

## TAB 5-Response to Section 4 of the SUP Application

### Response to Section A item 4 of the SUP Application

**Section 4- The manner in which the proposed amendment will carry out the intent and purpose of any adopted plans or part thereof.** (I.e. Comprehensive Plan, Chatham/Cary Joint Land Use Plan, etc.) You must note specifics from the plan/s giving reference to page number and section. **In support of the Comp Plan, include the following references at a minimum:**

CHAPTER TWO: (begins on page 13)

- Issues & Opportunities

CHAPTER THREE: (begins on page 39)

- Goals and Objectives
- Land Use Descriptions

CHAPTER FOUR: (begins on page 51)

- Economic Development (page 53)
- Land Use (page 61)
- Natural Resources (page 103)
- Parks and Recreation (page 117)

**In response to the above sections, we have provided the following statement.**

Upon reviewing the Comprehensive Land Use Plan adopted on November 20th, 2017, we identified a central theme focused on enhancing utilities within the community. We believe that improving cellular communications and broadband services within a community will help ensure all residents have access to education and entrepreneurial opportunities. The impact of these improvements creates a thriving and resilient community, making the county an attractive and sustainable place for residents and businesses alike.

Furthermore, these advances will complement the Comprehensive Land Use Plan's short-term objectives and the overarching long-term goals as well as help in the following areas.

#### 1. **Population Growth:**

- *Remote Work Opportunities:* Robust broadband infrastructure enables remote work, attracting professionals seeking flexible employment opportunities and fostering population growth as individuals and families choose areas conducive to remote employment.
- *Educational Opportunities:* Improved internet connectivity supports online learning and educational resources, making the county an attractive destination for families seeking quality education and contributing to a well-educated and skilled population.

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### 2. Emergency Response Services:

- *Faster Communication:* High-speed broadband facilitates quicker communication between emergency responders, crucial for ensuring resident safety and minimizing the impact of emergencies.
- *Telemedicine and Remote Consultations:* Broadband enables telemedicine services, allowing emergency responders to consult with healthcare professionals remotely, enhancing medical care during emergencies.

### 3. Economic Development:

- *Attraction of Businesses:* Reliable broadband infrastructure attracts businesses, especially in technology and knowledge-based sectors, fostering job opportunities and stimulating economic growth.
- *E-commerce and Entrepreneurship:* Improved broadband supports e-commerce and entrepreneurship by providing a platform for online marketing, transactions, and communication, contributing to the diversification and resilience of the local economy.

**Note:** Below are various sections cut from the Comprehensive Land Use Plan that mention “Broadband” and how it can play a role in Chatham County meeting their objectives.

# OBJECTIVES

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by students in Chatham County Schools.

- Number of small businesses.
- Percentage of out-commuting residents.

## 5. Conserve natural resources.

- Maintain and restore the quality and quantity of groundwater and surface water resources.
- Preserve and protect the ecosystem services provided by green infrastructure.
- Avoid or minimize landscape fragmentation.
- Preserve night skies by minimizing light pollution.
- Potential Metrics:
  - Acres of protected land (public and private).
  - Number of acres of conservation land or forested land cover along rivers and streams.
  - Stream miles considered impaired.
  - Water quality in rivers and Jordan Lake.
  - Percent tree canopy in the county or in threatened watersheds.

## 6. Provide recreational opportunities and access to open space.

- Provide expanded recreation opportunities and improve access to parks, community facilities, trails and open space.
- Potential Metrics:
  - Percentage of population with access to parks and trails.
  - Recreational opportunities (# of facilities, programs) and participation (usage).
  - Park acreage.

## 7. Provide infrastructure to support desired development and support economic and environmental objectives.

- Focus the development of utilities and urban services to foster compact development and support economic development in defined areas.
- Create a multi-modal transportation system that is well-maintained, age-friendly, and context-appropriate.
- High-speed internet/broadband should be available to all to and enable education and entrepreneurship.
- Potential Metrics:
  - Number of new residential wells vs. public water system customers.
  - Groundwater usage statistics from residential development.
  - Number and location of failing wells and septic tanks.
  - Number of new septic tanks, private wastewater systems and public sewer customers.
  - Transit ridership.
  - Transportation mode for work and non-work based trips.
  - Percentage of homes and businesses with internet available.

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- Conduct a study to determine steps to improve access for areas within Wellness Priority Areas that do not have safe access to healthy food vendors, healthcare and/or parks.
  - Identify areas of potential need for greenways or multi-use paths to achieve goals for parks and recreation and related health benefits.
- Pursue safe routes to school funding, where appropriate.
- Education – Access to education at all levels, including workforce training that is appropriate with the needs of existing and targeted employers, also contributes to economic security of people living in the County. Quality education needs to be available in locations close to concentrations of population as well as through **broadband** access to online resources
- Healthcare – The distribution of hospitals, urgent cares, clinics, and other healthcare facilities relative to the population has an impact on access to healthcare.
- Shopping and services – Proximity of shopping and services that meeting daily needs of County residents should be considered in determining the appropriate mix of uses throughout the County.
- Agriculture – Agriculture at all scales, including community gardens and small-scale specialty agriculture, can be integrated into the development pattern in a manner that supports increasing access to nutritious food, job generation, and a healthier ecosystem.
- Recreation and Open Space – Parks, walking paths, and natural areas can be part of and complement existing and future development in the County. Having safe and affordable access to place(s) to walk, bike, socialize, and play is important to maintaining and improving physical, emotional, and mental health. In addition, visual and physical access to nature can improve overall health and well-being of County residents. Conserving environmentally valuable areas in the creation of the open space system can also lead to a healthier ecosystem with better air and water quality.

### Recommendation 02

#### Promote a diverse range of development uses within the County.

##### HL Policy 4

Consider how better access to a diverse range of uses, amenities, services, and programs through distribution and integration in the development pattern can contribute to a healthier community.

##### ► Strategy 4.1

Amend the County's land development regulations to facilitate a broader mix of uses and link housing development with employment opportunities, human/social services, and transportation.

- Housing – Our individual sense of safety is derived in part from the adequacy (as we define it) of our housing. The housing mix should include a range of product types, ensuring a minimum level of quality as well as affordability.
- Employment – The availability of jobs, which contributes to economic security of people living in the County, depends in part on the proximity and accessibility of job-generating uses, as identified in the economic development strategy customized for the County. The County can accommodate such uses in a manner that sensitively integrates them into the development pattern in locations where such uses can be successful. A corresponding reduction in work commutes equates to additional health benefits as it helps improve air quality and lower stress levels associated with driving congested conditions.

### Recommendation 03

#### Increase access to healthy foods and better nutrition.

##### HL Policy 5

Build community support for better access.

##### ► Strategy 5.1

Support the Chatham Community Food Council and the

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in planning processes and give input into development decisions.

### HL Policy 9

Support the development of a comprehensive set of transportation (or mobile) solutions.

#### ► Strategy 9.1

In addition to creating a multimodal network that enhances access to healthcare by supporting alternative means of travel, consider transportation service provision through County-supported programs that include the participation of various types of organizations:

- Chatham Transit and other local and regional transit and paratransit providers.
- Volunteer organizations (typically through churches and hospitals) willing to offer assistance with transportation, such as taking people to appointments, pharmacies, grocery stores, etc.

#### ► Strategy 9.2

Encourage expansion of mobile healthcare services.

#### ► Strategy 9.3

Designate locations for mobile unit stops. Mobile units that circulate on a regular basis and with scheduled stops at specified locations can help bring healthcare to rural and older residents with limited transportation options. The County may need to participate in the steps to designate and maintain such stop locations. Land acquisition and formal use agreements may be among those steps.

### HL Policy 10

Support efforts to provide and extend **broadband** service.

#### ► Strategy 10.1

Healthcare providers are reaching more people through online services and resources, emphasizing prevention through education and training. With access to **broadband**, County residents can improve personal health with information as well as connections to healthcare professionals (i.e., virtual doctor visits).

### Recommendation 05

#### Increase opportunities for education and economic security.

Individual economic security is derived in part from a sense of ample employment opportunities and affordable education and training.

### HL Policy 11

Promote education, training, and job growth.

#### ► Strategy 11.1

Recruit new employers, and support expansion of existing businesses.

#### ► Strategy 11.2

Increase workforce training program offerings.

#### ► Strategy 11.3

Expand access to **broadband** (for virtual workplaces, which expand opportunity)

- *See Economic Development recommendations for more information about employment and related workforce development.*

### Recommendation 06

#### Promote “healthy community” design.

### HL Policy 12

Establish a framework for guiding public and private investments so the end results are environments that are conducive to healthier living.

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### ► Strategy 3.6

Provide training for staff to increase capacity to review and permit Green Certified buildings, alternative energy systems, water reuse systems, green stormwater infrastructure (GSI) and other innovative building methods.

### Resiliency Policy 4

Encourage alternative energy in order to lessen dependency on the utility grid.

### ► Strategy 4.1

Evaluate barriers to renewable energy installations and consider permitting on-site small-scale renewable energy generation as a principal or accessory use in appropriate zoning districts.

### ► Strategy 4.2

Allow by-right small-scale solar and wind systems; consider relaxed setbacks for these systems.

### ► Strategy 4.3

Orient blocks and buildings to maximize active and passive solar access.

### ► Strategy 4.4

Discourage home ownership association rules that prohibit outdoor clothes lines.

### ► Strategy 4.5

Consider sites within or near Employment Areas (including proposed megasites) for renewable energy facilities such as solar farms as a complimentary use.

### Resiliency Policy 5

Reduce per capita emissions.

### ► Strategy 5.1

Recruit jobs and increase access to **broadband** in order to reduce the rate of out-commuting.

### ► Strategy 5.2

Concentrate higher density mixed use development in designated areas to encourage walking and biking trips and support successful transit service.

- *See Land Use Element for specific recommendations*

### ► Strategy 5.3

Partner with academic institutions, regional partners and other organizations to monitor emissions and carbon sequestration, as well as develop strategies to reduce emissions and encourage carbon sequestration.

### ► Strategy 5.4

Encourage electric vehicles by (1) studying ways to leverage public assets and private development to create a county-wide network of Electric Vehicle (EV) charging stations, and (2) incorporating electric powered vehicles in government owned vehicle fleets (i.e. Chatham County, Chatham Transit, and Chatham County Public Schools).

### ► Strategy 5.5

Encourage "Complete Street" elements and transit service expansions to provide residents with transportation options in order to reduce vehicle miles traveled.

- *See Transportation Element for specific recommendations*

### Resiliency Policy 6

Improve waste and recycling services to meet the needs of the County.

### ► Strategy 6.1

Improve facilities and expand programs as needed.

- Increase the number of recycling centers
- Improve collection centers to extend service life and incorporate landscaping and stormwater improvements
- Evaluate fee structure
- Expand programs to accommodate increased population



# UTILITIES AND PUBLIC SERVICES

Well planned utilities and public services are critical to accomplishing economic development, land use, and environmental goals. Key objectives guiding the policies and strategies in this Plan Element include:

- Focus the development of utilities and urban services to foster compact development and support economic development in defined areas.
- High-speed internet/**broadband** should be available to all and enable education and entrepreneurship.

## BIG IDEA

**Define urban service areas & update policies to accomplish economic development and environmental goals.**

## GOALS

### PRIMARY GOAL

**Provide infrastructure to support desired development and support economic and environmental objectives.**

### SECONDARY GOAL

**Preserve the rural character and lifestyle of Chatham County.**

## Case Study

Supports  
Strategy 4.2

### Rural Broadband Expansion

Mid-Atlantic Broadband (a non-profit), Microsoft and the Virginia Tobacco Commission are partnering to expand broadband in rural Halifax and Charlotte counties in Virginia.

For More Information:

[http://www.sovanow.com/index.php?/news/article/warner\\_brought\\_up\\_to\\_speed\\_on\\_broadband\\_rollout/](http://www.sovanow.com/index.php?/news/article/warner_brought_up_to_speed_on_broadband_rollout/)

<http://www.mbc-va.com/news/b2xonline-inc-partners-with-abc-to-expand-broadband-services/>

#### ► Strategy 2.2

Require new development to demonstrate the ability to provide an adequate water supply and wastewater treatment indefinitely for all uses in the proposed project.

#### ► Strategy 2.3

Require private water and wastewater systems to be built according to county standards that include monitoring of potential environmental impacts.

#### Utility Policy 3

Require water efficiency in public and private developments.

#### ► Strategy 3.1

Require new developments over a certain size to include water reuse systems and remove county regulatory barriers for site-scale systems.

#### ► Strategy 3.2

Require the design process of new county buildings over a certain size threshold to study the utilization of innovative water reuse / recycle systems.

#### Utility Policy 4

Support economic development and other goals with public utility planning and investment.

#### ► Strategy 4.1

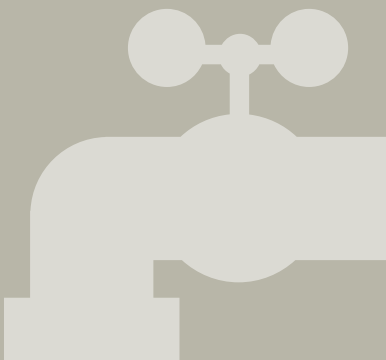
Promote county-wide planning and coordination with municipalities regarding water, sewer, solid waste, and broadband internet.

#### ► Strategy 4.2

Building on previous broadband coverage research, explore grant funds (such as through the Golden LEAF Foundation) and partnerships to expand broadband internet service to high-priority portions of the County.

#### ► Strategy 4.3

Partner with Siler City to serve the Chatham-Siler City Advanced Manufacturing (CAM) Site with water and wastewater service.





# Utilities and Public Services Action Items

## Priority Projects, Plans, Programs

### Action Item 01

Adopt an Urban Service Area (USA) and update utility and public service policies. Potential USAs include:

- Future Cary per joint land use plan
- Employment center at NC 751 and US 64 (service from Apex is a possibility, but their policy requires non-residential uses)
- Moncure area (megasite and the Moncure community)
- Goldston and US 421 interchange area

The structure of the USAs and supporting policies could include reimbursement policies and guidance on when public water or sewer should be extended for new development. The approach could define tiered zones that provide a prioritization of utility extension such as:

- Tier I = close to capacity and near centers, extension is ok, but may require private investment
- Tier II = extension is discouraged except for agricultural use
- Tier III = no service

### Action Item 02

Expand public services (including police, fire, health and other county services) concurrent with demands.

### Action Item 03

Modify regulations to encourage or require new development of a certain type or size to include water reuse systems.

### Action Item 04

Explore grant funds and partnerships to expand broadband internet coverage.

### Action Item 05

Partner with municipalities to serve economic development priorities with water and wastewater.

### Action Item 06

Establish a water and/or sewer allocation policy to accomplish economic development, housing, and other goals.

### Action Item 07

County-wide water / sewer master plan to identify key infrastructure upgrades, regional connections, and water supply solutions. This plan could also establish county standards for decentralized wastewater systems.

