrowding the main reason for euthanizing animals. Between FY 2011 and FY 2016, 11,176 dogs and cats were sheltered, and 3,170 of these were euthanized for lack of space despite being eligible for adoption. Public interest in the animal services field continues to increase. Encouraged by the national focus on animal welfare issues, local groups maintain interest in the way the county operates the Animal Services division. The Animal Services division operates the only county-run open admission facility in the area. To provide the best services to our community and animals, the division works to find positive outcomes for all healthy adoptable animals, to prevent pet overpopulation with spay and neuter efforts, and, when necessary, to give animals the most humane euthanasia possible.

A needs assessment conducted in 2014 by Bacon Group Inc. concluded that current animal intake numbers indicate a need for 34 dog kennels and 34 cat housing units. The needs assessment identified many problems with the existing facility including:

- A single kennel area contributes to disease transmission. Best practices for modern animal shelters call for separately contained and ventilated kennel areas for daily intake, bite quarantine, health quarantine, healthy strays, and adoptable animals. The existing shelter has one kennel room with 10 runs on

either side, making it difficult to separate animals, control disease, treat sick animals, and provide appropriate care.

- Public and staff areas of the shelter are inadequate. The lobby serves as offices for the shelter manager and shelter attendants and also is where adoption services are provided to the public. As a result, newly arrived animals are in the same area as animals being considered by the public for adoption. This creates confusion and stress for the public, staff and animals.
- The building has only one restroom for staff and no public restrooms.
- There is inadequate space for treatment of animals that come into the shelter in need of testing, immunization and simple first-aid procedures. The “kitchen” serves as an animal treatment room, laundry room, utility room, storage and is also where staff washes dishes and equipment.
- There is inadequate space for staff. The facility does not allow staff to function efficiently, safely, and, when necessary, out of the view of the public. The animal control supervisor and four animal control officers are housed in a leased trailer adjacent to the shelter building.
- Additional storage space is required. A wooden storage building behind the kennel runs currently provides storage for dog and cat food. More permanent solutions should be considered that will not require employees to transport food between buildings in all kinds of weather and that will reduce pests and vermin from having access to the food sources of shelter animals.
- There are several areas of concern for the safety of the staff, public, and animals. Open kennel drain trenches pose a risk of injury as well as transmission of disease due to washing excrement past kennels of healthy animals. The chain link fencing, coated steel cable systems, and plastic guillotine doors are showing wear due to aging and represent potential hazards. Replacement of these materials with more current materials will decrease risk of injury to the staff. The current kennel wall surfaces have deteriorated and continue to do so. This allows for diseases like deadly canine parvo virus to stabilize in the setting and reinfect other incoming animals. The steel columns and interior walls are constantly being exposed to harsh chemicals and moisture, causing them to rust. The current euthanasia area is outdoors. While it is covered, it is still exposed to elements such as rain, cold, and heat, creating stress for animals and staff during the euthanasia process. According to the American Shelter Veterinarians Standards of Care report, euthanasia should be performed in a location where other animals can neither see nor hear the process.
- The current shelter does not facilitate the adoption of cats and dogs. When the public comes to the shelter for the potential purpose of adopting animals, they are not presented with a clear choice. Due to space limitations, the “adoptable” dogs are intermingled with strays not available for adoption, dogs quarantined for observation for rabies symptoms, and dogs whose temperaments are not suitable for adoption. Potential adopters know that many of the dogs they are viewing will be euthanized in the shelter, which keeps many people from visiting the shelter. The shelter has no interior “meet and greet” area for potential adopters to interact with the dogs, so they are normally directed to take the dog outside on a leash to interact for a short time.

Recommended Solution

Renovate and expand the existing animal control shelter to provide a facility that is safe, healthy and functional for staff, visitors, and animals.

The Bacon Group needs assessment included recommendations for the design of a new shelter and renovations to the existing space that will provide separate intake and adoption buildings and include future space for spay/neuter surgery and education for the public. The design recommendations will address the problems identified with the existing facility, as discussed above, and make shelter operations more efficient. The separation of the buildings and updated HVAC systems will work to reduce disease transmission between animal populations and facilitate the adoption of animals. Future space for spay/neuter surgery would eliminate the need for staff to transport animals to and from veterinarian offices for surgery. Space for public education would permit outreach to the community and enhance public awareness of the roles and responsibilities of the community in reducing euthanasia due to pet overpopulation and disease control. The recommendation calls for fundraising for these two future spaces.

Continue discussions and partnerships with non-profit agencies to create more options for positive outcomes for the shelter animals.

Alternatives

Option 1: Do nothing. Continue to operate the existing facility despite the problems and community interest in improvements. Because the agency is required to meet certain housing standards in the Animal Welfare Act, services would have to be cut to meet requirements for inspection by the North Carolina Department of Agriculture. Disease and illness in the animal population would continue to be a costly issue and both staff morale and customer satisfaction would be compromised.

Option 2: Partner with a local nonprofit agency to house an adoption center in the Pittsboro area that would draw animals from the animal control shelter as

County Buildings - Animal Shelter Expansion and Renovation

Substantially Complete

well as from other sources. While such a partnership could increase the adoption rate, it does not meet the critical and immediate need to expand and renovate the existing facility. A new facility is needed to provide sheltering to support animal control enforcement and best practices for protecting animal health and improving outcomes.

Option 3: Partner with a nonprofit group to oversee and manage the animal sheltering capabilities in the county. This could be a viable option if there was a local nonprofit group that could sustain the core functions and funding of the shelter. However, there is no local agency with positive past performance of operating as a shelter.

Option 4: Renovate and expand the existing animal control facility according to design recommendations from the Bacon Group. The new facility will provide separate intake and adoption areas and house 143 animals. The building would have a life expectancy of 25 to 30 years.

Construction will address essential needs for animal shelter operations, including:

- A new building that adds an additional 40 kennels for canines and 42 cat housing units.
- Updated staff spaces that include shelter administrative offices, grooming areas, food prep areas, laundry room with commercial grade appliances, designated treatment rooms, break room and janitorial area.
- A rally port/intake area for officers to safely load and unload animals without escape. A designated euthanasia area will be in this structure.
- Private feral cat holding room in the intake area to reduce travel and stress.
- The renovation of the existing facility would increase the efficiency of the current building. This building would house field office staff, sick isolation and dangerous animal holding.

Several community members and nonprofit agencies have expressed interest in conducting fundraising campaigns to strengthen the availability of funds for a new shelter. Although not essential to shelter operations, the recommendation includes shell space that can be completed in the future with private donations. This space could serve as a community education and training room to host meetings and educational events. The design also includes design of a surgical suite that could be added later through fundraising.

Current Stage of Project

Contracts were approved by the Board of Commissioners in September of 2018 and the project schedule has been revised. PNP Design Group is the design firm and Bordeaux Contracting is the Construction Manager. On June 1, 2020, the Board of Commissioners approved Bordeaux Construction to proceed with the project at a guaranteed maximum price. Construction began June 8, 2020, and the total project is scheduled to complete by the end of Fiscal 2021.

A Certificate of Occupancy for the new Phase 1 of the project was obtained July 1, 2021, allowing staff to occupy the new space. A Certificate of Occupancy for the Phase 2 renovation of the old shelter was obtained October 1, 2021.

Description of Land Needs

Existing two acres.

Professional Services Needed

Planning and architectural services will be needed. A preliminary needs assessment and cost estimates were completed in 2014.

Operating Impact

Additional funds will be needed for staffing, equipment, and building maintenance.

County Buildings - Complete Detention Center Final Cell Blocks

Approved-No Contracts

Complete construction of the final two cell blocks at the Chatham County Detention Center.

Project Budget	Budget	Prior to FY 2023	Current	Year 1:	Year 2:	Year 3:	Year 4:	Year 5:	Year 6:	Year 7:	Project Totals
			Year: FY 2023	FY 2024	FY 2025	FY 2026	FY 2027	FY 2028	FY 2029	FY 2030	
Project Element											
Construction	0	0	1,300,000	1,300,000	0	0	0	0	0	0	2,600,000
Contingency	0	0	25,000	25,000	0	0	0	0	0	0	50,000
Contracted Services	0	0	25,000	25,000	0	0	0	0	0	0	50,000
Furnishings & Equipment	0	0	50,000	50,000	0	0	0	0	0	0	100,000
Total Project Element	0	0	1,400,000	1,400,000	0	0	0	0	0	0	2,800,000
Funding Source											
American Rescue Plan Act Enabled	0	0	600,000	1,400,000	0	0	0	0	0	0	2,000,000
Capital Reserves	0	0	800,000	0	0	0	0	0	0	0	800,000
Total Funding Source	0	0	1,400,000	1,400,000	0	0	0	0	0	0	2,800,000
Operating Effect											
Contribution to Capital Reserve	0	800,000	0	0	0	0	0	0	0	0	800,000
Increased Operating Costs	0	0	0	500,000	515,000	530,450	546,364	562,754	579,637	597,026	3,831,231
Total Operating Effect	0	800,000	0	500,000	515,000	530,450	546,364	562,754	579,637	597,026	4,631,231

Define Problem

When the Chatham County Detention Center was constructed, two cell blocks were left as shell space, to be completed in the future to accommodate growth. The current rise in the inmate population could result in more crowding in the existing cell blocks with potentially 3 inmates in a cell instead of 2 inmates in a cell. This could create more stress and safety concerns for inmates and staff, such as the increased potential for a physical altercation. Also, as the county population increases the inmate population is expected to increase. In addition, completion of two additional cell blocks would make it easier for the Detention Center to comply with the Prison Rape Elimination Act (PREA), passed by Congress in 2003. During the summer of 2021, the average daily population (ADP) of the Detention Center increased due to the slowdown in court activity caused by the pandemic. As courts resume and the backlog is addressed some decrease in the ADP is expected. Total capacity of the Detention Center is 110 beds. Maintaining an average daily population in the 90's puts inmates and staff at a high risk of danger. Maintaining an average daily population more than 85% of capacity makes inmate management extremely difficult and, in some cases, nearly impossible.

Recommended Solution

Plan to complete construction of the final two cell blocks of the Chatham County Detention Center. Utilize a portion of the funds available from the American Rescue Plan Act (ARPA) along with existing capital reserve funds to begin construction on this project in FY2023. Using ARPA funds to complete this high cost project will ease the burden on the large transfer that would be needed to be made to the capital reserve in the operating budget, thus freeing up capacity to address future needs.

Alternatives

Option 1: Increase effort for Pre-Trial release or other programs to keep inmates out of jail.

Option 2: House inmates at other jails or facilities as needed on a cost-per-day basis. This alternative will lead to additional operating costs due to increased transportation expenses.

Professional Services Needed

Design, and construction services will be needed.

Operating Impact

Additional funds will be needed to operate a larger detention center.

County Buildings - Emergency Operations Center Expansion

Expand the Emergency Operations Center so the Communications Division can expand.

Project Budget	Current										
	Budget	Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	Project Totals
Project Element											
Construction	19,106,480	11,211,427	7,895,053	0	0	0	0	0	0	0	19,106,480
Contracted Services	171,697	121,241	50,456	0	0	0	0	0	0	0	171,697
Design, Engineering & Construction Ad	1,376,715	1,258,797	117,918	0	0	0	0	0	0	0	1,376,715
Financing costs	75,000	121,795	0	0	0	0	0	0	0	0	121,795
Furnishings & Equipment	1,319,632	128,175	1,144,662	0	0	0	0	0	0	0	1,272,837
Land	2,183,806	2,183,806	0	0	0	0	0	0	0	0	2,183,806
Total Project Element	24,233,330	15,025,241	9,208,089	0	0	0	0	0	0	0	24,233,330
Funding Source											
Debt	23,541,630	9,835,339	9,208,089	0	0	0	0	0	0	0	19,043,428
Transfer in from Debt Reserve	691,700	5,189,902	0	0	0	0	0	0	0	0	5,189,902
Total Funding Source	24,233,330	15,025,241	9,208,089	0	0	0	0	0	0	0	24,233,330
Operating Effect											
Debt Service	0	577,760	1,786,098	1,737,686	1,689,275	1,640,864	1,592,453	1,544,042	1,495,630	1,447,219	13,511,026
Increased Operating Costs	0	165,663	210,049	115,395	118,841	122,390	126,044	129,809	133,688	137,684	1,259,563
Transfer from Debt Reserve	0	-577,760	-1,786,098	-1,737,686	-1,689,275	-1,640,864	-1,592,453	-1,544,042	-1,495,630	-1,447,219	-13,511,026
Total Operating Effect	0	165,663	210,049	115,395	118,841	122,390	126,044	129,809	133,688	137,684	1,259,563

Define Problem

The existing Emergency Operations Center (EOC) houses the EOC meeting room where decision makers gather during disasters to make informed decisions on response and recovery efforts. It also houses the Chatham County Public Safety Answering Point (PSAP), better known as the 911 Communications Center. The EOC was completed and occupied in 1994. The communications room was built to hold four telecommunicator consoles and associated telephone and radio equipment. In the past few years the number of consoles has increased to six, with one of those being placed in the corner of the EOC meeting room because the communications room is full. If existing estimates for population growth in Chatham County are fulfilled, the Communications Division will need to hire more full-time telecommunicators. This will require more consoles and associated equipment. Since the communications room is currently filled to capacity, there is no room for this needed expansion.

Recommended Solution

Design and build a new Emergency Operations Center / 9-1-1 Communications Center on land purchased by the County.

Alternatives

Option 1: Do nothing. Continue to place the consoles in the EOC portion of the building. This would reduce the space in the EOC, which is already too small and is filled to capacity during activations.

Option 2: Expand the current Emergency Operations Center, either by constructing a second-floor addition or building out from the building. The EOC was originally intended to allow a second story, but current building codes would need to be evaluated to determine if a second floor or a build out is feasible.

Option 3: The current backup center in Siler City could be used to expand communications. Smaller consoles would have to be used, so this solution would

not allow the backup center to mirror the primary center.

Option 4: Build an entirely new Emergency Operations/Communications Center at undetermined location.

Current Stage of Project

and finalized costs. The project was accelerated to be included in the same time frame as the radio replacement project. This will maximize the effectiveness and efficiency of both projects. A firm was selected in August 2019 to perform design and land planning services for the construction of a new EOC on land purchased by the County. A firm was selected in June 2020 to serve as the construction manager for the project. An early site package that included grading and road construction is nearly complete. A Notice to Proceed was issued by the County in July 2021 for the full project and permits were issued in October 2021. The building is under construction with an estimated completion date of March 2023. The new co-located radio tower, a separate but related project, has been constructed on the site.

Relation to Other Projects

This project is related to the Emergency Communications Radio Upgrade project. Both projects require debt to be funded. Upgrading the radio system will require changes to the Emergency Operations Center that should be completed at the same time to maximize the capacity for borrowing and to provide synchrony between the two projects. There is also the opportunity to align this project with the initiative to develop solar photovoltaic systems for onsite energy generation at County buildings.

Professional Services Needed

An architectural design feasibility study, and further architectural, design, and construction services would be needed.

Operating Impact

Additional funds will be needed for utilities, technical equipment and building maintenance

County Buildings – New Emergency Medical Services Base

Approved-Contracts Let (Part)

Construct a new 3-bay Emergency Medical Service (EMS) base on 15-501 near Fearington Village and Briar Chapel.

Project Budget	Budget	Current									Project Totals
		Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	
Project Element											
Architectural Design & Construction Ad	206,000	72,536	133,464	25,000	0	0	0	0	0	0	231,000
Construction	1,053,360	0	526,680	926,680	0	0	0	0	0	0	1,453,360
Contingency	100,000	0	0	100,000	0	0	0	0	0	0	100,000
Furnishings & Equipment	320,000	0	0	320,000	0	0	0	0	0	0	320,000
Total Project Element	1,679,360	72,536	660,144	1,371,680	0	0	0	0	0	0	2,104,360
Funding Source											
Capital Reserves	1,679,360	72,536	660,144	1,371,680	0	0	0	0	0	0	2,104,360
Total Funding Source	1,679,360	72,536	660,144	1,371,680	0	0	0	0	0	0	2,104,360
Operating Effect											
Contribution to Capital Reserve	0	1,679,360	0	425,000	0	0	0	0	0	0	2,104,360
Increased Operating Costs	0	0	0	430,091	442,993	456,283	469,971	484,071	498,593	513,551	3,295,552
Total Operating Effect	0	1,679,360	0	855,091	442,993	456,283	469,971	484,071	498,593	513,551	5,399,912

Define Problem

There is a gap in the 12-minute response times for EMS coverage along the 15-501 corridor from just north of Bynum to the Orange County line. A new EMS base near the intersection of 15-501 and Jack Bennett Road will allow for faster response times to some of the higher density populations in the unincorporated part of the county.

Recommended Solution

Construct a 3-bay EMS base on the property and possibly include a morgue in the construction. This location is the optimal spot for a new base to allow faster response times along the 15-501 corridor. The county owns roughly 2.5 acres of land that is occupied by an out of service elevated water tank.

Alternatives

This location is the optimal spot for a new base to allow faster response times along the 15-501 corridor. The county owns roughly 2.5 acres of land that is occupied by an out of service elevated water tank.

Current Stage of Project

Timmons Group has been awarded the design contract for the EMS station. The building and site design is complete. There have been several hurdles to secure the necessary real estate to accommodate the facility. Meetings between the county, Duke Energy Progress, and NCDOT are underway to finalize transference of an abandoned section of 15-501 old roadbed to allow the county to have the needed acreage to proceed with the project.

The process to convey property to Duke Energy Progress (to then be conveyed to the County) has been abandoned due to several obstacles. The county is pursuing a Conditional Use Permit (CUP) along with the right-of-way (ROW) abandonment to allow for the construction of the EMS base. Resident notifications and hearings are being scheduled, and the CUP process is expected to be complete in early 2022. Once the CUP is complete the project can be put out to bid. The deed for the abandoned right-of-way has been approved by the NCDOT and is being processed by the County for final conveyance.

County Buildings – New Emergency Medical Services Base

Approved-Contracts Let (Part)

Professional Services Needed

Design, engineering, and construction services would be needed.

Operating Impact

Additional funds will be needed for technical equipment and building maintenance.

County Buildings - Solar Panels at CCA&CC

Install a solar panel system on the roof of the CCA&CC.

Project Budget	Current										Project Totals
	Budget	Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	
Project Element											
Construction	350,000	0	350,000	0	0	0	0	0	0	0	350,000
Contingency	25,000	0	25,000	0	0	0	0	0	0	0	25,000
Total Project Element	375,000	0	375,000	0	0	0	0	0	0	0	375,000
Funding Source											
Capital Reserves	275,000	0	200,000	0	0	0	0	0	0	0	200,000
Grants, Gifts, Etc.	0	0	75,000	0	0	0	0	0	0	0	75,000
Transfer from General Fund	100,000	0	100,000	0	0	0	0	0	0	0	100,000
Total Funding Source	375,000	0	375,000	0	0	0	0	0	0	0	375,000
Operating Effect											
Contribution to Capital Reserve	0	0	200,000	0	0	0	0	0	0	0	200,000
Decreased Operating Costs	0	0	-6,500	-12,099	-12,220	-12,342	-12,465	-12,590	-12,716	-12,843	-93,775
Total Operating Effect	0	0	193,500	-12,099	-12,220	-12,342	-12,465	-12,590	-12,716	-12,843	106,225

Define Problem

The County has a stated goal in the 2017 Comprehensive Plan of becoming a carbon negative county and approved a Sustainable Facilities Policy in 2017 that envisions reviewing existing buildings for ways to improve energy efficiency and sustainability of operations. The building is oriented well for an effective solar panel system and has ample room to hold the panels needed. Duke Energy limits the size of the system to the highest instantaneous demand based on previous power bills, which in this case would be 175 kilowatts (kW). A system this size should offset 245,000 kilowatt-hours (kWh) in an average year, which is about 40% of the total energy demand for the building.

Recommended Solution

Install the full 175 kW system now to maximize the amount of solar allowed by Duke Energy.

Alternatives

Option 1: Do nothing. This option is not in alignment with Board of Commissioner goals.

Option 2: Defer the project. This option might cause the county to miss out on the Duke Energy rebate program. In addition, the older the roof becomes, the less feasible it becomes to do solar before roof replacement.

Option 3: Install a smaller system: A smaller system is possible, but if it was expanded later, the overall cost would likely be greater than doing a single, larger project.

Current Stage of Project

If the project receives the Duke Energy solar rebate, the work must be completed within one year of notification the rebate has been awarded. Notification of rebate award goes out in January 2022, so the project would have to be completed one year from then. The Duke rebate would pay for over 20% of the projected cost. There is no guarantee how long this rebate program will be in existence.

Relation to Other Projects

An electric vehicle charging station is being installed at the building this year. The solar panels can help offset the cost and carbon footprint of the electricity used to charge the vehicles.

County Capital Maintenance & Replacement Plan

Approved-No Contracts

Yearly maintenance and replacement of technology, facilities, and equipment.

Project Budget	Budget	Current									Project Totals
		Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	
Project Element											
Equipment	0	0	0	0	0	0	0	0	0	3,150,000	3,150,000
Facilities	0	295,208	500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000	4,295,208
Technology	0	0	1,200,000	1,030,425	299,027	25,380	159,238	47,526	48,499	461,135	3,271,230
Total Project Element	0	295,208	1,700,000	1,530,425	799,027	525,380	659,238	547,526	548,499	4,111,135	10,716,438
Funding Source											
Capital Reserves	0	295,208	1,700,000	1,530,425	799,027	525,380	659,238	547,526	548,499	4,111,135	10,716,438
Total Funding Source	0	295,208	1,700,000	1,530,425	799,027	525,380	659,238	547,526	548,499	4,111,135	10,716,438
Operating Effect											
Contribution to Capital Reserve	0	2,588,045	1,240,512	1,290,512	964,560	985,000	985,000	985,000	985,000	692,807	10,716,436
Total Operating Effect	0	2,588,045	1,240,512	1,290,512	964,560	985,000	985,000	985,000	985,000	692,807	10,716,436

Define Problem

The county's investment in its technology, buildings, and other equipment must be protected with yearly maintenance and, when indicated, replacement. Examples include audio visual systems, servers, enterprise software systems, HVAC systems and roofs, as well as costly equipment associated with Capital Improvements Plan (CIP) projects such as radios. A Capital Management and Replacement Plan (CMRP) can prevent the sudden failure that results in loss of county services.

Recommended Solution

Fund a yearly transfer to the Capital Reserve to support the Capital Maintenance and Replacement Plan.

Alternatives

Instead of planning, equipment can be replaced when it fails. However this may result in unplanned impacts to the operating budget, which can result in appropriations of fund balance or delay of budgeted programs and services in order to cover the unplanned expense.

Current Stage of Project

Maintenance and replacement projects are planned as follows

- FY2022: Multiple HVAC replacements
- FY 2023: Justice Center A/V replacement
- FY 2024: Electrical and HVAC maintenance
- FY 2025: Server replacement phase 1
- FY 2026: HVAC maintenance/replacement
- FY 2027: Server replacement phase 2
- FY 2028: HVAC replacement

Emergency Communications - Radio System Upgrade

Replace current emergency radio system infrastructure with a reliable and industry standard P25 radio system.

Project Budget	Budget	Current									Project Totals	
		Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030		
Project Element												
Construction	4,888,219	138,776	4,749,443	0	0	0	0	0	0	0	0	4,888,219
Contingency	392,704	0	392,704	0	0	0	0	0	0	0	0	392,704
Contracted Services	165,000	51,791	113,209	0	0	0	0	0	0	0	0	165,000
Design, Engineering & Construction Ad	2,243,811	2,095,000	148,811	0	0	0	0	0	0	0	0	2,243,811
Equipment	14,000,096	10,299,838	1,918,368	0	0	0	0	0	0	0	0	12,218,206
Financing Costs	57,296	57,296	0	0	0	0	0	0	0	0	0	57,296
Total Project Element	21,747,126	12,642,701	7,322,535	0	0	0	0	0	0	0	0	19,965,236
Funding Source												
911 Grant	1,781,890	0	0	0	0	0	0	0	0	0	0	0
Capital Reserves	0	0	1,813,902	0	0	0	0	0	0	0	0	1,813,902
Debt	19,965,236	12,642,701	5,508,633	0	0	0	0	0	0	0	0	18,151,334
Total Funding Source	21,747,126	12,642,701	7,322,535	0	0	0	0	0	0	0	0	19,965,236
Operating Effect												
Contribution to Capital Reserve	0	1,813,902	0	0	0	0	0	0	0	0	0	1,813,902
Debt Service	0	2,071,008	2,042,574	2,014,140	1,985,707	1,957,273	1,928,839	1,900,406	1,871,972	1,843,539	17,615,458	17,615,458
Decreased Operating Costs	0	-59,097	-61,175	-63,356	-32,823	-34,024	-35,044	-36,096	-37,179	38,294	-320,500	-320,500
Increased Operating Costs	0	394,470	485,164	497,908	511,286	525,297	537,978	551,402	560,650	570,176	4,634,331	4,634,331
Transfer from Debt Reserve	0	-2,071,008	-2,042,574	-2,014,140	-1,985,707	-1,957,273	-1,928,839	-1,900,406	-1,871,972	-1,843,539	-17,615,458	-17,615,458
Total Operating Effect	0	2,149,275	423,989	434,552	478,463	491,273	502,934	515,306	523,471	608,470	6,127,733	6,127,733

Define Problem

The existing VHF/UHF radio system used by county public safety agencies is approximately 30 years old. The system has been maintained by replacing and upgrading equipment as needed, but rapidly increasing communication demands and technology advancements have rendered the system obsolete. The county currently has seven different tower sites which transmit and/or receive communications to fire, emergency medical services, and law enforcement. The current radio system does not cover the entire county. Interoperability with surrounding counties and/or agencies is limited or non-existent due to disparate radio systems. The current radio system poses a serious safety risk for responders and citizens.

Recommended Solution

Upgrade the current system to a P25 700/800 MHz radio system and connect to the NC VIPER radio system. Eliminate four of the current tower sites that are outdated and not at a location that will permit the countywide coverage that is needed. Build three new tower sites and share the new VIPER tower that the state is constructing in Pittsboro.

Alternatives

Make no changes, which is a serious risk to the life and safety of responders and citizens.

Emergency Communications - Radio System Upgrade

Current Stage of Project

A contract with Motorola was signed June 2019, and a project manager has been assigned. Work started on the architectural, engineering and site survey for each tower site.

The permitting process began in July of 2020 and is expected to be complete by November of 2020. Construction began September 2020 and is expected to be complete in 2021. Training for all responders has begun and will continue until everyone is trained. Installation of radios began September 2020 and will continue until all radios have been installed.

As of September 2021, five new towers have been constructed. The final tower site was planned to be located on county-owned property that houses the Governor's Club water tower. This site was chosen because it provides the best elevation on county-owned land in the northeast section of the county. The required height and location of this tower was not approved by the property owners association. As a result, county staff are pursuing an alternate location, but this will increase the cost of the project by approximately \$650,000 and delay completion. Portable and mobile radios continue to be distributed. Go-live date for the system will be pushed to Summer 2022.

Description of Land Needs

The county owns property for three (3) tower sites. We would collocate with the state at one (1) tower site and collaborate with two fire departments for the two (2) remaining tower sites.

Parks - Athletic Field Lighting at Northeast District Park

Install athletic field lights on the multipurpose field at Northeast District Park.

Project Budget	Current										
	Budget	Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	Project Totals
Project Element											
Equipment	200,000	0	213,292	0	0	0	0	0	0	0	213,292
Total Project Element	200,000	0	213,292	0	0	0	0	0	0	0	213,292
Funding Source											
Capital Reserves	200,000	0	213,292	0	0	0	0	0	0	0	213,292
Total Funding Source	200,000	0	213,292	0	0	0	0	0	0	0	213,292
Operating Effect											
Additional Revenues	0	0	-480	-8,590	-8,848	-9,113	-9,387	-9,668	-9,958	-10,257	-66,301
Contribution to Capital Reserve	0	133,333	79,959	0	0	0	0	0	0	0	213,292
Increased Operating Costs	0	0	11,204	17,707	18,239	18,786	19,349	19,930	20,528	21,143	146,886
Total Operating Effect	0	133,333	90,683	9,117	9,391	9,673	9,962	10,262	10,570	10,886	293,877

Define Problem

There is a high demand for use of the county's multipurpose fields in the eastern part of the county. Multipurpose fields can be used for soccer, lacrosse, or football. One field at the Park at Briar Chapel has lights and many different groups compete to reserve that field. Many practices or games don't begin until 6PM and this only allows 30 minutes of daylight in the Fall and Winter seasons. Overbooking the single field with lights also results in more wear and tear on the field and thus additional repair and maintenance.

Recommended Solution

Install lights on the Northeast District Park multipurpose field to increase playable hours and accommodate more users.

Alternatives

One alternative is to do nothing and continue to book groups on the field with lights. However, this may result in increased maintenance and field preparation costs.

Operating Impact

Additional funding will be needed for electricity. Expense may be offset by additional revenue from rental of the field.

Parks - Briar Chapel Park Improvements

Approved-No Contracts (Part)

Accept donation of the 62-acre Briar Chapel Park with existing regulation soccer, football, baseball, and softball field; fence and light the athletic fields; and construct a restroom/concessions building, trails, and other improvements over several phases using recreation fees paid by the Briar Chapel development.

Project Budget	Budget	Current									Project Totals
		Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	
Project Element											
Architectural Design & Construction Ad	76,920	23,950	0	0	0	0	0	0	0	0	23,950
Contingency	14,531	0	0	0	0	0	0	0	0	0	0
Equipment	67,358	67,353	0	0	0	0	0	0	0	0	67,353
Facilities	1,270,466	1,067,820	325,000	620,000	0	0	0	0	0	0	2,012,820
Other Costs	12,125	12,125	0	0	0	0	0	0	0	0	12,125
PARTF Costs	368,126	307,271	0	0	0	0	0	0	0	0	307,271
Total Project Element	1,809,526	1,478,519	325,000	620,000	0	0	0	0	0	0	2,423,519
Funding Source											
Grants, Gifts, Etc.	233,375	150,000	0	0	0	0	0	0	0	0	150,000
Recreation Exaction Fee--Briar Chapel	1,576,151	1,328,519	325,000	620,000	0	0	0	0	0	0	2,273,519
Total Funding Source	1,809,526	1,478,519	325,000	620,000	0	0	0	0	0	0	2,423,519
Operating Effect											
Additional Revenues	0	-1,820	-1,760	-10,150	-10,455	-10,768	-11,091	-11,424	-11,767	-12,120	-81,355
Increased Operating Costs	0	247,348	74,518	76,840	79,056	81,428	83,830	86,306	88,854	91,479	909,659
Total Operating Effect	0	245,528	72,758	66,690	68,601	70,660	72,739	74,882	77,087	79,359	828,304

Define Problem

As part of its conditional use permit (CUP), Briar Chapel development was required to construct a park. However, the CUP did not specify the level to which the facilities must be developed. Briar Chapel has constructed a 62-acre facility consisting of parking, roadways and a football, regulation soccer, and two baseball fields. The athletic fields lacked fencing, lighting, bleachers, and restroom and concessions that would make the fields optimal for use. In 2012, Briar Chapel officials approached the county about giving the park to the county. Based on the draft 2009 Parks and Recreation Comprehensive Master Plan, many recreation facilities are needed in the county, including nine soccer fields, four football fields and five softball fields. Accepting the park from Briar Chapel and making improvements would alleviate part of this deficit. In addition, several athletic groups, including East Chatham Baseball, Chatham Soccer League, and East Chatham Football Association, have expressed interest in using the fields.

Recommended Solution

Using recreation fees paid by Briar Chapel, the county would make improvements to the fields as fees are collected. The facilities will be constructed as funds become available through Briar Chapel recreation fees and possibly with grant money from Parks and Recreation Trust Fund (PARTF).

1. Fencing of all fields
2. Lighting of the football field
3. Restroom/concession building and supporting utilities
4. Lighting of the parking lots
5. Storage shed
6. Entrance sign and gate

7. Bleachers and benches for all fields
8. Soccer goals
9. Lighting of two baseball/softball fields
10. Dugouts, bases and pitching mounds
11. Walking trail
12. Scoreboard
13. Playground with shade structure
14. Directional signage
15. Lighting of soccer field

Recommended Solution

Using recreation fees paid by Briar Chapel, the county would make improvements to the fields as fees are collected. The facilities will be constructed as funds become available through Briar Chapel recreation fees and possibly with grant money from Parks and Recreation Trust Fund (PARTF).

1. Fencing of all fields
2. Lighting of the football field
3. Restroom/concession building and supporting utilities
4. Lighting of the parking lots
5. Storage shed
6. Entrance sign and gate
7. Bleachers and benches for all fields
8. Soccer goals
9. Lighting of two baseball/softball fields
10. Walking trail
11. Scoreboard
12. Playground with shade structure
13. Directional signage
14. Lighting of soccer field
15. Dog Park
16. Dog Park Shade Structure
17. Ball Field foul ball netting
18. Corn hole, ping pong and Zip line (if funds are available).

Alternatives

The county could have chosen not to accept the park and allow Briar Chapel to operate it through its Homeowners Association. The CUP does require that the park be open to the public. Since there is no requirement that Briar Chapel develop the park beyond the state the county received it, the athletic facilities would be less than optimal. Fencing was needed on the baseball fields to keep balls from hitting spectators. The soccer field needed fencing to keep balls from rolling down a steep embankment. All athletic fields need bleachers for spectators. Without lighting, the fields can only be used during daylight hours. Without restroom and concession facilities, the park would not provide the amenities most participants and spectators expect and game play would be limited. In addition, the Building Inspections Division has stated that a restroom will be required.

Current Stage of Project

Briar Chapel completed construction of the athletic fields, two paved parking lots, and main entrance, paved the entrance road and constructed the entrance bridge. The county took ownership of the park in June 2012. Using recreation fees from Briar Chapel, the county completed fencing, lighting of the football field and gates. The restroom/concessions stand construction was completed in August 2015. By July 2017 soccer goals, bases, pitcher mounds, benches, concession equipment, dugouts, bleachers, and directional signage were purchased, the scoreboard was installed, and irrigation spray heads were replaced.

Parks - Briar Chapel Park Improvements

Approved-No Contracts (Part)

Paving of the parking lots was completed in FY 2018. The county was awarded a PARTF grant in September 2017 to construct a playground, picnic shelter, paved trail and sidewalk connecting to school. Construction began in FY 2019 and was completed in August of 2020. Some PARTF grant funds remained unspent and the County was given permission to build a dog park and additional parking. Construction of the dog park and additional parking was completed in 2020.

Lighting for the soccer field was completed in FY 2021 to be funded with Briar Chapel recreation fees. Additional future amenities such as a dog park shade structure, cornhole, ping pong, and a zipline will depend on the availability of recreation fees.

Relation to Other Projects

Improvements to Briar Chapel Park are related to construction of other parks. These facilities will provide the basic infrastructure for the county and community organizations to offer recreational programming, such as league play, in other areas of the county.

Professional Services Needed

Architectural services were needed to design the restroom/concessions building. Engineering and construction administration will be needed for water and sewer connections and designing the remaining facilities. Existing county staff has provided oversight to construction and installation of other improvements.

Operating Impact

Additional funds will be needed to operate and maintain the facility. Additional revenues will be realized from renting the concession stand and fields and from program fees.

Parks - Northwest District Park Dam

New

Professional services to address deficiencies for the Northwest District Park Dam. The North Carolina Dam Safety Program identifies the dam as Camp Marantha Lake Dam (State ID: Chath-026). The dam has been classified by NC Dam Safety as a low-hazard dam.

Project Budget	Budget	Current		Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	Project Totals
		Prior to FY 2023	Year: FY 2023								
Project Element											
Construction	0	0	0	0	0	0	0	0	0	700,000	700,000
Contingency	0	0	0	0	0	0	0	0	0	100,000	100,000
Design, Engineering & Construction Ad	0	0	0	100,000	100,000	100,000	0	0	0	0	300,000
Total Project Element	0	0	0	100,000	100,000	100,000	0	0	0	800,000	1,100,000
Funding Source											
Article 46 Sales Tax	0	0	0	42,857	42,857	42,857	0	0	0	571,429	700,000
Capital Reserves	0	0	0	57,143	57,143	57,143	0	0	0	228,571	400,000
Total Funding Source	0	0	0	100,000	100,000	100,000	0	0	0	800,000	1,100,000
Operating Effect											
Contribution to Capital Reserve	0	0	0	57,143	57,143	57,143	57,143	57,143	57,143	57,143	400,001
Increased Operating Costs	0	0	0	0	0	0	0	0	0	0	0
Total Operating Effect	0	0	0	57,143	57,143	57,143	57,143	57,143	57,143	57,143	400,001

Define Problem

The NC Dept. of Environmental Quality (NCDEQ) completed a dam safety inspection in February 2022 and identified deficiencies with the dam such as trees, brush, woody vegetation, erosion, and depressions.

Recommended Solution

Address the issues identified by NCDEQ's dam safety inspection.

Alternatives

Do nothing. However, the Northwest District Park dam is a registered dam with the state of North Carolina, therefore it is subject to inspections. If current issues are not addressed, the dam will be out of compliance and the county will be subject to fines and charges.

Current Stage of Project

The county is working on a 3-year phasing plan to investigate, assess, and develop a repair design for the project. Part of the 3-year plan will include obtaining an engineering plan in order to address trees growing on the dam as many are over 3" in diameter. The engineering plan must be reviewed and approved by the state.

Professional Services Needed

Engineering and construction services will be needed.

Parks - Parker's Ridge Park

Approved-No Contracts

Develop Parkers Ridge, a 147-acre park, on Pea Ridge Road in Moncure.

Project Budget	Budget	Prior to FY 2023	Current	Year 1:	Year 2:	Year 3:	Year 4:	Year 5:	Year 6:	Year 7:	Project Totals
			Year: FY 2023	FY 2024	FY 2025	FY 2026	FY 2027	FY 2028	FY 2029	FY 2030	
Project Element											
Construction	3,747,726	0	0	1,873,863	1,873,863	0	0	0	0	0	3,747,726
Contingency	300,000	0	0	0	0	0	0	0	0	0	0
Design, Engineering & Construction Ad	562,169	0	562,159	0	0	0	0	0	0	0	562,159
Furnishings & Equipment	1,392,000	0	0	0	0	1,392,000	0	0	0	0	1,392,000
Other Contracted Services	0	0	100,000	100,000	100,000	0	0	0	0	0	300,000
Total Project Element	6,001,895	0	662,159	1,973,863	1,973,863	1,392,000	0	0	0	0	6,001,885
Funding Source											
American Rescue Plan Act Enabled	3,000,000	0	562,159	1,873,863	563,978	0	0	0	0	0	3,000,000
Article 46 Sales Tax	1,801,885	0	100,000	100,000	909,885	692,000	0	0	0	0	1,801,885
Coal Ash Funds	1,000,000	0	0	0	500,000	500,000	0	0	0	0	1,000,000
Grants, Gifts, Etc.	200,000	0	0	0	0	200,000	0	0	0	0	200,000
Total Funding Source	6,001,885	0	662,159	1,973,863	1,973,863	1,392,000	0	0	0	0	6,001,885
Operating Effect											
Additional Revenues	0	0	0	0	0	-8,590	-17,180	-17,695	-18,226	-18,773	-80,464
Increased Operating Costs	0	0	0	0	0	109,293	132,849	136,526	140,622	144,840	664,130
Total Operating Effect	0	0	0	0	0	100,703	115,669	118,831	122,396	126,067	583,666

Define Problem

Moncure and the surrounding southeastern portion of Chatham County is considered an underserved area. In 2016 the county purchased 147 acres from the Lola Tart Parker Trust with the intent to preserve and use the land to benefit Moncure and all of Chatham County.

Recommended Solution

The preservation of this land for recreation and green space will help protect the beauty and rural character of Chatham County. Develop Parkers Ridge Park in phases. The first phase will begin by adding infrastructure (e.g. erosion control, site clearing, gravel drive and parking, grading, sidewalks, stormwater management features, and utilities), to be followed by amenities (playground, restrooms, nature trail, fishing pier and canoe launch, dog park and two multi-purpose fields). Subsequent phases could include amenities such as a picnic shelter, fitness course, inclusive playground, tennis and pickleball courts, a cricket lawn, and disc golf among others.

A portion of American Rescue Plan Act (ARPA) funds are recommended to be applied to this project to enable it to begin in FY 2023.

Current Stage of Project

Design is anticipated to begin in FY 2023.

Parks - Parker's Ridge Park

Approved-No Contracts

Professional Services Needed

Land planning, architectural, design, engineering and construction services will be needed.

Operating Impact

Additional funding will be needed for park maintenance and staffing. Expense may be offset by additional revenue from rental of the field.

Schools - Margaret Pollard Expansion

New

Additional brick and mortar classroom capacity at Margaret Pollard Middle School

Project Budget	Budget	Prior to FY 2023	Current								Project Totals
			Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	
Project Element											
Construction	0	0	0	0	400,000	0	0	0	0	0	400,000
Contingency	0	0	0	0	100,000	0	0	0	0	0	100,000
Design, Engineering & Construction Ad	0	0	0	150,000	150,000	0	0	0	0	0	300,000
Furnishings & Equipment	0	0	0	0	1,000,000	0	0	0	0	0	1,000,000
Other Contracted Services	0	0	0	100,000	100,000	0	0	0	0	0	200,000
Total Project Element	0	0	0	250,000	1,750,000	0	0	0	0	0	2,000,000
Funding Source											
Capital Reserves	0	0	0	250,000	1,750,000	0	0	0	0	0	2,000,000
Total Funding Source	0	0	0	250,000	1,750,000	0	0	0	0	0	2,000,000
Operating Effect											
Contribution to Capital Reserve	0	1,000,000	0	0	1,000,000	0	0	0	0	0	2,000,000
Increased Operating Costs	0	0	0	0	30,766	31,689	32,640	33,619	34,628	35,666	199,008
Total Operating Effect	0	1,000,000	0	0	1,030,766	31,689	32,640	33,619	34,628	35,666	2,199,008

Define Problem

The accelerating pace of growth in the northeast quadrant of the county continues to increase the student population at Margaret Pollard Middle School. A six-classroom modular pod has been put in place, but additional classroom capacity is needed by the start of the 2024-2025 school year. This project will construct additions to two of the three wings and add eight classrooms. This will create a serviceable capacity of 1,100 students, which should serve the school through the current 10-year projections.

Recommended Solution

Add two 6-classroom pods (behind each wing) with an estimated cost of \$2,000,000-\$2,500,000.

Alternatives

Proceed with brick and mortar addition with an estimated cost of \$6,800,000; which will create enough classroom capacity to get to the end of the current 10-year projections. (Chatham County Schools preferred option)

Description of Land Needs

Not applicable for this project

Professional Services Needed

Planning, design, engineering, and architectural services will be needed.

Operating Impact

Additional funding will be needed for operating expenses upon opening of additional classrooms within a school.

Schools - Mobile Classrooms

Purchase modular classrooms to alleviate overcrowding at Siler City Elementary, Northwood High School, and other schools as space is needed.

Project Budget	Budget	Current									Project Totals
		Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	
Project Element											
Construction	1,313,245	205,842	0	254,400	261,600	268,800	157,803	164,800	0	0	1,313,245
Design, Engineering & Construction Ad	18,450	18,450	0	0	0	0	0	0	0	0	18,450
Other Contracted Services	0	0	0	0	0	0	0	0	0	0	0
Total Project Element	1,331,695	224,292	0	254,400	261,600	268,800	157,803	164,800	0	0	1,331,695
Funding Source											
Capital Reserves	1,331,695	224,292	0	254,400	261,600	268,800	157,803	164,800	0	0	1,331,695
Total Funding Source	1,331,695	224,292	0	254,400	261,600	268,800	157,803	164,800	0	0	1,331,695
Operating Effect											
Contribution to Capital Reserve	0	653,184	0	142,167	142,167	142,168	126,005	126,004	0	0	1,331,695
Increased Operating Costs	0	34,876	23,034	26,914	29,316	30,195	31,101	32,035	32,997	33,987	274,455
Total Operating Effect	0	688,060	23,034	169,081	171,483	172,363	157,106	158,039	32,997	33,987	1,606,150

Define Problem

With one NC certified megasite in the western side of the county, another megasite being readied in the southeast, and the Chatham Park development coming in Pittsboro, Chatham County is on the brink of unprecedented growth.

Some schools, particularly Siler City Elementary and Northwood High School, are currently overcrowded. Siler City Elementary, with a brick and mortar capacity of 671 and a serviceable capacity of 768, currently has an average daily membership of 699. The school is floating seven English-as-a-second-language (ESL) classes, one art class, one academically or intellectually gifted (AIG) class, one-half of a music teacher and one-half of a physical education teacher.

Northwood High School has a brick and mortar capacity of 1,005 and a serviceable capacity of 1,330. The current average daily membership is 1,289. In addition to classroom space, Northwood needs more cafeteria and office space for teachers, counselors, and administrators.

House Bill 13 (which takes effect at the beginning of the 2018-2019 academic year) reduces class sizes in kindergarten through 3rd grades from 23 students to a maximum average of 20 or less. This will reduce the classroom capacity of our elementary/K-8 schools.

A short-term solution to overcrowding is needed to provide the schools with additional space and give the school system time to develop a plan that will account for the impending growth.

Recommended Solution

Purchase twelve modular classrooms; three for Siler City Elementary, one for Northwood High School, and eight to be placed as needed over the next three years. Current projected impacts of the issues suggest a need to place modular classrooms during the next five years at Pittsboro Elementary, Siler City Elementary, Horton Middle, Margaret Pollard Middle, and Jordan-Matthews High School.

To insure that sufficient modular classroom units are available to address House Bill 13, projected growth from Chatham Park, and normal Chatham County

growth, a total of 12 additional modular classroom units should be available by FY 2024.

Alternatives

One alternative to purchasing modular classrooms is to immediately redistrict student attendance zones.

Current Stage of Project

Four modular classrooms were purchased and set up during the summer of 2015. Three are located at Siler City Elementary and one at Northwood High School. All are currently being used as classroom space. One modular classroom was purchased and set up at Chatham Middle during the summer of 2017. This project will be moved out through FY 2028. Student projections are always changing, and the additional seats created with the new schools will help alleviate the immediate need for mobile units. As of 9/2022, a six classroom modular unit has been completed at Margaret Pollard Middle School.

Professional Services Needed

Architectural and engineering design services will be needed.

Operating Impact

Additional funds will be needed for utilities to operate the modular classrooms.

Schools - New Central Services Building

Construct a new one-story 38,000-square-foot Central Services building, including approximately 8,000 square feet of warehouse space, on Renaissance Drive.

Project Budget	Budget	Current									Project Totals
		Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	
Project Element											
Construction	13,915,400	8,402,489	5,658,618	0	0	0	0	0	0	0	14,061,107
Construction Administration	330,276	0	72,773	0	0	0	0	0	0	0	72,773
Contingency	695,770	0	587,998	0	0	0	0	0	0	0	587,998
Design, Engineering & Construction Ad	472,584	856,885	0	0	0	0	0	0	0	0	856,885
Equipment	704,713	29,858	601,958	0	0	0	0	0	0	0	631,816
Financing Costs	166,667	122,664	0	0	0	0	0	0	0	0	122,664
Other Contracted Services	178,470	92,442	38,195	0	0	0	0	0	0	0	130,637
Total Project Element	16,463,880	9,504,338	6,959,542	0	0	0	0	0	0	0	16,463,880
Funding Source											
Debt	16,463,880	9,504,339	6,959,541	0	0	0	0	0	0	0	16,463,880
Total Funding Source	16,463,880	9,504,339	6,959,541	0	0	0	0	0	0	0	16,463,880
Operating Effect											
Debt Service	0	365,060	1,128,552	1,097,964	1,067,375	1,036,786	1,006,197	975,608	945,020	914,431	8,536,993
Increased Operating Costs	0	31,732	32,684	33,664	34,674	35,715	36,786	37,891	39,026	40,197	322,369
Transfer from Debt Reserve	0	-365,060	-1,128,552	-1,097,964	-1,067,375	-1,036,786	-1,006,197	-975,608	-945,020	-914,431	-8,536,993
Total Operating Effect	0	31,732	32,684	33,664	34,674	35,715	36,786	37,891	39,026	40,197	322,369

Define Problem

The existing Central Services Building has exceeded its capacity resulting in the creation of inefficient satellite offices around the county. In addition, a 2014 facility conditions assessment indicates the building has surpassed its intended lifespan and is in need of costly repairs. The necessary repairs do not address the space issue.

Recent student population projections for Horton Middle School indicate that school space currently occupied by Central Services personnel will be required for classroom use beginning with FY 2021.

Warehouse space is needed to replace the storage space at the existing site (school nutrition, technology, etc.).

Recommended Solution

Construct a new one-story central services building to accommodate all departments in one location and eliminate the need for inefficient satellite offices on various school campuses. Building is being designed to meet projected 20-year needs and will include provisions for future expansion. The county has purchased the old bus garage site from the school system. Instead of a cash purchase, the funds will be used to offset some of the construction costs for the new Central Services Building.

Alternatives

Repair existing building and continue to operate with inefficient satellite offices.

Current Stage of Project

Design development is underway with construction starting in July 2021 and estimated completion in December 2022. A bid alternate for a solar PV Panel System will be obtained for consideration.

Design development is complete and a contract for construction has been awarded. The site has been cleared, erosion control measures are in place, and building pad development is underway. Substantial completion is scheduled for February of 2023.

Professional Services Needed

Architectural design, construction, and engineering services will be needed.

Operating Impact

Additional funds will be needed for equipment, supplies, and maintenance.

Schools - New Elementary School at Chatham Park (Northern Village)

New

Design and construction of a new K-5 elementary school.

Project Budget	Budget	Prior to FY 2023	Current Year:								Project Totals	
			FY 2023	FY 2024	FY 2025	FY 2026	FY 2027	FY 2028	FY 2029	FY 2030		
Project Element												
Construction	0	0	0	0	0	18,500,000	18,500,000	1,100,000	0	0	0	38,100,000
Contingency	0	0	0	0	0	0	0	3,000,000	0	0	0	3,000,000
Design, Engineering & Construction Ad	0	0	0	0	1,600,000	600,000	150,000	150,000	0	0	0	2,500,000
Furnishings & Equipment	0	0	0	0	0	0	1,500,000	1,500,000	0	0	0	3,000,000
Other Contracted Services	0	0	0	0	250,000	250,000	250,000	250,000	0	0	0	1,000,000
Total Project Element	0	0	0	0	1,850,000	19,350,000	20,400,000	6,000,000	0	0	0	47,600,000
Funding Source												
Debt--Limited Obligation Bonds	0	0	0	0	1,850,000	19,350,000	20,400,000	6,000,000	0	0	0	47,600,000
Total Funding Source	0	0	0	0	1,850,000	19,350,000	20,400,000	6,000,000	0	0	0	47,600,000
Operating Effect												
Debt Service	0	0	0	0	0	0	4,280,000	4,200,000	4,100,000	4,000,000	16,580,000	
Increased Operating Costs	0	0	0	0	0	0	0	1,749,023	1,801,494	1,855,539	5,406,056	
Transfer from Debt Reserve	0	0	0	0	0	0	-4,280,000	-4,200,000	-4,100,000	-4,000,000	-16,580,000	
Total Operating Effect	0	0	0	0	0	0	0	1,749,023	1,801,494	1,855,539	5,406,056	

Define Problem

During the next 10 years, the Northwood/Seaforth attendance zones are expected to grow by over 1,900 students. The majority of these students will be generated by Chatham Park. We will need to construct an elementary school in the Chatham Park Northern Village to meet this projected growth.

Recommended Solution

Design and construct a new school to open in the fall of 2027 in the Chatham Park Northern Village.

Alternatives

Do nothing and continue adding modular classrooms to our current K-5 schools in the Northwood/Seaforth attendance zones.

Current Stage of Project

Chatham County Schools is working with Chatham Park to find a suitable site for the school.

Description of Land Needs

25 Buildable Acres - Chatham Park will donate the land and provide access roads, water/sewer, and needed infrastructure. This was outlined in documents with the Town of Pittsboro and in an MOU with the Board of Education.

Professional Services Needed

Design, engineering, and construction services will be needed.

Schools - New Elementary School at Chatham Park (Northern Village)

New

Operating Impact

Additional funding will be needed for operating expenses upon opening of a new school.

Schools - Paving Repair

Approved-No Contracts

Repair paving on all campuses.

Project Budget	Current										Project Totals
	Budget	Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	
Project Element											
Construction	0	0	308,359	0	0	2,372,353	0	1,374,776	989,419	0	5,044,907
Total Project Element	0	0	308,359	0	0	2,372,353	0	1,374,776	989,419	0	5,044,907
Funding Source											
Capital Reserves	0	0	308,359	0	0	2,372,353	0	1,374,776	989,419	0	5,044,907
Total Funding Source	0	0	308,359	0	0	2,372,353	0	1,374,776	989,419	0	5,044,907
Operating Effect											
Contribution to Capital Reserve	0	2,000,000	0	612,007	612,007	612,007	612,007	612,007	612,007	612,007	6,284,049
Total Operating Effect	0	2,000,000	0	612,007	612,007	612,007	612,007	612,007	612,007	612,007	6,284,049

Define Problem

Paved areas on all campuses continue to age and increasingly need repair. Having a scheduled funding source to address these needs will allow us to do so in a more strategic way, including asphalt overlays and crack/pothole repair.

Recommended Solution

Create a long-term project that will provide funding for paving repair as detailed in the recent completed feasibility study to provide improved campuses for the students and staff of Chatham County Schools. Given the scope of this project, it will extend beyond the initial seven years in the FY2023-2029 CIP. The first seven years of planned expenditures are shown in detail in this document.

Alternatives

Option 1: Do nothing. This alternative would allow the issues to deteriorate.

Option 2: Patch cracks/potholes as funds allow.

Current Stage of Project

Northwood HS bus parking lot complete.

Professional Services Needed

Design and engineering services will be needed.

Schools - Replace Gymnasiums at Bennett, Silk Hope and Bonlee

New

Construction of new masonry/metal building gymnasiums at Bennett, Bonlee, and Silk Hope Schools. Existing gymnasiums to be demolished to create needed space.

Project Budget	Budget	Current									Project Totals
		Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	
Project Element											
Construction	0	0	0	0	0	6,000,000	6,000,000	2,500,000	0	0	14,500,000
Contingency	0	0	0	0	0	0	0	2,000,000	0	0	2,000,000
Design, Engineering & Construction Ad	0	0	0	0	1,400,000	400,000	150,000	150,000	0	0	2,100,000
Furnishings & Equipment	0	0	0	0	0	0	1,500,000	1,500,000	0	0	3,000,000
Total Project Element	0	0	0	0	1,400,000	6,400,000	7,650,000	6,150,000	0	0	21,600,000
Funding Source											
Debt--Limited Obligation Bonds	0	0	0	0	1,400,000	6,400,000	7,650,000	6,150,000	0	0	21,600,000
Total Funding Source	0	0	0	0	1,400,000	6,400,000	7,650,000	6,150,000	0	0	21,600,000
Operating Effect											
Debt Service	0	0	0	0	0	0	2,000,000	1,900,000	1,850,000	1,800,000	7,550,000
Increased Operating Costs	0	0	0	0	0	0	0	21,368	22,009	22,669	66,046
Transfer from Debt Reserve	0	0	0	0	0	0	-2,000,000	-1,900,000	-1,850,000	-1,800,000	-7,550,000
Total Operating Effect	0	0	0	0	0	0	0	21,368	22,009	22,669	66,046

Define Problem

These three gymnasiums were built in 1951 and are undersized and lacking in needed features for middle school athletics.

Recommended Solution

Replace existing gymnasiums with new ones that meet the current size and features recommended by the North Carolina Department of Public Instruction. Design to be based on a masonry/metal building.

Alternatives

Do nothing and continue renovating existing gymnasiums as possible.

Current Stage of Project

Chatham County Schools completed a feasibility study during the 2021-2022 academic year, which indicated that the best course of action is to replace the existing gyms with new ones that meet the current size and features recommended by the North Carolina Department of Public Instruction. Design to be based on a masonry/metal building. Once these buildings are finished, the existing gyms would be demoed and the resulting spaces used for other purposes. This project has been submitted for NCDPI funding consideration but has been passed over twice.

Professional Services Needed

Detailed architectural drawings, planning, engineering, and construction management will be needed.

Schools - Replace Gymnasiums at Bennett, Silk Hope and Bonlee

New

Operating Impact

Utility and maintenance costs are expected to decline because of updated systems and materials.

Schools - Resurface Tracks

Resurfacing of tracks at Chatham County High Schools.

Project Budget	Budget	Prior to FY 2023	Current	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	Project Totals
			Year: FY 2023								
Project Element											
Construction	474,480	59,459	415,021	0	0	0	0	0	0	0	474,480
Contingency	0	0	0	0	0	0	0	0	0	0	0
Total Project Element	474,480	59,459	415,021	0	0	0	0	0	0	0	474,480
Funding Source											
Capital Reserves	474,480	59,459	415,021	0	0	0	0	0	0	0	474,480
Total Funding Source	474,480	59,459	415,021	0	0	0	0	0	0	0	474,480
Operating Effect											
Contribution to Capital Reserve	0	474,480	0	0	0	0	0	0	0	0	474,480
Total Operating Effect	0	474,480	0	0	0	0	0	0	0	0	474,480

Define Problem

The tracks at Chatham Central and Northwood High Schools were rebuilt in 2007. Jordan-Matthews High School’s track was repaved in 2007. The latex surfaces at all three high schools have outlived their projected life spans. Holes are appearing and the latex surface is separating from the asphalt.

Recommended Solution

Resurface one high school’s track annually each year from FY2020 to FY2022.

Alternatives

Do nothing to the tracks and gradually discontinue their use for events and physical education classes.

Current Stage of Project

The track resurfacing at Northwood High School has been completed, except for the high jump/pole vault runway. Jordan-Matthews and Chatham Central are scheduled to be completed during FY 2022 and will include the follow up work at Northwood. These parts of the project were delayed due to COVID-19. Jordan-Matthews and Chatham Central were expected to be completed prior to the start of the 2022-2023 academic year. This did not happen due to contractor issues. This project will need to be re-bid and scheduled to be complete prior to the start of the 2023-2024 academic year.

Schools - Seaforth High School

Substantially Complete

Construct a new 209,000-square-foot high school in the northeast quadrant of the county to open August of 2021 to address overcrowding and provide for the expected growth in the high school student population. The new high school will be built to accommodate up to 1,200 students initially, with the core capacity sized to accommodate 1,400 students.

Project Budget	Budget	Current									Project Totals
		Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	
Project Element											
Architectural Design & Construction Ad	4,550,372	4,403,851	0	0	0	0	0	0	0	0	4,403,851
Construction	69,412,278	69,267,439	1,045,953	0	0	0	0	0	0	0	70,313,392
Contingency	0	0	0	0	0	0	0	0	0	0	0
Engineering & Construction Administrat	0	0	0	0	0	0	0	0	0	0	0
Financing Costs	139,337	139,336	0	0	0	0	0	0	0	0	139,336
Furnishings & Equipment	5,627,405	4,796,426	373,711	0	0	0	0	0	0	0	5,170,137
Land	1,409,473	1,409,472	0	0	0	0	0	0	0	0	1,409,472
LEED	0	0	0	0	0	0	0	0	0	0	0
Other Contracted Services	1,064,974	767,651	0	0	0	0	0	0	0	0	767,651
Transfer Out to Debt Reserve	4,677,192	4,677,192	0	0	0	0	0	0	0	0	4,677,192
Total Project Element	86,881,031	85,461,367	1,419,664	0	0	0	0	0	0	0	86,881,031
Funding Source											
Chatham Schools - DOT/Duke	289,529	289,529	0	0	0	0	0	0	0	0	289,529
Debt--Limited Obligation Bonds	78,414,310	76,994,646	1,419,664	0	0	0	0	0	0	0	78,414,310
Interest	3,500,000	3,500,000	0	0	0	0	0	0	0	0	3,500,000
Transfer In from Debt Reserve	4,677,192	4,677,192	0	0	0	0	0	0	0	0	4,677,192
Total Funding Source	86,881,031	85,461,367	1,419,664	0	0	0	0	0	0	0	86,881,031
Operating Effect											
Debt Service	0	6,641,600	6,452,194	6,300,914	6,111,510	5,960,230	5,770,824	5,581,420	5,388,964	5,550,633	53,758,289
Increased Operating Costs	0	2,316,461	2,385,955	2,457,534	2,531,260	2,607,198	2,685,414	2,765,976	2,848,955	2,934,424	23,533,177
Transfer from Debt Reserve	0	-6,641,600	-6,452,194	-6,300,914	-6,111,510	-5,960,230	-5,770,824	-5,581,420	-5,388,964	-5,550,633	-53,758,289
Total Operating Effect	0	2,316,461	2,385,955	2,457,534	2,531,260	2,607,198	2,685,414	2,765,976	2,848,955	2,934,424	23,533,177

Define Problem

The building of new schools is a complex process. An important step in the process is the determination of location, size, and timing (i.e., when does the projected enrollment necessitate a new school). To that end, Chatham County Schools has continued its long-standing relationship with the Operations Research/Education Laboratory of North Carolina State University (OR/Ed) to assist in making fiscally responsible, timely, and appropriate decisions. OR/Ed consultants have conducted interviews with planning and permitting personnel, verifying and updating (as necessary) growth projection and optimization scenarios.

In 2007, a study conducted by OR/Ed determined that Northwood and Jordan-Matthews had reached their brick and mortar capacities. This study

recommended that a new high school be constructed in the northeast part of the county to alleviate overcrowding

Since 2007, additions have been added to both schools to meet this growth. At Jordan-Matthews, a new cafeteria was added, the existing cafeteria was renovated to create additional classroom space, and additional classroom modular units were placed on the campus. At Northwood, an eight-classroom modular building and a new Fine Arts wing were added as well.

Between 2007 and 2011, population growth in Chatham slowed, and construction of a new high school was pushed back in order to ensure that completion of the school would be accompanied by the necessary student population. One of the main goals was to make sure programming was not diminished at Northwood High School.

Recommended Solution

Construct a new high school in the northeast quadrant of the county to open August of 2021 to address overcrowding and provide for the expected growth in the high school student population. The new high school will be built to accommodate up to 1,200 students initially, with the core capacity sized to accommodate an additional 200 students.

Alternatives

- 1) Build an addition to Northwood to expand the brick and mortar capacity to 1,500 students to provide a temporary solution to the need for an additional high school. However, based on OR/Ed projections, even with an expansion, Northwood could exceed the expanded capacity in less than ten years.
- 2) Redistrict the entire district at the high school level to make use of empty seats in the western part of the county. Note that this will negatively impact transportation-related issues (length of ride, efficiency ratings, etc.).
- 3) Do nothing and continue adding modular units to Northwood.

Current Stage of Project

Seaforth High School opened for students at the beginning of the 2021-2022 academic year. Construction is substantially complete with outstanding punch list items remaining. Some FF&E deliveries have been delayed due to COVID-19 but are expected to be complete by June of 2022.

Description of Land Needs

An appropriately located 75-acre site has been identified and approved by the Board of Education as its preferred location for the new high school. Due diligence work (i.e., traffic study, soil borings, environmental assessments, etc.) is underway and is expected to be concluded by December 2016.

Professional Services Needed

Detailed architectural drawings and construction management will be needed.

Operating Impact

Additional funds will be needed for utilities, maintenance, and locally funded personnel.

Schools - Wastewater Replacement at Silk Hope School

Approved-No Contracts

Replace wastewater system at Silk Hope Elementary School.

Project Budget	Budget	Current									Project Totals
		Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	
Project Element											
Construction	585,000	0	0	0	585,000	0	0	0	0	0	585,000
Contingency	58,500	0	0	0	58,500	0	0	0	0	0	58,500
Total Project Element	643,500	0	0	0	643,500	0	0	0	0	0	643,500
Funding Source											
Capital Reserves	643,500	0	0	0	643,500	0	0	0	0	0	643,500
Total Funding Source	643,500	0	0	0	643,500	0	0	0	0	0	643,500
Operating Effect											
Contribution to Capital Reserve	0	429,000	214,500	0	0	0	0	0	0	0	643,500
Total Operating Effect	0	429,000	214,500	0	0	0	0	0	0	0	643,500

Define Problem

The two main parts of the current Silk Hope School wastewater system are located approximately .5 miles apart, and one part is on privately-owned land. This arrangement was agreed upon several years ago without any easements being put in place. Two years ago, North Carolina Department of Environmental Quality (NCDEQ) made establishing this easement a part of the licensing renewal process. Due to the private landowner's past relationship with NCDEQ, finalizing this easement has proven to be difficult to achieve.

Recommended Solution

Discussion is underway to explore the possibility of connection to a municipal system.

Alternatives

- 1) Install a wastewater "drip" system located entirely on school property. Although an on-site "drip" system will eliminate the need for additional property, it will limit future growth due to soil conditions and amount of property.
- 2) Explore the possibility of connection to a municipal system. Connecting the school to a municipal system would eliminate the need for additional property not owned by CCS and allow for future expansion.
- 3) Explore the possibility of purchasing additional land.
- 4) Do nothing and continue using the current outdated and less efficient system that is located partly on school property and partly on privately owned property.

Current Stage of Project

Feasibility studies have been completed to assess alternatives. This project has been rescheduled to begin in FY 2025.

Professional Services Needed

Engineering services will be needed.

Technology - County Fiber Extension to Siler City

New

County Network Infrastructure Improvement

Project Budget	Budget	Current		Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	Project Totals
		Prior to FY 2023	Year: FY 2023								
Project Element											
Construction	0	0	0	700,000	0	0	0	0	0	0	700,000
Contract	0	0	0	300,000	0	0	0	0	0	0	300,000
Total Project Element	0	0	0	1,000,000	0	0	0	0	0	0	1,000,000
Funding Source											
American Rescue Plan Act Enabled	0	0	0	1,000,000	0	0	0	0	0	0	1,000,000
Total Funding Source	0	0	0	1,000,000	0	0	0	0	0	0	1,000,000
Operating Effect											
Increased Operating Costs	0	0	0	-4,800	-4,800	-4,800	-4,800	-4,800	-4,800	-4,800	-33,600
Total Operating Effect	0	0	0	-4,800	-4,800	-4,800	-4,800	-4,800	-4,800	-4,800	-33,600

Define Problem

Chatham County Government has office locations in three clustered locations, downtown Pittsboro, Renaissance Drive, and Siler City. Greater and much broader access to county network services will be required as Plan Chatham goals are addressed. Extension of fiber to Siler City, a future project in the FY 2022-2028 CIP, would provide connectivity to remote locations in Siler City and greater geographical dispersion for disaster recovery planning. However, it would not address the need for redundant points of failure across the network, which would leave the network vulnerable to a possible disaster at the core server location housed in the MIS building. The expansion of the fiber network to Siler City in conjunction with a reengineering of the network infrastructure would accommodate the counties' facility growth objectives into the future.

Recommended Solution

Install 11 miles of fiber in the ground between the existing end point of fiber at Renaissance Drive and the backup Emergency Operations Center in Siler City. At the same time, review the county's current network fiber assets to determine the feasibility of hosting a secondary data center at the new Emergency Operations Center on Renaissance Drive and identify the additional fiber capacity that will be required to meet the future needs of county facilities.

Alternatives

Option 1: Do nothing. Planned changes in switches, potential cabling and leased line upgrades will continue as capacity needs demand it. Continue to use leased lines as needed despite slow network response times until changes are in place and the problem can be reassessed. Leased lines can be disconnected when a location is no longer needed which may serve the county better until various construction and renovation projects are completed. Doing nothing will keep our existing known risks in place.

Option 2: Extend Fiber incrementally to Siler City over time. This would spread out the cost, but also delay the possible savings on expensive internet circuits that could be disconnected. It would also delay our ability to geographically disperse our server hosts for disaster recovery purposes.

Option 3: Pursue a collaborative effort. Work with existing ISP's or fiber non-profit providers to provide infrastructure for them to expand their fiber footprint without incurring the construction costs. This would be done to expand broadband service to residents of Chatham County in underserved areas while also possibly identifying ARP funding opportunities for the county.

Option 4: SD-WAN Solution. Move away from putting additional fiber in the ground and implement a comprehensive solution to address connectivity in a dispersed environment. This solution would require dedicated internet connections at desired remote locations along with additional IT infrastructure, namely firewalls. The scalability of this solution is desirable, but the ongoing recurring costs are a deterrent.

Relation to Other Projects

Improving fiber capacity will benefit future county facilities along Renaissance Dr. and in Siler City.

Description of Land Needs

Easements in the right-of-way.

Operating Impact

Implementation costs will be high in the short-term, but will lead to cost savings through county facilities in Siler City being connected to the County's network.

Technology - Tax Software

Replace current software with a system that will provide improved functionality for staff and the public.

Project Budget	Budget	Current									Project Totals
		Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	
Project Element											
Furnishings & Equipment	1,000,000	236,329	117,035	0	0	0	0	0	0	0	353,364
Other Contracted Services	0	0	60,000	60,000	0	0	0	0	0	0	120,000
Total Project Element	1,000,000	236,329	177,035	60,000	0	0	0	0	0	0	473,364
Funding Source											
Capital Reserves	1,000,000	236,329	177,035	60,000	0	0	0	0	0	0	473,364
Total Funding Source	1,000,000	236,329	177,035	60,000	0	0	0	0	0	0	473,364
Operating Effect											
Contribution to Capital Reserve	0	1,000,000	0	0	0	0	0	0	0	0	1,000,000
Increased Operating Costs	0	0	198,897	124,375	124,375	124,375	124,375	124,375	124,375	124,375	1,069,522
Total Operating Effect	0	1,000,000	198,897	124,375	124,375	124,375	124,375	124,375	124,375	124,375	2,069,522

Define Problem

The current Tax Office software is based on out-of-date programming languages (COBOL, RPG). Because it resided on an outdated platform (AS 400) with limited storage space, it was transitioned to a cloud-based solution. Availability of support and maintenance programmers is very limited.

For normal appraisal usage, the software does not consider some of today's criteria (bedrooms, etc.) for appraising property.

The system is slow and it is difficult to develop the queries needed to provide information to the public and to county staff. Requests for information from the public have increased and it can take from several hours to several days to write a query that will retrieve the requested data. Queries also play a critical role in the development of the county budget by providing information on sales ratios, percent changes, value changes, high and low values, foreclosures by area, neighborhood, township, etc. They are also needed to assist in the collection of delinquent taxes by pulling areas of high delinquencies and mapping them to visit.

Recommended Solution

Replace the existing tax software in approximately three to six years, depending on the county revaluation schedule. The replacement of tax software must be done so as not to effect revaluation.

Alternatives

One alternative is to take no action at this time. However, given the uncertainty of continued support, and the need to replace software without affecting a revaluation, this approach could impact county operations.

Another alternative would be to develop custom software in-house, but the needed resource and skill is not available.

Current Stage of Project

The Tax Office received bids from seven software vendors and began the contract process in October 2021. The next reappraisal is scheduled to begin in FY 2023 and will be complete in January 2025. Software has been purchased, and implementation beginning in 2022 is currently on schedule. Implementation of the new software should be complete within one year.

CAMA residential went live in October 2022. CAMA commercial is scheduled to go live in December along with mobile and personal property. Collections will go live the beginning of July 2023. The final piece to go live will be the web portal at the end of July 2023.

Professional Services Needed

The vendor will provide project management and guidance throughout the installation, including business process consulting, conversion of current data, training, and support.

Operating Impact

There will be annual maintenance and license support fees.

Water Fund Projects

Water – Bynum Wastewater Treatment Plant Upgrade

New

Freese Nichols has prepared a condition assessment of the Bynum Wastewater Treatment Plant (WWTP) and has recommended facility improvements

Project Budget	Current										Project Totals
	Budget	Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	
Project Element											
Construction	0	0	0	0	0	0	0	0	0	2,400,000	2,400,000
Design, Engineering & Construction Ad	0	0	0	0	0	0	0	0	360,000	0	360,000
Total Project Element	0	0	0	0	0	0	0	0	360,000	2,400,000	2,760,000
Funding Source											
Water Capital Reserve	0	0	0	0	0	0	0	0	360,000	2,400,000	2,760,000
Total Funding Source	0	0	0	0	0	0	0	0	360,000	2,400,000	2,760,000
Operating Effect											
Contribution to Water Capital Reserve	0	0	0	394,286	394,286	394,286	394,286	394,286	394,286	394,286	2,760,002
Total Operating Effect	0	0	0	394,286	394,286	394,286	394,286	394,286	394,286	394,286	2,760,002

Define Problem

The Bynum WWTP was originally constructed in 1977 for the Bynum Mill Village. The last capital improvements to the WWTP were performed around 2006. Those improvements were based on a facility evaluation report prepared by Withers & Ravenel dated September 2004. The WWTP is now 45 years old. This means that some infrastructure and equipment are reaching their useful life and need to be rehabilitated. In addition, there are several safety issues related to the operation and maintenance of the WWTP that need to be addressed. Finally, there is poor surface drainage at the WWTP that exposes the plant to risk of sanitary sewer overflows (SSO) during high intensity rainstorms.

Recommended Solution

Freese Nichols is in the process of preparing a condition assessment of the Bynum WWTP and report. The report is not completed, however, for the purpose of proving some information for the CIP the preliminary recommended improvements are as follows: Site security improvements, additional lighting and possibly a working platform.

Alternatives

There is always an alternative to do nothing, and an associated consequence.

Current Stage of Project

Freese Nichols is in the process of preparing a condition assessment of the Bynum WWTP and report.

Relation to Other Projects

The Bynum gravity sanitary sewer system that drains to the Bynum WWTP is being rehabilitated using a trenchless lining method called “Cured in Place Pipe.”. The work is being performed by Inliner at a cost of \$171,000 during FY2023.

Operating Impact

Operating budget impacts are not known at this time because the Condition Assessment Report is not finished. However, it is expected to have a minimal impact because the WWTP improvements should result in operational efficiencies that somewhat reduce staff time and it is not expected to increase material costs.

Water - Haywood Water Main Replacement

Approved-No Contracts

Replace the existing four-inch water main under the railroad tracks on Haywood Road with a six-inch water main.

Project Budget	Budget	Current									Project Totals
		Prior to FY 2023	Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030	
Project Element											
Construction	112,100	7,100	0	0	0	0	0	0	0	105,000	112,100
Contingency	0	0	0	0	0	0	0	0	0	0	0
Design, Engineering & Construction Ad	47,792	23,092	0	0	0	0	0	0	0	24,700	47,792
Total Project Element	159,892	30,192	0	0	0	0	0	0	0	129,700	159,892
Funding Source											
Water Capital Reserve	159,892	30,192	0	0	0	0	0	0	0	129,700	159,892
Total Funding Source	159,892	30,192	0	0	0	0	0	0	0	129,700	159,892
Operating Effect											
Contribution to Water Capital Reserve	0	159,892	0	0	0	0	0	0	0	0	159,892
Total Operating Effect	0	159,892	0	0	0	0	0	0	0	0	159,892

Define Problem

As part of the Southeast Water District project completed in 2010, a six-inch water main was installed along Haywood Road, Moncure Loop and River Point Road. These lines do not provide adequate fire protection because of a four-inch section that crosses the CSX railroad tracks on Haywood Road. North Carolina Department of Environmental Quality (NCDEQ) requires all fire hydrants be served by a minimum six-inch water line. This four-inch section prevents the fire department from utilizing fire hydrants in the area. Instead, fire departments must fill pumper trucks with water from the nearest water point. If the fire hydrants were usable, the fire department rating might improve and the insurance premiums might decrease.

Recommended Solution

Replace the existing four-inch water main under the railroad tracks with an eight-inch water main and connect the six-inch water main along old US 1 with the eight -inch water main on Haywood Road.

Alternatives

The only alternative is to do nothing, which would prevent the fire department from utilizing the hydrants and continue the inability to provide minimal fire flow requirements set forth by NCDEQ.

Current Stage of Project

Originally, the plan was to bore under the railroad tracks, but the bids received for the project were over budget. The lowest bid was \$395,485. Due to excessive costs, the county will re-evaluate the option of tying the waterline to the existing bridge. The county will contract with an on-call engineering consultant to prepare and submit a justification package to the North Carolina Department of Transportation for approval. The proposal will include the full scope, through initial justification, encroachment agreement, and design and construction. Once NCDOT approves tying the line to the existing bridge, bids will be requested. Once the bids have been reviewed and a contract secured work can begin.

Relation to Other Projects

The project is related to the Southeast Water District completed in 2010. Because of funding limitations, the budget did not cover replacing this section of the water line.

Water - Haywood Water Main Replacement

Approved-No Contracts

Description of Land Needs

None

Professional Services Needed

Engineering, surveying, and construction phase services are under contract. The required railroad encroachment is under review and the North Carolina Department of Transportation (NCDOT) and Moncure Fire Department approvals have been obtained.

Operating Impact

None.

Water - Planning Western Intake and Plant

Approved-No Contracts

Construct a water intake and treatment plant on the west side of Jordan Lake

Project Budget	Budget	Prior to FY 2023	Current	Year 1:	Year 2:	Year 3:	Year 4:	Year 5:	Year 6:	Year 7:	Project Totals
			Year: FY 2023	FY 2024	FY 2025	FY 2026	FY 2027	FY 2028	FY 2029	FY 2030	
Project Element											
Design, Engineering & Construction Ad	6,201,099	995,241	3,222,133	1,983,725	0	0	0	0	0	0	6,201,099
Total Project Element	6,201,099	995,241	3,222,133	1,983,725	0	0	0	0	0	0	6,201,099
Funding Source											
Water Capital Reserve	6,201,099	995,241	3,222,133	1,983,725	0	0	0	0	0	0	6,201,099
Total Funding Source	6,201,099	995,241	3,222,133	1,983,725	0	0	0	0	0	0	6,201,099

Define Problem

Chatham County is approaching the capacity of the existing Jordan Lake Water Treatment Plant (3.0 million gallons per day) and additional supply will be needed in the future. The existing maximum demand for water is approximately 3.6 million gallons per day (mgd). During the high irrigation months Chatham County has to purchase water from Durham on a near daily basis. Expanding the capacity at the existing plant requires constructing a pipeline across Jordan Lake which is extremely expensive due to the cost of boring under the lake.

Recommended Solution

Construct a new intake and water treatment plant on the west side of Jordan Lake in cooperation with the partnering jurisdictions of Orange Water and Sewer Authority (OWASA), the City of Durham and the Town of Pittsboro.

Current Stage of Project

A scope of work for the initial feasibility study for the new intake and water treatment plant has been developed and an engineering firm has been selected to complete the study. The study is complete, and the partners are investigating finance and timing issues. Durham was the lead agency and paid 100% of the cost for the initial feasibility study. Chatham is incurring costs for its allocation request, the regional water supply plan, and an interconnection study. Raftelis has been hired by the Western Intake Partners (OWASA, City of Durham, Town of Pittsboro, and Chatham County) to evaluate and develop a governance structure for the entities of the Western Intake Partnership. The Partners have entered into a contract with Hazen and Sawyer for the Water Intake and Transmission Infrastructure Preliminary Engineering Project. Two other projects are planned for this year. The Western Intake Partners have entered into a contract with Environmental Permitting Project with Brown and Caldwell and the Western Intake Partners Regional Water Treatment Facility Engineering Project with CDM Smith which both started in fiscal year 2022. In June of 2019 a Memorandum of Agreement (MOA) was approved and signed by the Western Intake Partners to move forward with the initial phases of the Western Intake Regional Water Plant to include policy and governance, preliminary engineering work, field evaluations and permitting with the Army Corps of Engineers and NCDEQ. A Request for Qualifications (RFQ) was issued by the Western Intake Partners to hire a Project Management Team to oversee these initial phases and potentially future phases of the project. HDR is the firm that has been hired by the partnership to oversee these initial phases. Meetings are currently underway with the Army Corps of Engineers and NCDEQ to discuss permitting and easement acquisition. Chatham County water demand projection to the year 2050 show a need for WIP WTP capacity of 3,500,000 million gallons (Max. Day). The preliminary engineering projects are expected to be completed by December 2024. The next phase is detailed design which is schedule to take place from 2025-2027.

Relation to Other Projects

The Durham interconnect project will provide additional water supply while the new intake and water plant are planned and constructed.

Description of Land Needs

Land is needed on the western shore of Jordan Lake. The number of acres is not yet determined.

Professional Services Needed

Environmental and engineering services will be needed.

Operating Impact

There will be significant operational impact, but the scope of that impact will be determined as the project becomes more refined.

Water – Water Treatment Plant (WTP) Activated Carbon Upgrade

New

New regulations from EPA will require the drinking water treatment of emerging contaminants such as per-and polyfluoroalkyl substances (PFAS) and 1,4 Dioxane.

Project Budget	Budget	Prior to FY 2023	Current								Project Totals	
			Year: FY 2023	Year 1: FY 2024	Year 2: FY 2025	Year 3: FY 2026	Year 4: FY 2027	Year 5: FY 2028	Year 6: FY 2029	Year 7: FY 2030		
Project Element												
Construction	0	0	0	0	0	0	0	0	0	0	10,600,000	10,600,000
Design, Engineering & Construction Ad	0	0	0	0	0	0	0	0	0	1,000,000	500,000	1,500,000
Total Project Element	0	0	0	0	0	0	0	0	0	1,000,000	11,100,000	12,100,000
Funding Source												
Water Capital Reserve	0	0	0	0	0	0	0	0	0	1,000,000	11,100,000	12,100,000
Total Funding Source	0	0	0	0	0	0	0	0	0	1,000,000	11,100,000	12,100,000
Operating Effect												
Contribution to Water Capital Reserve	0	0	0	1,728,571	1,728,571	1,728,571	1,728,571	1,728,571	1,728,571	1,728,571	1,728,572	12,099,998
Total Operating Effect	0	0	0	1,728,571	1,728,571	1,728,571	1,728,571	1,728,571	1,728,571	1,728,571	1,728,572	12,099,998

Define Problem

Emerging contaminants such as PFAS and 1,4 Dioxane have been found in Jordan Lake. The Environmental Protection Agency (EPA) has announced new drinking water health advisories for emerging contaminants such as PFAS and 1,4 Dioxane. In the near future, the EPA will be developing new regulations to treat emerging contaminants in the water. It is not known at this time the implementation date or treatment levels. The existing water treatment plant current treatment processes do NOT provide treatment for emerging contaminants.

Recommended Solution

Granular Activated Carbon (GAC) can be used to treat emerging contaminants such as PFAS.

Alternatives

The Western Intake Plant (WIP) is currently doing a pilot project to determine what water treatment processes will be effective in treating emerging contaminants. Once the pilot project is completed in 2023, we will have a better idea of alternative treatments for emerging contaminants. Could also do nothing and wait for the EPA to implement new regulations that would require compliance.

Current Stage of Project

Not started

Relation to Other Projects

The Western Intake Plant (WIP) will also need to treat emerging contaminants.

Description of Land Needs

No land needs, the existing WTP site can accommodate the new GAC treatment processes.

Professional Services Needed

Engineering design, permitting and construction management services for the GAC treatment processes.

Operating Impact

Not known at this time

Future Projects

Future Projects

Currently, the county lacks sufficient data, revenue, or debt capacity to schedule these projects. If these issues are resolved, these projects may appear in a future CIP.

Community College - Career and Technical Education Building

Future

Construct a new Career and Technical Education Building on the Chatham Main Campus to meet needs for skilled trade fields in the service area.

Define Problem

The college has limited physical space on the Chatham Main Campus to expand program opportunities in career and technical education programs. The college has recently started an Electrical Systems Technology program that utilizes space in the Sustainable Building, which was not designed to meet the needs of this program. The college's Building Construction Technology program is also using space in the Sustainable Building that was not designed to meet the needs of this program.

Recommended Solution

Construct a new building on the Chatham Main Campus for Career and Technical Education Programs.

Alternatives

1. Construct a new building on the Chatham Main Campus for Career and An alternative is to continue offering existing programming and not offer new degree options in Career and Technical Education.

Current Stage of Project

College staff is doing additional research to determine the programming mix for this building to meet needs for skilled trade fields in the service area. Staff is also investigating additional funding sources. In addition, water and wastewater capacity will have to be obtained from the Town of Pittsboro.

Description of Land Needs

Sufficient space is available at the main campus.

Professional Services Needed

Professional design, architecture, and construction will be needed.

Operating Impact

Additional funding will be needed for utilities and building maintenance.

Council on Aging - New Senior Center

Future

Replace the existing Eastern Senior Center in Pittsboro with a 23,542-square-foot building or replace both centers with a 38,539-square-foot, centrally located building.

Define Problem

The Eastern Chatham Senior Center is severely overcrowded. A space needs study conducted pro-bono by Hobbs Architects shows that an additional 6,591 square feet of space is needed now, which is roughly double the current square footage. The study also shows that an additional 10,000 square feet will be needed by 2040 (overall, the Eastern Center will need 23,542 square feet by 2040). The same analysis showed that the Western Senior Center will need an additional 13,740 square feet by 2040.

Recommended Solution

The Council recommends either Option 2 or Option 3. However, the square footage estimates above only reflect the projected space needs for delivering today's services in 20 years. These alternatives do not consider other models for delivering senior services.

Alternatives

Three alternatives were examined by Hobbs Architects, including:

Option 1: Construct a second building in the eastern part of the county to accommodate existing needs not addressed by the addition/renovation and expected 20-year growth. This alternative requires constructing a 16,878-square-foot building. This option moves the Council away from a “one-stop shop” for addressing the needs of the county’s older adults. This option will change the nature of how clients access Council services and will be less operationally efficient, as some duplication of staff will be needed. This option does nothing to address the space needs of the Western Senior Center.

Option 2: Replace the Eastern Senior Center with a 23,542-square-foot building. According to Hobbs Architects, this size building will not fit on the existing Pittsboro lot because only 14,500 square-feet additional impervious surface can be added to the site. This option maintains the current service model of a “one-stop shop,” but does not address the needs of the Western Center.

Option 3: Replace both the Eastern and Western centers with a centrally located 38,539-square-foot building. The Council would be able to sell the Western Center building to help offset the cost of the new building and would be able to consolidate administrative functions, leading to greater operating efficiencies and less square footage needed overall. (The Eastern Center property is owned by Central Carolina Community College and there are legal questions about the Council’s ability to sell the building). This option maintains the one-stop shop model and addresses the countywide needs of the county’s older adults.

Current Stage of Project

Council is submitting the 20-year projected space needs based on the current service delivery model for consideration as a future project. The Council is in the process of working with its board, clients, county departments and other partners, and the senior population at large, to develop a model of services that best fits Chatham County’s needs in 20 years. A Capstone Team of UNC students is helping the Council this year to conduct some background research. When that work has been done, the Council will re-engage with Hobbs Architects to update the building program and will present refined needs with cost estimates in a future CIP. In the meantime, the Council is undergoing some much-needed expansion and renovation of the Eastern Senior Center, which has become even more imperative given COVID-19.

Professional Services Needed

Architecture, design, engineering, and construction management will be needed.

County Buildings - County Complex Master Plan

Future

Develop a long-term master plan that will address long-term space needs for county buildings currently at the government annex campus, while being responsive to the desire for a clear vista between the Justice Center and the Historic Courthouse that would contribute to a vibrant downtown setting.

Define Problem

The growth that has already occurred in Chatham County has outpaced the capacity of the existing buildings. Anticipated future growth will exacerbate the problem. The Courthouse Annex has been partially renovated; however, renovated areas have outgrown the existing space needs. Staff housed in the Dunlap Building are overcrowded and the meeting room has been repurposed as office space. The Old Agriculture Building requires significant renovation to provide office space. At the same time, members of the Downtown Merchants Association and others have expressed the desire for more open park-like space and parking where the Courthouse Annex now exists.

Recommended Solution

Develop a master plan for a downtown campus. Among other options, this master plan will explore; 1) Removing the Annex, Dunlap, and Old Ag Buildings, 2) Constructing a new building to house all of the departments currently residing in these buildings and 3) Developing a park area between the Historic Courthouse and the Justice Center to improve the appearance of downtown Pittsboro and the sight lines between the Historic Courthouse and Justice Center.

Alternatives

Based on the renderings provided by the feasibility study consultant, addressing the space needs and the need for open space concurrently would require a three-story building and parking deck that would leave little room for future expansion. In addition, staging of the project could create traffic, parking, and logistical issues. A possible alternative is to locate the county offices on a portion of the unused land that the county owns at the site of the Chatham County Agriculture and Conference Center (CCACC). County offices would still be close to downtown for shopping, lunch, and other business and the existing site of the Dunlap Building could be sold and begin to generate tax revenue for the Town of Pittsboro. This option could be easier to phase, because once the building was complete, all employees could be moved and the construction of the open space and parking downtown could be accomplished. In addition, there would still be sufficient remaining space at the CCACC to accommodate plans for the future while still allowing for future expansion for county offices.

Current Stage of Project

In FY 2018, the Board of Commissioners directed staff to hire a consultant to create a downtown master plan to accommodate the space needs of the county and develop a park-like area between the Historic Courthouse and the Justice Center. The consultant presented a master plan to the Board of Commissioners in October, 2018 that would address projected space needs up to 2048. Commissioners requested that staff consider moving the site of the project to the county-owned parcel on Renaissance Drive. However, the project is on hold until the Town of Pittsboro has wastewater capacity to support the new facility. Planning for the project will resume when adequate wastewater capacity is obtained by the town.

Relation to Other Projects

The project is related to the Town of Pittsboro project to build a new town hall that will provide short-term space for the Chatham County Public Health Department and the Board of Elections.

Professional Services Needed

An updated Master Plan, detailed architectural drawings, and construction management will be needed.

County Buildings – New Sheriff’s Office

Future

Build new facility to house Sheriff’s Office employees.

Define Problem

The current building, built in 1982, is no longer an adequate space for Sheriff’s Office employees. Even after a partial renovation in 2007 there is still not adequate space for employees to work. The total building space consists of 16,337 square feet, 8,900 in the lower portion (formerly the jail) and 7,437 upstairs (office space). The upstairs space provides sixteen offices, some with multiple employees sharing space.

Renovation of the old detention facility was proposed. However, renovation would be costly – in excess of one million dollars – and would not provide sufficient room for the office to grow and be consolidated in one location.

Recommended Solution

A new Sheriff’s Office building on the space available in front of the Detention Facility will provide room for future growth and consolidate the office in a single location.

Alternatives

Option 1: The former jail could be renovated and provide short-term space for the Sheriff’s Office, including storage of evidence and additional staff space.

Option 2: Do nothing. If the space is left unused, the area will still require heating and cooling to prevent the formation of mold and mildew. Existing and future Sheriff’s office staff will have to be in rented space.

Option 3: Build a new Sheriff’s Office at the new Detention Center location.

Current Stage of Project

This project cannot be scheduled until the Town of Pittsboro has wastewater capacity to support the new facility.

Professional Services Needed

Architectural, engineering, and construction services will be needed.

County Buildings - Northeast Library

Future

Build a library branch in the northeastern area of the county.

Define Problem

The library system has experienced significant changes since a facilities study was completed in 2001 by library consultant Phil Barton. The Town of Goldston completely refurbished a building for a library. The Central Carolina Regional Library system dissolved, and Chatham County entered into a new partnership with Central Carolina Community College. A joint-use facility was constructed on the Pittsboro campus where both students and members of the public have received library services in the same building since 2010.

Wren Memorial Library recently completed a major renovation project initiated by the Town of Siler City. In addition to a welcoming environment throughout the building, much needed storage space was added by enclosing in an unused carport area. The community greatly benefits from an updated meeting room including audio/visual equipment installed by the county for presentations and group activities.

In 2014, a follow up library strategic plan, also authored by Barton, identified Northeast Chatham as an area that, although experiencing ongoing residential growth, did not have a nearby library location. Residents in this area who come to the Chatham County Community Library in Pittsboro have said that they would rather not travel such a distance to use the library.

Alternatives proposed to alleviate this situation have included leasing space and purchasing book-dispensing vending machines. Each of these options has limitations and shortcomings. The library has expanded online services beyond eBooks to include virtual programming for adults and children that minimizes the transportation issue.

Recommended Solution

A suggestion which combines two alternatives has emerged as a viable solution. The concept would be to use land along 15-501 provided by Briar Chapel development and to construct another joint-use facility.

The growth in the northeastern quadrant of Chatham County has necessitated planning for other needs. The county currently lacks the debt capacity to add a library with these other projects on the horizon. In 2019 CCCC completed construction of a health sciences classroom facility on the Briar Chapel tract of land. The building includes space to conduct early voting activities. A future project to build a 10,000-square-foot library adjacent to the new classroom building has been proposed.

An advantage of this proposal is that a 10,000-square-foot facility would not require the purchase of any additional land. Most of the site preparation would occur at the time the health sciences project was being constructed. CCCC and the library have an established working relationship. The location on 15-501 is easily accessible to anyone living in the NE quadrant of the county. The residents of the Briar Chapel development would also have easy access to a library without the inconvenience of library users driving through their neighborhood.

Description of Land Needs

Acreage adequate to construct a 10,000-square-foot facility.

Professional Services Needed

Professional design, architecture and construction would be needed.

Operating Impact

Additional funding would be needed for operational expenses.

County Buildings - Sheriff's Boat Storage Facility

Future

Build a facility near Jordan Lake to provide storage and quick response times for the Sheriff's Office boat and personnel for emergency needs on Jordan Lake.

Define Problem

Currently the Sheriff's Office main boat is located at the North Chatham Fire Department substation on Seaforth Road. A second smaller boat is located in the Performance building in Pittsboro. The location at the North Chatham Fire Department is not permanent and can change if the space is needed by the fire department. Space for additional equipment is limited. Storage of the second boat in Pittsboro creates a significant delayed response for its use. These boats must be maintained and positioned closer to the area of use in a permanent location that allows storage and growth for the program.

Recommended Solution

The Sheriff recommends the building of a new storage facility to maintain watercraft, drones, and future needs in this area.

Alternatives

Alternatives to building a new storage facility near the lake include:

Option 1: Rent space in the marina, which would expose assets to the elements.

Option 2: Work with the North Chatham Fire Department to understand how much longer the facility can provide space for the boat and whether an additional bay could be built.

Option 3: Identify other opportunities to rent covered space in proximity to the lake.

Option 4: Do nothing currently and continue to maintain the boats at the North Chatham Fire Department and at the Performance Building.

Description of Land Needs

Approximately 1 acre of commercial space near the lake would be needed to construct a facility.

Professional Services Needed

Architectural, engineering, and construction services will be needed.

Operating Impact

Additional funds will be needed for maintenance and utilities.

County Buildings - Sheriff's Northeast Substation**Future**

Lease or build a new substation in Northeast Chatham County to better serve the growing population.

Define Problem

The Northeast portion of the county is growing rapidly, and there has been a corresponding increase in calls for service. A Sheriff's substation in this area is needed to respond to the associated increase in calls for service with a shorter response time than can be provided from the office in Pittsboro.

Recommended Solution

Lease or build a small Sheriff substation in Northeast Chatham County.

Alternatives

Option 1: Lease and possibly upfit existing space.

Option 2: Locate land and build a small 3,000 square-foot substation.

Professional Services Needed

Architectural, engineering, and construction services may be needed.

Operating Impact

Additional funds will be needed to operate and maintain the space.

County Buildings - Sheriff's Office Warehouse

Future

Build new 7,000 square-foot facility to house Sheriff's Office equipment to include command bus, command trailer, boat, community service trailers, and other equipment.

Define Problem

The Sheriff's Office has equipment that includes a command bus, command trailer, boat, side-by-side all-terrain vehicle, golf cart, four utility trailers, two radar trailers, two electronic sign trailers, and two utility light fixture trailers. This equipment is stored at various locations instead of at a central safe location for proper upkeep and quick dispersal. A central location is needed to store Sheriff's Office property, create a work area for maintaining equipment, and create space to investigate large pieces of evidence. The space will need to be 70x100 for current operations and future growth.

Recommended Solution

Build a new warehouse near the Detention Center and new Animal Resources Center.

Alternatives

One alternative is to do nothing and continue to use existing space as well as outsourced spaces. Another option is to rent a warehouse.

Description of Land Needs

Approximately 2 acres would be needed.

Professional Services Needed

Architectural, engineering, and construction services will be needed.

Operating Impact

Additional funds will be needed to operate and maintain the facility.

Parks - Plans for New and Existing Parks

Future

Build new park facilities and trails and update and renovate existing facilities.

Define Problem

Population growth continues to result in increased demand for new parks and amenities, trails, and recreation programs.

Recommended Solution

Develop a prioritized plan and a funding strategy to anticipate and respond to additional demand for service. Use operating budget capital outlay funds to address appropriate smaller projects. Schedule larger projects – such as new park construction or existing park improvement - in the CIP when funding sources can be identified.

Current Stage of Project

Following adoption of the Parks and Recreation Comprehensive Master Plan in 2019, staff began work on a phasing plan for the improvements envisioned at Southwest District Park, Earl Thompson Park and Northeast District Park. An overall strategy to address the timing and implementation of new facilities and renovations county-wide is in progress.

Description of Land Needs

Adequate acreage currently held by the county is available to house the construction of a new Parkers Ridge Park. Other future facilities could require additional land.

Professional Services Needed

Architectural, design, and construction services may be needed in the future.

Operating Impact

Additional funding would be needed for operational expenses, including staff; some of these may be offset by revenue-generating programs and events.

Schools - HVAC Upgrades

Future

Upgrade outdated and inefficient HVAC systems.

Define Problem

Only four of the 19 Chatham County School buildings were constructed during the last ten years (Margaret Pollard Middle, Virginia Cross Elementary, Chatham Grove Elementary, and Seaforth High School) using energy efficient construction and mechanical systems. The 2014 Chatham County Schools Facility Conditions Assessment indicates that HVAC systems in the majority of the remaining 15 schools have outlived their projected life expectancy, are inefficient, and need replacement. Taking care of this issue offers the potential for substantial energy savings for the district and will create an opportunity to take advantage of more environmentally responsible (e.g., geothermal HVAC) technologies and systems.

Recommended Solution

Conduct a feasibility study to estimate current costs. Establish a timeline and begin contributing to capital reserve to establish a dedicated funding source.

Alternatives

An alternative is to do nothing and continue patching existing HVAC systems to keep them running until they completely fail.

Professional Services Needed

Design and engineering services will be needed.

Operating Impact

Energy costs may decrease with more modern and efficient systems.

Schools - New Elementary School at Chatham Park (Southern Village)

Future

Construct new elementary schools at Chatham Park

Define Problem

During the next ten years, the current Northwood/Seaforth attendance zones are projected to grow by approximately 1,900 students. The majority of these are expected to be generated by Chatham Park. We will need to construct schools in Chatham Park to meet the projected growth in population.

Recommended Solution

Monitor North Carolina State University Operations Research and Education Lab (ORED) projections and the Chatham Park buildout on an annual basis and schedule this project accordingly. Scheduling/funding flexibility is needed due to the changing circumstances associated with a building project of this size. Financial and architectural plans for a new elementary school will begin when it is apparent that the school is needed.

Alternatives

Do not build an additional school and continue adding modular units to the current K-5 schools in the Northwood/Seaforth attendance zones.

Description of Land Needs

25 Buildable Acres - Chatham Park will donate the land and provide access roads, water/sewer, and needed infrastructure. This was outlined in documents with the Town of Pittsboro and in an MOU with the Board of Education.

Professional Services Needed

Design, engineering, and construction services will be needed.

Operating Impact

Additional funding will be needed for operating expenses upon opening of a new school.

Schools - New Schools/Capacity Expansion

Future

Construct new schools, add additions to existing schools, and/or add modular classrooms as most feasible.

Define Problem

Based on OREd projections, the following factors are expected to create the need for new schools, additions to existing schools, and/or modular classrooms within the next 10 years to accommodate projected student population growth:

- New industries/companies at the Moncure and Siler City megasites and associated student population
- Continued residential expansion in the northeast quadrant of the county
- Student population growth associated with and/or generated by Chatham Park
- Potential student population growth associated with renewed residential expansion in the Siler City area

Current projections indicate the need to begin addressing the following issues at some point in the next ten years:

- Increase middle school capacity in the current Northwood/Seaforth attendance zones at Margaret Pollard Middle School and in the current Jordan-Matthews attendance zone at Chatham Middle School.
- Increase high school capacity at Northwood High School and Jordan-Matthews High School as needed to respond to the potential growth in their attendance zones.,
- Increase elementary, middle, and high school capacity in the Jordan-Matthews attendance zone,
- Continue creating additional elementary classroom space in response to state mandated class-size reductions for kindergarten through 3rd grade,
- Expansion of alternative school and increasing enrollment at early college,
- Identification and purchase of land for future schools to be located on the eastern side of Jordan Lake.

Recommended Solution

The population figures will be monitored on a yearly basis using ten-year projections, and financial and architectural planning will be requested when it is apparent that the capacity expansion is needed. Prior to proposing brick and mortar additions and/or new schools, every effort will be made to address expansion using the modular classrooms already funded in the approved Mobile Classroom CIP project and/or possible redistricting strategies.

Alternatives

Do nothing.

Professional Services Needed

Architectural and design services will be needed.

Operating Impact

Additional funds will be needed for equipment, supplies, maintenance, and staff.