



## LAND USE

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## CHAPTER 8 – *LAND USE*

### INTRODUCTION

Land Use is considered by most people to be the heart of the Comprehensive Plan. The Land Use Plan serves to coordinate public and private decisions that affect the physical development of the County. By establishing a vision for the future, the plan strives to create a desirable pattern of development toward which present activities can be directed.

In designating areas for various land uses, consideration must be given to natural features, existing land uses, existing and proposed public improvements, as well as the transportation system. Overall, the Land Use Plan is intended to create a well-organized, cohesive community that functions efficiently. While future growth is encouraged, the unique character of the County must be protected and the needs of existing residents and businesses addressed.

The Land Use Plan designates areas as agricultural, rural, residential, commercial, industrial, public, semi-public, and other general land uses. The designation of these areas is based on the following underlying principles:

- The costs to the County of not managing growth will be extremely high, thus, future development should locate in those areas of the County in which public services and facilities are planned and can most efficiently and economically be provided;
- Development should be located in such a manner as to minimize impacts to the County's environmental resources, including, but not limited to, wetlands, steep slopes, highly erodible and highly permeable soils, and aquifer recharge areas;
- Agricultural and forestry are the primary land uses that should be protected;
- Mixed-use developments, which integrate residential, commercial and office uses, are the preferred development pattern within the designated growth areas, as a means of reducing impacts to the road network and providing for alternative modes of transportation;
- Prime Industrial sites should be preserved and encouraged to develop in planned industrial parks, which minimize the impact on the community while increasing the County's employment and tax base; and
- Highway oriented commercial and regional shopping areas should be located in well-defined groupings to avoid strip development and should be accessible and convenient to the interstate.

This chapter sets the policies and guiding principles for the future development of the County, based upon accepted growth management and "smart growth" principles. Development trends and their land use implications for the future are analyzed. Finally, recommended changes to land use will be discussed and goals, objectives and action strategies to be pursued in implementing the land use plan.

### PREVIOUS LAND USE PLANS

The 2001 update of the Comprehensive Plan is the most recent effort to completely review and revise the Plan, recommending several changes to enhance the County's planning efforts. The Primary Growth Area concept was improved, by strengthening the connection between land use and the utility phasing plan. Areas that were not within the current phase of the five-year utility plan were designated as "Future Development" areas, thereby reducing the potential for premature or speculative development. Finally, the 2001 Plan included the first detailed area plan for Ladysmith, a process envisioned for other primary and secondary growth areas. Since the 2001 Plan, Bowling Green/Milford, Carmel Church, Dawn and Port Royal Community Plans have also been adopted by the Board of Supervisors.

## GROWTH MANAGEMENT

The concept of growth management has been around since the 1970's and is an extremely complex issue. Growth management has often been misguided and used in ways to attempt to limit or control growth. However, growth cannot be controlled or limited. Development will continue in Caroline County. How the County responds and attempts to guide or "manage" growth and the form of that growth is the issue. Growth can either be beneficial or detrimental. The County, through its development policies, can influence the quality, rate and timing of development.

Growth management brings together all aspects of comprehensive planning. Its purpose is to encourage development in an orderly manner and in a way that allows the County to efficiently and effectively provide services together with development needs. This concept involves many issues addressed elsewhere in the plan, including natural resources, public facilities, transportation, cultural and historic resources, as well as land uses.

Existing and future land use patterns will directly affect the provision of services. Transportation, schools, utilities, parks and recreation, and public safety are all affected by land use development patterns. As such, the following growth management principles should guide the County's planning and development decisions:

- Development should be accommodated in an orderly manner, which takes into consideration physical and environmental constraints, the rural character of the County, and the quality of life of residents;
- Development should be encouraged at a rate that does not stress the County's ability to pay for the cost of services generated by development. Such rate should not exceed an average of 3.5% annually;
- Public facilities should be provided in the most cost-effective manner possible, in a public-private partnership that spreads development costs to all who benefit;
- Agricultural and forest lands should be preserved and protected, as these lands contribute to the economy of the County, the rural character, and the quality of life. The preservation of agricultural lands, open space, and rural character has always been identified as an important goal of previous comprehensive plans, and the protection of rural areas is a primary consideration;
- Environmentally sensitive features and other natural resources should be protected from the adverse effects of development;
- Cultural and recreational facilities and opportunities need to be provided in conjunction with development;
- A variety of housing styles, prices and locations are needed to meet the housing demands for existing and new County residents;
- New development should promote the protection and preservation of open and/or green space within the development by retaining a minimum of 25% open/green space;
- The County should strive to maintain a 70/30 ratio of residential to nonresidential development based on assessed value of real estate;
- County policies should encourage the industrial and commercial tax base to increase at an annual rate faster than that of residential growth;
- Within designated growth areas, development proposals should incorporate a mixed-use development approach and utilize elements of new urbanism to the greatest extent possible;

- Density bonuses should be permitted for developments that exceed all growth management strategies;
- Affordable housing should be promoted at a price that is achievable based upon the latest Low- moderate income level (80% of median) in the County;
- Sustainable development measures should be encouraged in all developments;
- A Purchase of Development Rights (PDR) program, including a funding stream through the proffer policy, should be established to protect sensitive environmental lands, wildlife habitats and valuable agricultural areas;
- Significant specimen trees or stands of trees should be preserved during the development process and the clear cutting of land should be discouraged;
- A County-wide build out analysis (population) should be prepared annually to be used in evaluating new development proposals;
- When appropriate, new development should construct the infrastructure and/or facilities needed to support the project, in lieu of dedicating land;
- To the extent allowed by law, the County should manage the rate of growth in order to ensure the demands of growth do not outpace the capacity to provide the necessary services and infrastructure; and
- Rezoning applications should be evaluated to ensure that they meet adopted level of service standards for transportation, public facilities and utilities.

The area plans, discussed later in this chapter, have been prepared to address many development related issues. Area plans have been prepared for most of the growth areas, deemed appropriate for development at densities that make the delivery of public services efficient and convenient. These are also the areas where the transportation system is generally adequate and where future improvements are most economically and easily provided. Finally, these areas are the focal point of the County's economic development efforts. It is in these areas with, public facilities, transportation system, and quantities of suitable land, that the County encourages business and industry to locate, creating an expanded tax base and employment opportunities. The locations of these areas are identified on the Future Land Use Map.

## LAND USE ANALYSIS

### RESIDENTIAL USES

Since 1990, the County has approved eight major residential rezonings or subdivisions in excess of 100 lots. These developments create the potential for 11,994 (of which 11,396 are currently unbuilt) additional dwellings, as shown in Table 8.1. A substantial inventory of vacant lots is also available in other previously approved communities. A survey of 147 previously approved developments identified the potential for an additional 3,000 dwellings, with about 1,800 lots alone in Lake Caroline, Lake Land 'Or, and Caroline Pines alone. While many of these lots were previously considered un-buildable, recent changes in Virginia's sewage disposal regulations may now allow these lots to be built upon, thereby increasing the inventory of buildable lots.



**TABLE 8.1 : LOT INVENTORY BY DEVELOPMENT**

<b>Development</b>	<b>Approved Units</b>	<b>Built Lots</b>	<b>Remaining Lots</b>
Haymount	4,000	0	4,000
Ladysmith Village	2,850	178	2,672
South River	320	9	311
Brookwood	200	0	200
Pendleton	3,508	60	3,448
Belmont	306	279	27
Belmont West	159	22	135
Belmont North (I&II)	601	0	601
<b>Totals:</b>	<b>11,944</b>	<b>548</b>	<b>11,396</b>

Finally, a vast amount of land in the County is zoned Rural Preservation (RP) with a permitted density of one dwelling per 10 acres of land. Development in these areas requires only subdivision approval in accordance with the County’s Subdivision Ordinance. The housing market this decade indicates that the amount and rate of rural development is likely to increase as the market can bear rural development costs. The 2006 amendment to the Code of Virginia that requires some “cluster” development in rural areas is also likely to increase development pressure, thereby adding to the housing/lot inventory.

Chart 1.5 (in Chapter 1) provides various development scenarios through the year 2030. Population projections ranged from 27,657 in the year 2010 to 54,611 for the year 2030, depending on the methodology used. Using these projections, a range can be developed to determine the approximate number of dwelling units that will be required during that time by dividing the population by the average household size. The average household size is estimated at 2.61 people as determined by Claritas in 2007. Tables 8.2 provides a dwelling unit range for 2010, 2020, and 2030, respectively.

**TABLE 8.2: ADDITIONAL DWELLING UNITS NECESSARY**

<b>Population Estimate Year</b>	<b>Estimate</b>	<b>- 2000 Population by Census</b>	<b>= Population Increase</b>	<b>÷ Household Size</b>	<b>= Number of Additional Dwelling Units</b>
2010	27,651	22,121	5,530	2.61	2,119
	34,502	22,121	12,381	2.61	4,744
2020	34,564	22,121	12,443	2.61	4,767
	44,341	22,121	22,220	2.61	8,513
2030	43,205	22,121	21,084	2.61	8,078
	54,611	22,121	32,490	2.61	12,448

Of course, the County cannot simply limit the amount of development to that specifically needed to accommodate for future growth. Market competition would be virtually eliminated if supply equaled demand. Therefore, a sufficient amount of land is planned for development allowing market competition and addressing the variety of housing needs in terms of cost, type, and location. It is generally accepted that the supply of buildable lots should be two to three times the demand.

Given the range of potential additional dwelling units needed through 2020 and the inventory of existing or planned buildable lots, it appears that lot supply will be twice the demand through 2020, provided the population increase falls in the middle of the projections. However, if the more robust projections materialize, then supply may fall short of the desired ratio. The County should monitor lot capacity to ensure that the minimum ratio is maintained, without exceeding its growth management objectives.

Several other factors may affect lot availability. By-right subdivisions will occur during the planning period, which will provide additional inventory. At the same time, the failure of proposed projects to develop as approved may reduce the lot inventory. Additionally, other unique economic development or transportation opportunities may develop where additional housing opportunities, as a component of a mixed use development, may be necessary or desirable.

## INDUSTRIAL USES

Caroline County currently has approximately 3,390 acres of land zoned for industrial uses. Of this acreage, only about 859 acres are actively being used for commercial or industrial purposes. Most of this land was zoned industrial with the establishment of zoning in the County in 1970, due to either the existing use of the property at that time or because the owners of record requested such zoning.

There are no specific standards for calculating the amount of industrially zoned land needed. A number of factors contribute to the need for land, including the type of industry, physical characteristics, development constraints, economics, as well as specific economic development efforts of the County. A survey of several localities provided a range from 5 to 50 acres per 1,000 population.

This plan emphasizes the need to preserve prime industrial tracts of land for that purpose. Based on the 2000 Census figures and estimates by the Virginia Employment Commission for the years 2010, 2020 and 2030, the estimated industrial acreage needs are shown in Table 8.3.

Table 8.4 indicates the average requirements for industrial development using the Step-Down Methodology (1% of Region).

**TABLE 8.3: INDUSTRIAL NEEDS BASED ON VEC POPULATION PROJECTIONS**

<b>Census</b>	<b>Population</b>	<b>5 acres per 1,000 Population</b>	<b>50 acres per 1,000 Population</b>
2000	22,121	110.6	1,106.1
2010	25,200	126.0	1,260.0
2020	27,900	139.5	1,395.0
2030	31,000	155.0	1,550.0

**TABLE 8.4: INDUSTRIAL NEEDS BASED ON STEP-DOWN METHOD POPULATION PROJECTIONS**

<b>Census</b>	<b>Population</b>	<b>5 acres per 1,000 Population</b>	<b>50 acres per 1,000 Population</b>
2000	22,121	110.6	1,106.1
2010	31,800	159.0	1,590.0
2020	38,070	190.4	1,903.5
2030	44,230	221.2	2,211.5

Table 8.5 represents potential needs based upon build out of previously approved projects. It assumes all projects will build out as anticipated beyond 2010. It does not include any assumptions about additional “by right” development that may occur.

**TABLE 8.5: INDUSTRIAL NEEDS BASED ON DEVELOPMENT BUILD OUT POPULATION PROJECTIONS**

<b>Census</b>	<b>Population</b>	<b>5 acres per 1,000 Population</b>	<b>50 acres per 1,000 Population</b>
2000	22,121	110.6	1,106.1
2010	33,838	169.2	1,691.9
2020	48,998	245.0	2,449.9
2030	54,460	272.3	2,723.0

In all three scenarios, it would appear that the amount of land that is both planned for, as well as already zoned for industrial development, exceeds the amount of land needed to meet development expectations. However, this analysis alone does not take into consideration the location of the industrially zoned land, utility availability, the willingness of the owners to sell their property, and other constraints to development. In fact, one large parcel in the Carmel Church area is planned as a transit oriented mixed use development, which would remove about 900 acres of industrially zoned land from consideration.

This scenario indicates that the existing inventory should be further analyzed to determine its suitability for industrial use. Parcels that are unsuitable due to constraints such as location, wetlands, floodplains, topography, or other factors should be eliminated. Additional land should be considered for zoning within the designated growth areas to support the efforts of the Department of Economic Development or for specific industry requests.

### COMMERCIAL USES

Commercial land uses in the County can be classified in one of three categories: neighborhood, community, or highway service. Neighborhood commercial uses are scattered throughout the County and are characterized as "general store" types of uses that service either small rural areas or residential neighborhoods. Community commercial uses serve larger areas of the County and may be characterized as shopping centers. Finally, highway service commercial uses may be characterized as uses that cater to the traveling public or are highway oriented.

The primary community commercial area is the Town of Bowling Green and its immediate surroundings. This area currently has two shopping centers, plus several other commercial uses that cater to large areas of the County. Smaller community commercial areas are currently developing in Carmel Church and Ladysmith.



**Main Street in Bowling Green**

The principal highway service area is located in Carmel Church at the I-95 interchange with Rogers Clark Boulevard. Here, a substantial number of service stations, truck stops, motels, and restaurants have developed to serve the needs of travelers. A smaller highway service area is planned for the Ladysmith/I-95 interchange.

Approximately 1,272 acres of land are presently zoned commercial. Most of the commercially zoned land is located within the Growth Areas. Approved development projects, such as Haymount, Ladysmith Village and Pendleton, allow a maximum area for retail and office uses. Since the County has only one commercial zoning district, the County must utilize proffers or special exceptions to ensure compatible land uses.

As with industrial land uses, there are no specific standards or ratios of commercial to other types of development. Localities must determine for themselves what is appropriate. Based on development trends and projections, there appears to exist an adequate supply of commercially zoned property for neighborhood or community commercial uses. Regional commercial is more difficult to quantify and is more likely to be driven by a specific development proposal. The emphasis during this planning period should be to determine appropriate types of commercial development for different areas and create zoning districts to reflect the different commercial needs within the growth areas.

## FUTURE LAND USE PLAN

Based on the previous analysis of current land use conditions in the County, as well as development trends, no significant changes in the Land Use Plan appear to be warranted at this time. The plan provides a significant amount of land to meet the development needs over the next 10 - 20 years. It also appears to adequately provide for all development needs in a manner that can be sufficiently served by public facilities and utilities. Finally, the plan recognizes the need to develop in an orderly manner so as to not create a financial burden on residents by growing at a rate that is unmanageable and unaffordable.

Those who consult the Land Use Plan should keep in mind the following:

- Boundaries of areas designated for specific land uses should be considered general and approximate;
- The plan is a statement of long range goals for achieving land use changes. Current uses that are in conflict with the plan will not change immediately, but must be changed over time; and
- The Land Use Map cannot simply be utilized by itself to make development decisions, but must be consulted and used in conjunction with specific area plans, chapters of the plan, the goals, objectives policies and implementation strategies within the plan, as well as other planning documents.

The Caroline County Future Land Use Map (Map 8.1) is the graphic representation of proposed land uses in the Comprehensive Plan. The Land Use Map identifies the following general land use designations: Agricultural Preservation, Rural Preservation, Manufactured Home Parks, Planned Development, Low & Medium Residential, Area Plan boundaries, Public Lands, Fort A.P. Hill, Flood Plains, Resource Sensitive Overlay, and the Sparta Agricultural Preserve Areas. The map also identifies the boundaries of the growth areas/ community planning areas.

There are two components of the land use map; the Land Use Map itself (Map 8.1), which identifies land uses countywide (overall county land use map), and the area plans containing land use maps to identify, in more detail, the land uses for each of these areas. Area plans may also contain phasing plans, which, if viewed individually and not in the context of the growth management strategies, may encourage more development than the County can afford. Both land use components must be considered together when evaluating potential land uses and development requests.

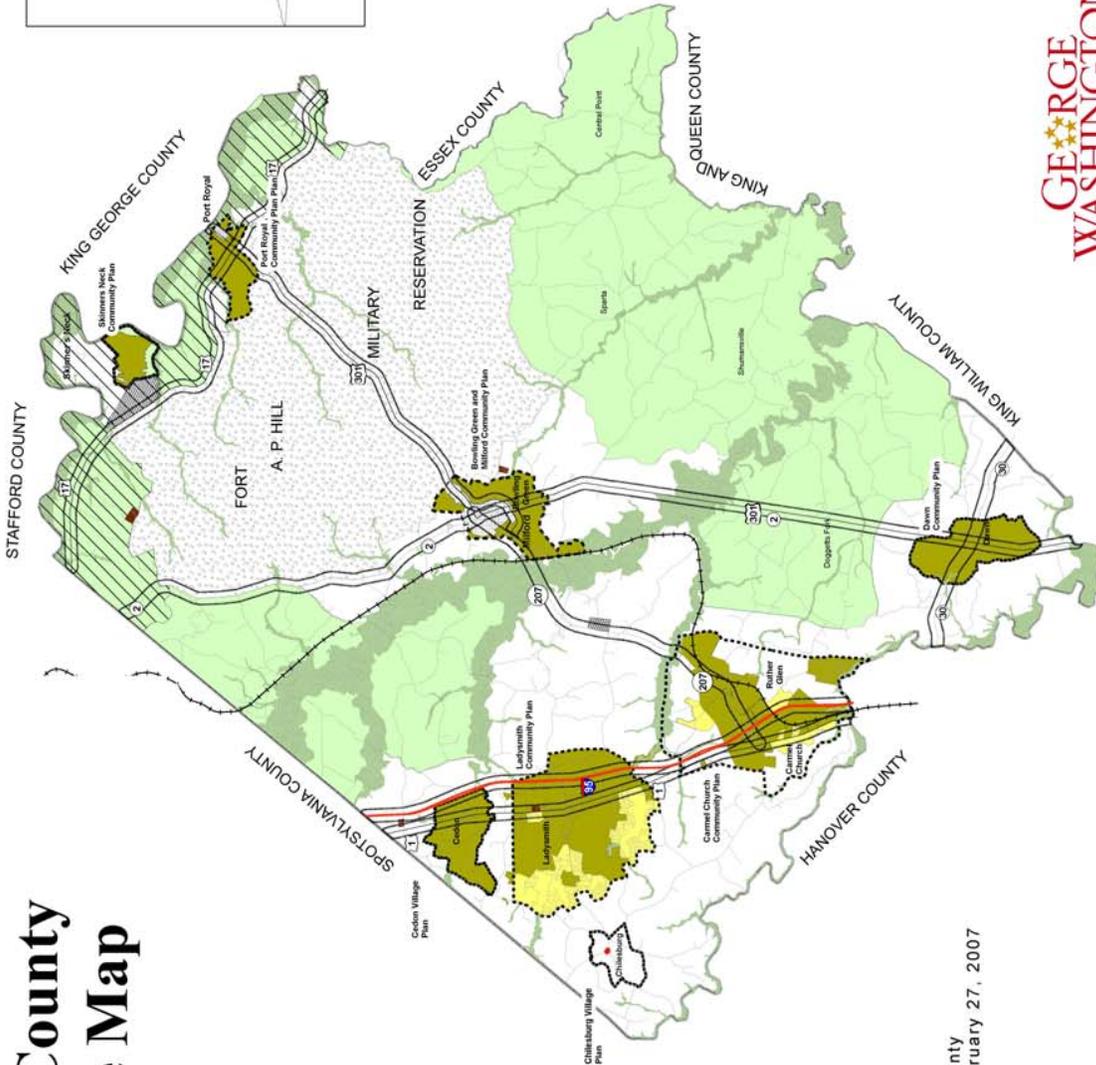
In using the Plan as a guide for development, the following should be considered for each land use designation.

### AGRICULTURAL PRESERVATION (AP)

This designation is intended to provide areas to encourage economic development and to preserve agricultural land for the viability of the County's agricultural sector. These areas are intended to encourage and promote the orderly and responsible growth of agricultural production activities, including crops, livestock, dairy, poultry and related activities that are harmonious with agricultural operations. In designating AP areas, it is recognized that certain agricultural activities and some non-agricultural activities suitable for agricultural areas may adversely affect certain existing or anticipated uses. It is further the intent of this district to provide for orderly development of uses in so as to reduce conflicts inherent with such uses. Residential densities should be very low, generally not exceeding one dwelling unit per 25 acres of land. Land use regulations should protect and give preference to agricultural/forestry uses over other uses.



# Caroline County Land Use Map

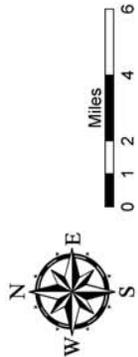


- Railroad
- HCOD Line
- Manufactured Homes
- Resource Sensitive Overlay
- Town Boundaries
- Flood Plains
- Fort A.P. Hill
- Agricultural Preservation (0.04 DUA)
- Public Lands
- County Line
- Low Density Residential (1-4 DUA)
- Planned Development
- Primary Growth Area

Note: - The "white" areas in the Carmel Church community south of 658 and west of Route 1 are designated Rural Transition Areas. specific guidance in these locations.

**GEORGE WASHINGTON**  
REGIONAL COMMISSION

Adopted by the Caroline County Board of Supervisors on February 27, 2007



Map 8-1

## RURAL PRESERVATION (RP)



Rural Preservation is the predominant land use designation and reflects the general rural character of the County. Residential densities should be low, generally not exceeding one dwelling unit per ten acres of land. A variety of rural uses should be permitted, including less intensive agricultural uses. This category should serve as buffer between areas planned for intensive agricultural uses and other land use categories. Residential development should be restricted to conservation subdivisions in areas designated as Rural Preservation.

## RESIDENTIAL AREAS

Residential areas are those areas developed exclusively for detached single-family dwellings and should be preserved for that use. As long as the preference for this dwelling type remains as strong as it is, the right to live in a single-family area should be vigorously protected. While recognizing the need to preserve single-family areas, a variety of choice in housing types should also be encouraged in Caroline County. This includes apartments, townhouses, condominiums, villas, single-family attached and detached, and manufactured homes as appropriate uses when meeting certain basic standards and when well-designed and landscaped. Apartment and manufactured home projects should meet criteria regarding access, public services, location with respect to shopping and employment, open space and affect on adjoining or nearby development.

In planning residential areas, the concept of and the development of neighborhoods through planned unit developments should be emphasized. Emphasis on proper relation to physical features, focal points, transportation facilities and place names encourage community interest, neighborhood pride and civic participation.

Residential development is identified in three basic categories; low and medium density, and manufactured home parks. Generally, these specific land use categories are located on the community plan land use maps and not generally referenced on the overall land use map of the County. These designations generally reflect existing communities and/or developments.

- **LOW** - For low-density areas, the density limits should remain relatively low and are intended for single-family development. Density limits should range between one and four dwelling units per acre. The overall County land use map shows this designation where previous residential development has occurred in various areas of the County.
- **MEDIUM** - A variety of housing styles would be encouraged in these areas depending on the physical features and existing residential character. The densities should range from four to seven dwelling units per acres. The approval of this density designation should be achieved through planned developments.
- **MANUFACTURED HOME PARKS** - Manufactured housing residential areas consist of areas planned for manufactured houses at densities of up to eight dwelling units per acre, subject to development standards.

## PLANNED DEVELOPMENT

Areas designated for planned development are located solely within designated growth areas. The County prefers this approach because it can better address the wide range of planning issues comprehensively, instead of a “piece-meal” approach that typical rezoning applications create. Planned developments offer a great deal of flexibility to accomplish a number of planning objectives. This type of development is of such a substantially different character from conventional developments that specific standards are established to govern these developments.

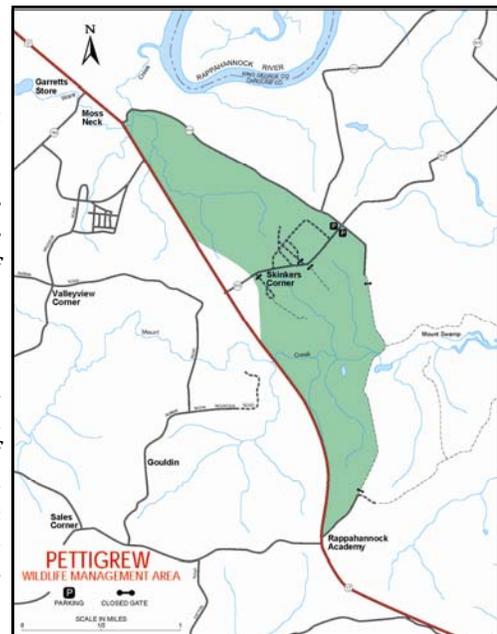


Additional flexibility is permitted in the form of exceptions, which may be authorized to the applicable planned development regulations subject to specific determinations by the Board of Supervisors.

## A.P. HILL & PUBLIC LANDS

Fort A.P. Hill is located in the northeastern quadrant of Caroline County. It occupies approximately 77,000 acres of land. It is used for year-round military training of both active and reserve troops of the Army, Navy, Marines and Air Force, as well as other government agencies. The installation has also hosted the National Jamboree of the Boy Scouts of America every four years since 1981. The final Jamboree is scheduled for 2010, after which it will be moved the property owned by the Boy Scouts of America.

The public land designation on the Comprehensive Land Map represents the Pettigrew Wildlife Management Area, which is a long and narrow property encompassing 934 acres offering a broad range of opportunities. The property appeals to an array of outdoor interests with its diversity of upland and wetland habitats and its hunting, fishing, and hiking opportunities. Most of the site is still forested with oak and beech trees dominating the hardwood stands and pine stands consisting of both Virginia and Loblolly pines.



## PRIMARY GROWTH AREA PLANS

The concept of area plans was first established in the 1994 Comprehensive Plan. Area plans provide the opportunity for a detailed analysis of a specific primary or secondary growth area, based upon active citizen input. The first area plan was adopted in 2001, the Ladysmith Area Plan. These planning areas may also be referred to as growth areas, village or community plans, as these terms are used interchangeably throughout the Comprehensive Plan.

Recent adoptions of area plans for the communities of Port Royal, Bowling Green-Milford, Carmel Church, Ladysmith and Dawn provide for a diverse mix of commercial and industrial uses, based upon the intensity of the particular use. Commercial categories found in the Area Plans are as follows: Rural Commercial, Neighborhood Commercial, General Commercial, Regional Commercial, and Office Commercial. Industrial uses are also classified according to the intensity of the use, and include Light, General and Heavy Industrial.

### *EMPLOYMENT CENTERS*

With the various commercial and industrial designations of the area plans, consideration of the employment, shopping and commercial service needs of the community is important. The following general criteria should be considered in determining the scale and intensity of such development in the community planning areas.

In general, Employment Centers in Caroline County should consist of four types:

- Office uses or planned light industrial districts, or the two combined (Community Commercial, Planned Office/Business Parks, Office-commercial and/or Planned Industrial Parks);
- General light industry, including transportation terminals, and warehousing (Light Industrial);
- General industry, controlled for protection of the environment (General Industrial); and
- High Tech/Research and Development centers.

The location of all types of centers should be near major arterial thoroughfares, which can be used for trucking. Heavier use industries will tend to be located near railroads, as well as arterial thoroughfares

### *SHOPPING AND COMMERCIAL SERVICES*

Commercial development should occur within the designated growth areas. Rural commercial enterprises, which serve the needs of the surrounding rural areas, may be allowed at strategic intersections. Strip commercial development should be avoided and advantage taken of every reasonable opportunity to stop extensions of existing commercial strips.

Commercial facilities should be planned in two basic categories:

- Retail shopping (neighborhood and community commercial).
- General commercial, highway or automotive oriented, with some mixed retail and services (general and regional commercial).

Retail shopping and services grouped in centers should be planned in three categories:

- The isolated small groups or country stores (rural commercial)
- The small neighborhood shopping center (neighborhood commercial).
- The mid-size community shopping center (community and general commercial).
- Large regional shopping centers (general & regional commercial).

For both employment center and shopping/commercial services, readers of this Plan should refer to the Community Plan Maps for guidance on the appropriate locations for such uses.

Each area plan provides specific guidance for land use designations within the community. The future land use maps of these communities reflect the areas where various uses should occur within the community. The overall land use plan for the County references the individual community plans for specific land use categories and indicates that development within each of these communities should be based on a comprehensive approach that provides the mechanism to look at the overall benefits and impacts of a particular development, as opposed to a parcel by parcel basis.

All of the area plans have been designed with the intent of incorporating “smart growth” concepts into the plans. Smart growth is a term for policies that integrate transportation and land use decisions into one plan. Smart Growth incorporates the following principles:

- *Create A Range of Housing Opportunities and Choices: Providing quality housing for people of all income levels is an integral component in any smart growth strategy.*

- Create Walkable Neighborhoods: Walkable communities are desirable places to live, work, learn, worship and play, and therefore a key component of smart growth.
- Encourage Community and Stakeholder Collaboration: Growth can create great places to live, work and play – if it responds to a community’s own sense of how and where it wants to grow.
- Foster Distinctive, Attractive Communities with a Strong Sense of Place: Smart growth encourages communities to craft a vision and set standards for development and construction, which respond to community values of architectural beauty and distinctiveness, as well as expanded choices in housing and transportation.
- Make Development Decisions Predictable, Fair and Cost Effective: For a community to be successful in implementing smart growth, it must be embraced by the private sector.
- Mix Land Uses: Smart growth supports the integration of various land uses into the community as a critical component of achieving better places to live.
- Preserve Open Space, Farmland, Natural Beauty and Critical Environmental Areas: Open space preservation supports smart growth goals by bolstering local economies, preserving critical environmental areas, improving quality of life within the community, and guiding new growth into existing communities.
- Provide a Variety of Transportation Choices: Providing people with more choices in housing, shopping, communities, and transportation is a key goal of smart growth.
- Strengthen and Direct Development Towards Existing Communities: Smart growth directs development towards existing communities already served by infrastructure, seeking to utilize the resources that existing neighborhoods offer, and conserve open space and irreplaceable natural resources on the urban fringe.
- Take Advantage of Compact Building Design: Smart growth provides a means for communities to incorporate more compact building design as an alternative to conventional, land consumptive development.

One way to manage growth and promote smart growth principles is the use of mixed use development incorporating shopping, employment and residential uses in a single unified development plan. Such developments promote the linking of residential areas to non-residential areas via sidewalks, trails and bike lanes.

One specific type of mixed use development is called Traditional Neighborhood Development (TND). This development type promotes the use of historic and “human-scale” architecture in site planning, building design and construction. Human scale relates to the height and mass location of buildings with respect to the street and to other buildings. Typically human scale architecture permits structures to be no more than two or three stories in height. Additionally, this type of development creates unique places for community gatherings, while promoting non-motorized modes of transportation.

The TND concept, when used in conjunction with a hierarchy or intensity of uses, encourages the development of distinct neighborhoods throughout a community, which are part of and fit into an overall development pattern. Figure 8.1 shows a hierarchy of districts, or transects, that can be used to regulate the physical form of development.

While not all zones are applicable to every community, the concept is the same for each area, with the more intensive zones (zones 5 or 6) as the village center and less intense zones, like zone 1, remain the rural areas that buffer the community.

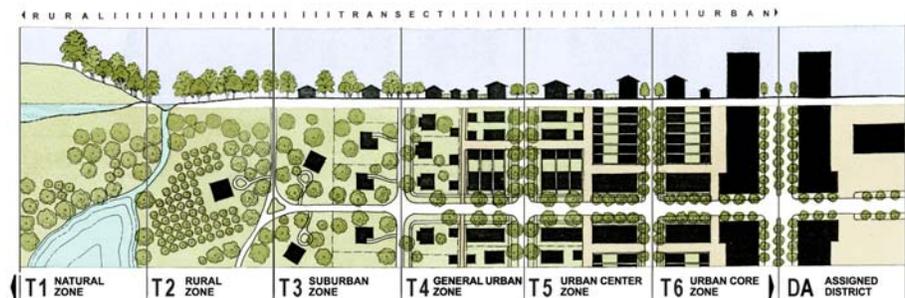


Figure 8.1

In many ways, this concept is similar to that envisioned with traditional zoning districts. However, traditional zoning does not consider the “built environment” or the relationship of a structure to its surroundings. The use of these transects, or a combination of conventional zoning with transects, may do a better job of identifying and implementing the unique vision of the community and allow each community to develop its own character.

#### *BOWLING GREEN-MILFORD COMMUNITY PLAN*

The Bowling Green/Milford Community Plan was adopted in September 2006 and is included as Appendix A of the Plan. While many plans seek to create a sense of community from the ground up, the basis for this community plan already exists with the Town of Bowling Green and the Village of Milford. The area is already beginning to experience increasing development pressure from Northern Virginia with several new or expanded residential developments in the planning stages. Development pressures will continue to change this area of the County, though not at the rate other areas, such as Carmel Church or Ladysmith, will experience.

The Bowling Green/Milford area map is shown in Map 8.2. This plan was the first to include specific references to phasing plans, both for the extension of utilities and the physical development of the area. The plan recognizes the desire and importance of Bowling Green to be the retail and employment center for the area. It also recognizes the importance of Milford being a separate and distinct community from Bowling Green and the opportunities for revitalization of its “Main Street”.



Antioch Road in Milford

By designating specific areas for future development and linking such areas to the provision of public utilities, the County can effectively manage development outside of Bowling Green and coordinate growth between this and other area plans. This allows growth to be allocated throughout the County versus directing development to only one or two areas. The Bowling Green/Milford planning process was also important for several other reasons. It established separate physical boundaries between the area and the Carmel Church and Ladysmith primary growth areas, resulting in three areas instead of one, thereby encouraging each community to create their own unique vision for the future.

#### *CARMEL CHURCH COMMUNITY PLAN*

The Carmel Church Community Plan was adopted in January 2007 (Map 8.3) and is included in its entirety as Appendix B. This creation of the plan was the result of two years of work by the Carmel Church Citizens Planning Advisory Committee (CPAC), which began its mission with three major goals:

- To help establish the boundaries of the Carmel Church Community;
- To navigate the future direction of the Carmel Church Community; and
- To provide guidance toward establishing a community identity.

Carmel Church has experienced rapid residential growth due to increasing development pressure from the metropolitan areas of northern and central Virginia, which is beginning to change the character of the area. The I-95/Route 207 interchange has become the focal point of the County's economic development efforts. Carmel Church contains all of the ingredients needed for economic growth. The area is serviced by public water and sewer, an excellent regional and national transportation system, an abundant supply of relatively inexpensive land and low taxes.

Carmel Church is primed to become the predominant economic development area for the County and the region. The community can become a major employment center that draws workers not only from Caroline, but the Richmond, Fredericksburg and Washington D.C. areas with the establishment of a commuter (Amtrak) rail station. As an economic center, the Carmel Church area will provide a positive cash flow to the County with an expanded tax base. The larger tax base will contribute the necessary resources to provide or expand public facilities such as parks, schools, transportation and other public infrastructure. The Community Plan utilizes a Transit Oriented Development (TOD) designation to support the development of the village center (Map 8.3A). The implementation of this design will help protect to the rural landscapes within the Carmel Church Community, while growing the County's tax base in the village center.

#### *LADYSMITH COMMUNITY PLAN*

Ladysmith has the distinction of being the first citizen-driven area plan. Detailed planning in Ladysmith is important for three reasons. First, this area has been the subject of most of the development pressure within the County. Secondly, the extension of public water and sewer made development conditions even more favorable. Finally, the opportunity exists to encourage the development of a "community", instead of the typical hodgepodge of subdivisions that are often seen in suburban development. The Ladysmith Community Plan is incorporated into the Comprehensive Plan in Appendix C.



**Ladysmith Library**

The Ladysmith Community (Map 8.4) has experienced significant residential development for over three decades and will continue to do so over the planning period as development pressures continue from Northern Virginia. Lake Caroline, Lake Land 'Or, and Campbell's Creek subdivisions boast significant residential populations. Since the adoption of the first area plan in 2001, two additional communities, Pendleton and Ladysmith Village, have been approved, which will add about 6,700 residential units over the next 25 years.

Change and accompanying growth are inevitable. Change can occur without intervention, be opposed vigorously, or planned and managed. The plan advocates a planned and managed approach to the future development of the Ladysmith area, which is fully supported by its residents. Two main themes emerged in the preparation of the Plan: (1) creation of the Village Concept for Ladysmith, and (2) the establishment of a community identity. The functional center of this Village is identified as the intersection of Jefferson Davis Highway (Route 1) and Ladysmith Road (Route 639) intersection.

The creation of a "village" concept in Ladysmith should be pursued based on the following objectives:

- New development should minimize the impact on the existing community;
- The plan provides detailed development standards to achieve the community goal of a traditional neighborhood development with interconnecting street patterns, integrated and balanced uses (mixed use neighborhoods), focus of buildings toward the streets, street and street fronts becoming gathering areas; and
- The plan also establishes development and design guidelines that encourage the creation of the "Village Concept", such as building standards, site design, signage, fencing and landscaping.

A vision, by itself, is not sufficient to achieve the desired results. The vision must be brought to life through: (1) the development of measurable or verifiable community/County goals that support attainment of the desired future of the community; (2) the preparation of and implementation of specific plans that support attainment of these goals; and, (3) this comprehensive plan and zoning ordinances, which are fully supportive of and facilitate the attainment of the plans and goals that support the vision of the community.

#### URBAN DEVELOPMENT AREA (UDA)

As required by Section 15.2-2223.1 of the Code of Virginia, Caroline County has designated those areas designated as Planned Mixed Use (Village Core) in the Carmel Church Community Plan (Appendix B) as an urban development area (UDA). This area is designated as the Carmel Church UDA. It is intended that the Carmel Church UDA serve as a focused growth area and meet projected and residential and commercial growth for the next 10-20 years. Development in the Carmel Church UDA is permitted at a density on the developable acreage of at least four single-family residences, six townhouses, or 12 apartments, condominium units, or cooperative units per acre, and an authorized floor area of at least 0.4 per acre for commercial development, or any proportional combination thereof. The designated Carmel Church UDA is shown in updated Future Land Use Map for Carmel Church on page 8-19.

The boundaries and size of the Carmel Church UDA shall be reexamined and, if necessary, revised every five years in conjunction with the review of this Comprehensive Plan and in accordance with the most recent available population growth estimates and projections.

Caroline County's vision for the Carmel Church UDA is one of connected, self-sustaining communities that offer a mix of residential, commercial, and employment uses. The UDA should offer a full complement of public services and facilities, as well as amenities that support a high quality of life. UDA design should complement the County's surrounding rural area, and incorporate cluster development, conservation and traditional neighborhood design criteria.

Design standards for planned mixed use developments within the Carmel Church UDA shall be required to incorporate principles of new urbanism and traditional neighborhood development (TND), including, but not limited to, the smart growth principles set forth beginning on page 8-12 of this Comprehensive Plan. Developments in the Carmel Church UDA should be compact and include criteria such as (i) pedestrian-friendly road design, (ii) interconnection of new local streets with existing local streets and roads, (iii) connectivity of road and pedestrian networks, (iv) preservation of natural areas, (v) mixed-use neighborhoods, including mixed housing types, with affordable housing to meet projected family income distributions of future residential growth, (vi) reduction of front and side yard building setbacks, and (vii) reduction of subdivision street widths and turning radii at subdivision street intersections. Traditional neighborhood design and conservation design principles should also be featured along with a full complement of services and amenities. Provision for transit facilities and/or stops should also be featured.

- Incentives to direct growth toward the Carmel Church UDA may include the following as adopted by the Board of Supervisors:
- Fast track permitting and plan review
- Reduced application fees
- Density bonuses

To the extent possible, federal, state and local transportation, housing, water and sewer facility, economic development, and other public infrastructure funding for new and expanded facilities shall be directed to the Carmel Church UDA.

#### SECONDARY GROWTH AREAS/VILLAGES

The concept of secondary growth areas was developed with the 1977 Comprehensive Plan. Secondary growth areas are generally designed around existing pockets or concentrations of residential and/or commercial development that are appropriate for small-scale or "infill" development. These areas may also be identi-

fied as villages. A citizen may not understand the “secondary growth area” term, but most likely understands the concept of a village.

#### *PORT ROYAL VILLAGE PLAN*

The Port Royal Community is characterized by the central Town of Port Royal and a number of small commercial and residential developments that border it. The Town is listed on the National Register of Historic Places, and several structures within the Town are listed on the Virginia Register of Historic Places. The majority of the commercial development lies along the U.S. Routes 17 and 301 corridors. The intersection of these two major roads lies just southwest of the Town’s municipal boundaries.



One of many historic Port Royal homes

Beyond this compact and central area lie large tracts of agricultural and forest land. This section of the County has been noted for its natural beauty, winding river, scenic overlooks and “slow-paced” lifestyle. The Town and its accompanying service area are protected by the Resource Sensitive Area Overlay designation, which will be discussed in greater detail later in this chapter. This designation is intended to preserve the features of the corridor that make Port Royal and the Rappahannock River Valley so attractive.

Recognizing both the importance and potential of the area, the Port Royal Village Plan was prepared to ensure future development that complements the Town’s historic status. Accordingly, development should be permitted only through the Planned Development provisions of the Zoning Ordinance, together with the use of design standards. Port Royal Village (Map 8.5) contains approximately 500 square acres, excluding the Town of Port Royal.

The plan relies on the Planned Development (PD) designation to promote sustainable development with integrated land uses through the use of Traditional Neighborhood Design (TND) and the use of Low Impact Development (LID) techniques. Such techniques substantially reduce the impacts of new development on the natural environment thereby helping to preserve the environmental quality of the Community.

The *Port Royal Village Plan* is included in its entirety in Appendix E of this plan. That plan, together with the provisions of the Resource Sensitive Area and growth management policies of this plan, should be referenced for specific development guidance in the Port Royal Village area.

#### *DAWN VILLAGE PLAN*

The current development pattern of Dawn is typical of a rural community with lots on individual well and septic systems and lots of varying sizes stripped along existing state roads without any defined or cohesive pattern of development. A few small businesses exist, such as a convenience store and a service station, which are sized to meet the needs of the surrounding community. Yet, many needs remain un-served, such as local banking opportunities, health care, pharmacy and even opportunities for employment. Residents have to

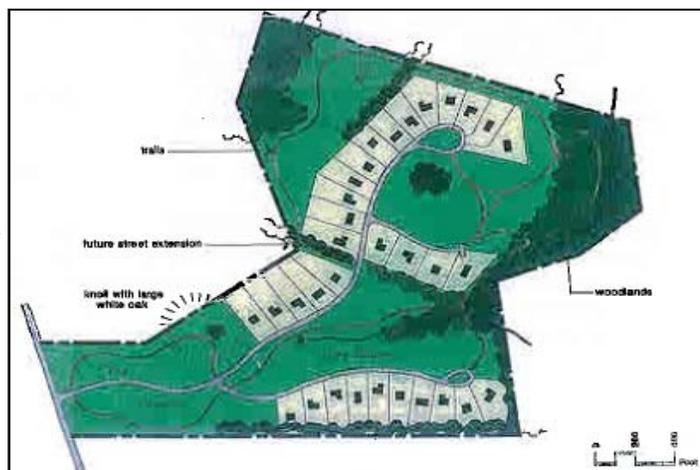


Figure 8.2: Conservation Development

travel to other communities, such as Ashland or Bowling Green, for basic services that residents of those communities take for granted.

All of this will change if the vision of survey respondents is achieved. Dawn will be transformed to a village of up to 15,000 residents, with retail and employment opportunities appropriate for a well-designed community of that size. Opportunities that up to now have by-passed Dawn will be available to its residents. The Dawn Village Plan (Map 8.6) reflects a significant change from previous plans, and results in a new direction for the community. The new availability of public sewer opens up significant opportunities for Dawn in the future.

Due to the unique features of the contributing area to the community, several land use designations were developed that are unique to the area. The Agricultural Conservation Overlay designation allows properties that are otherwise zoned Rural Preservation, to conserve open space in perpetuity, by concentrating the residential development on lots as small as one acre and retaining at least 75% of the property in conservation open space. Residential development that uses the overlay zoning will be subject to development standards to ensure that such development is consistent with and contributes to the Village of Dawn. An example of a development utilizing conservation development standards is shown in Figure 8.2.

The Village Preservation District designation applies to areas on the village fringe, where lots have already been previously subdivided and developed, but are experiencing water and sewer problems with a corresponding public health and safety threat. These areas may be served by public utilities without encouraging significant density increases. The overall density shall not exceed 1 dwelling for every five (5) acres of land, with a maximum lot size of 2 acres. Any development under this designation must retain at least 50% of the property in open space. Development under this designation is subject to the development standards for the Agricultural Conservation Overlay district and must complement the village.

Specific guidance for Dawn can be found in appendix D.

#### OTHER GROWTH AREAS

##### *SKINKER'S NECK (HAYMOUNT)*

Skinker's Neck (Map 8.7) was designated as a Secondary Growth Area in 1994 after the approval of Haymount by the Board of Supervisors in 1992. Future expansion is not planned at this time and a separate area planning process is not proposed due to the detailed level of planning for Haymount. Any expansion of the growth area should be considered only upon the development of at least seventy-five percent of the area and in accordance with the policies specified in the Resource Sensitive Area. In no case should future development extend beyond the boundaries of Ware Creek Road (Route 614) and Ware Creek. An area planning process should be undertaken prior to any proposed expansion.

##### *RURAL HAMLETS*

There are several areas within the County in which there are established low intensity commercial uses. These locations often have a few shops and/or homes on smaller tracts of land and are usually situated at strategic points or cross roads in the County. These areas are intended to be recognized as Rural Hamlets. A Rural Hamlet designation is an extremely small area intended to provide low intensity commercial services to the local community. Low intensity rural commercial uses may include a country store, personal services, antique stores and farm services would be appropriately located in a hamlet. The areas designated as Rural Hamlets are as follows; Blanton's Corner, Central Point, Corbin, Golansville, Guinea, Penola, Rappahannock Academy, Shumansville, Sparta, Woodford and Villeboro.





Caroline County - Carmel Church - Proposed Land Use  
 July 14, 2008



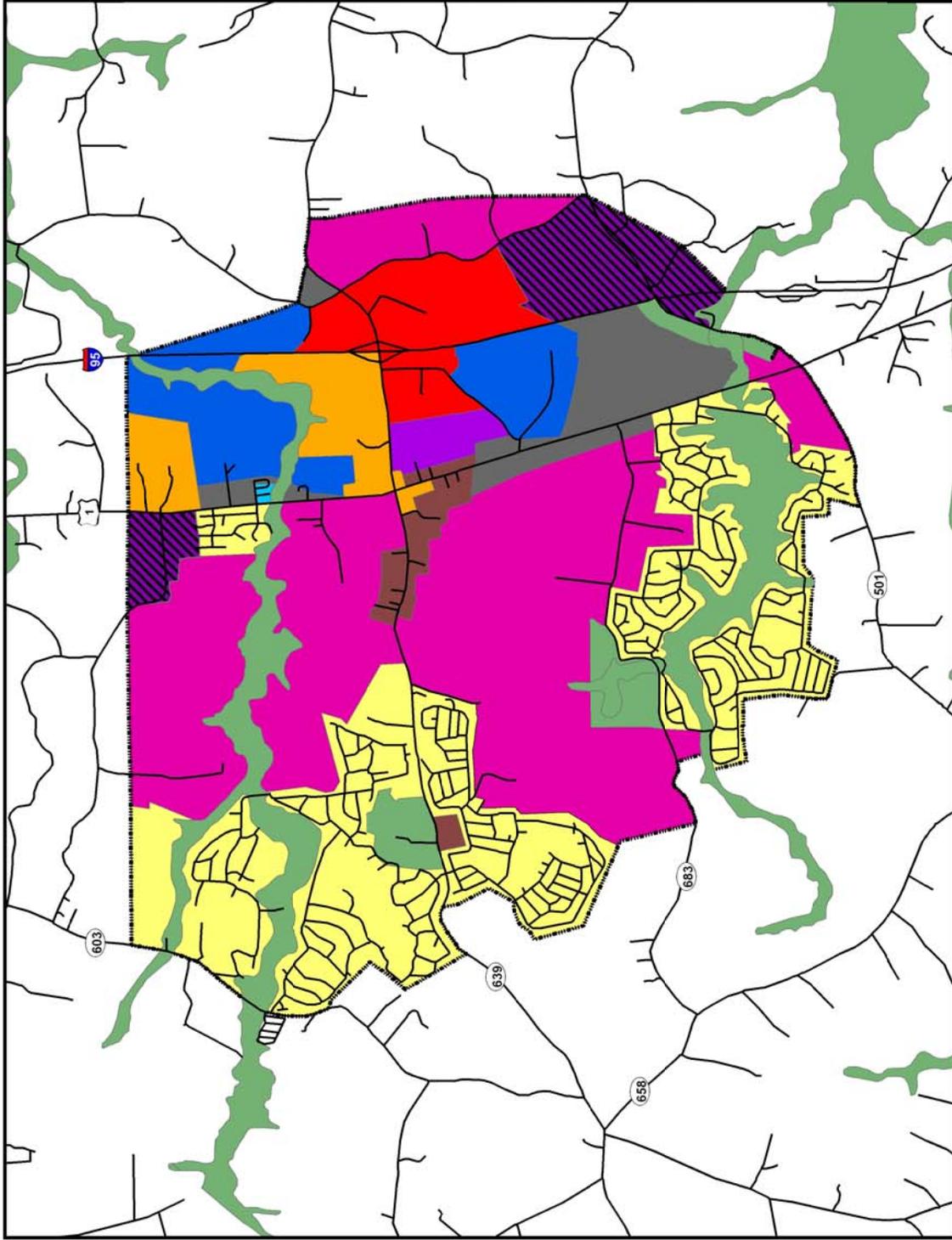
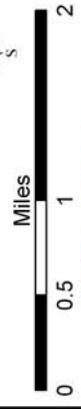
Plan Enlargement of Amtrak Station and 1/4 Mile Distance

Map 8.3A: Transportation Oriented Development in Carmel Church

**LADYSMITH COMMUNITY PLAN  
Future Land Use Map**

**LEGEND**

-  Primary Growth Area Boundary
-  Neighborhood Business
-  Community Business
-  General Business
-  Regional Business
-  Light Industrial
-  Mobile Home Park
-  Office Business
-  Open Space/Flood Plain
-  Planned Mixed Use Development
-  Planned Residential Development
-  Residential Low Density



Map 8-4

**PORT ROYAL COMMUNITY PLAN**  
**Future Land Use Map**

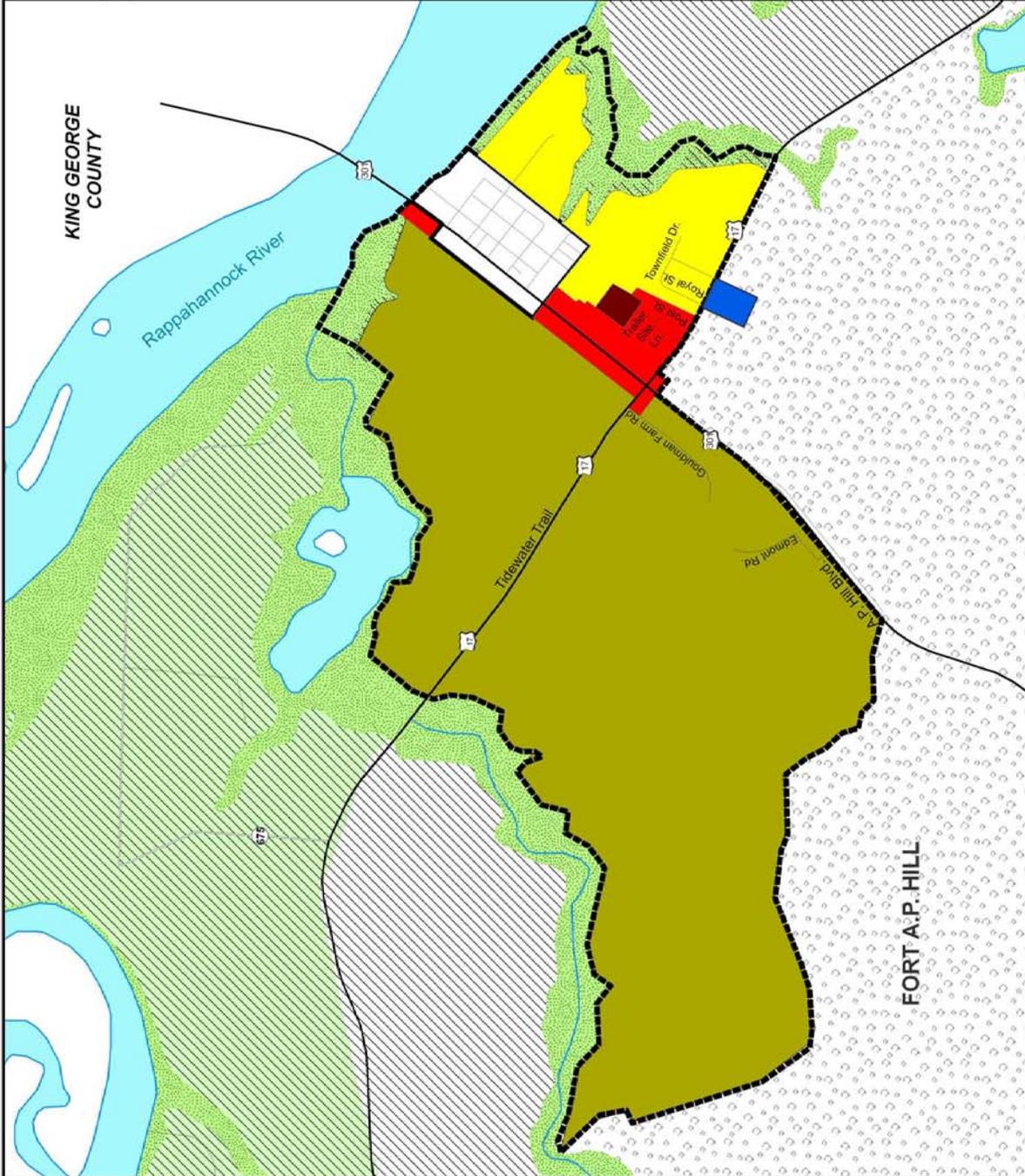
**LEGEND**

-  Secondary Growth Area Boundary
-  Town of Port Royal
-  Planned Development
-  Low/Medium Density Residential
-  Planned Commercial
-  Manufactured Home park
-  Agricultural Preservation
-  Resource Sensitive Overlay
-  Fort A.P. Hill
-  Flood Plains
-  Public Government

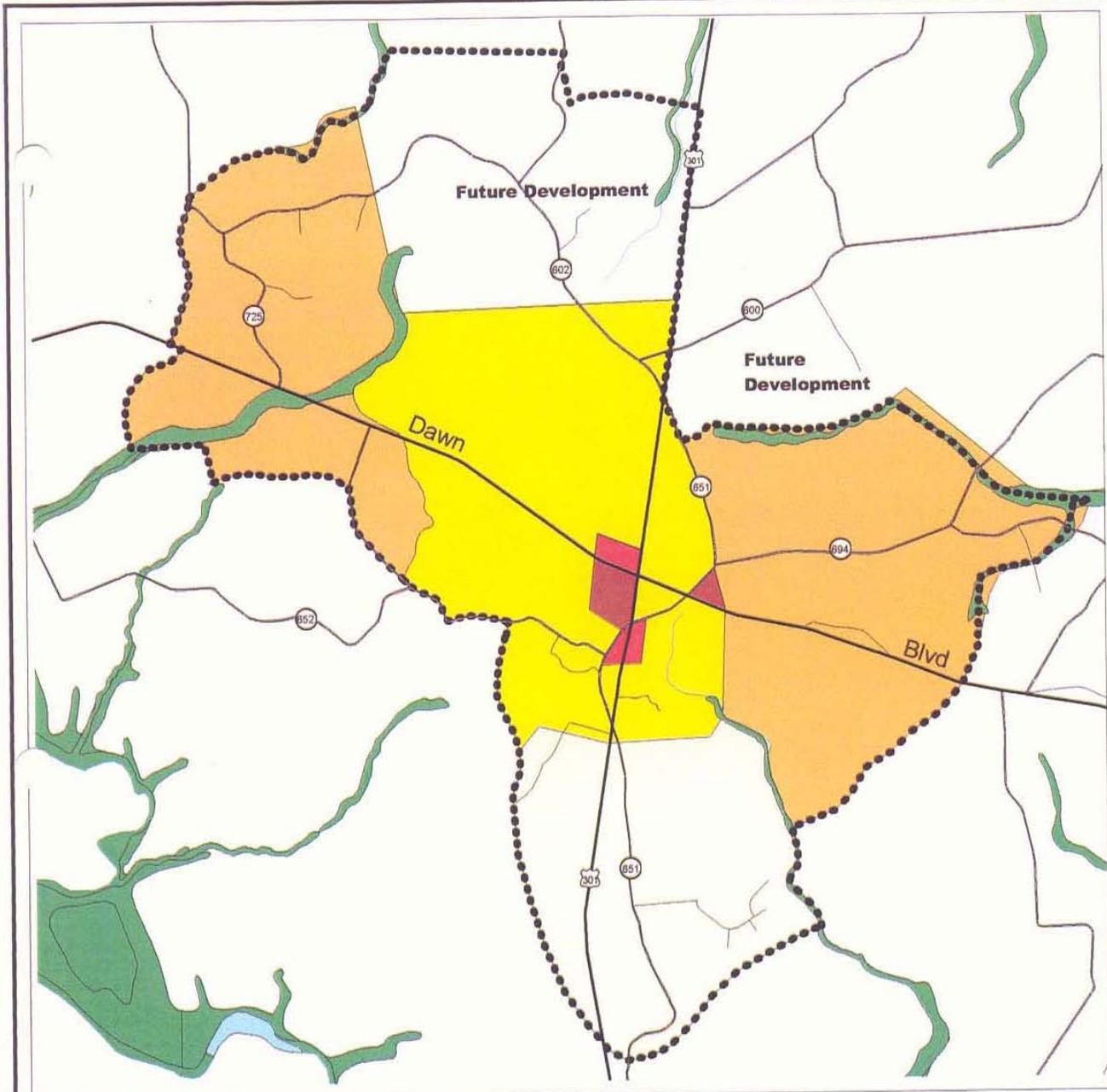


**G\*W\*R\*C**

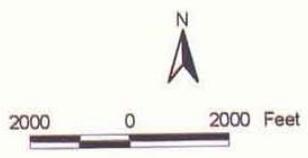
GEORGE WASHINGTON REGIONAL COMMISSION



Map 8-5



Dawn Secondary Growth Area



- Low Density Residential (1-4 dwellings/acre)
- Rural Residential 2
- Rural Residential 5
- Community Commercial
- Highway Commercial
- Open Space
- Secondary Growth Area Boundary

Map 8-6

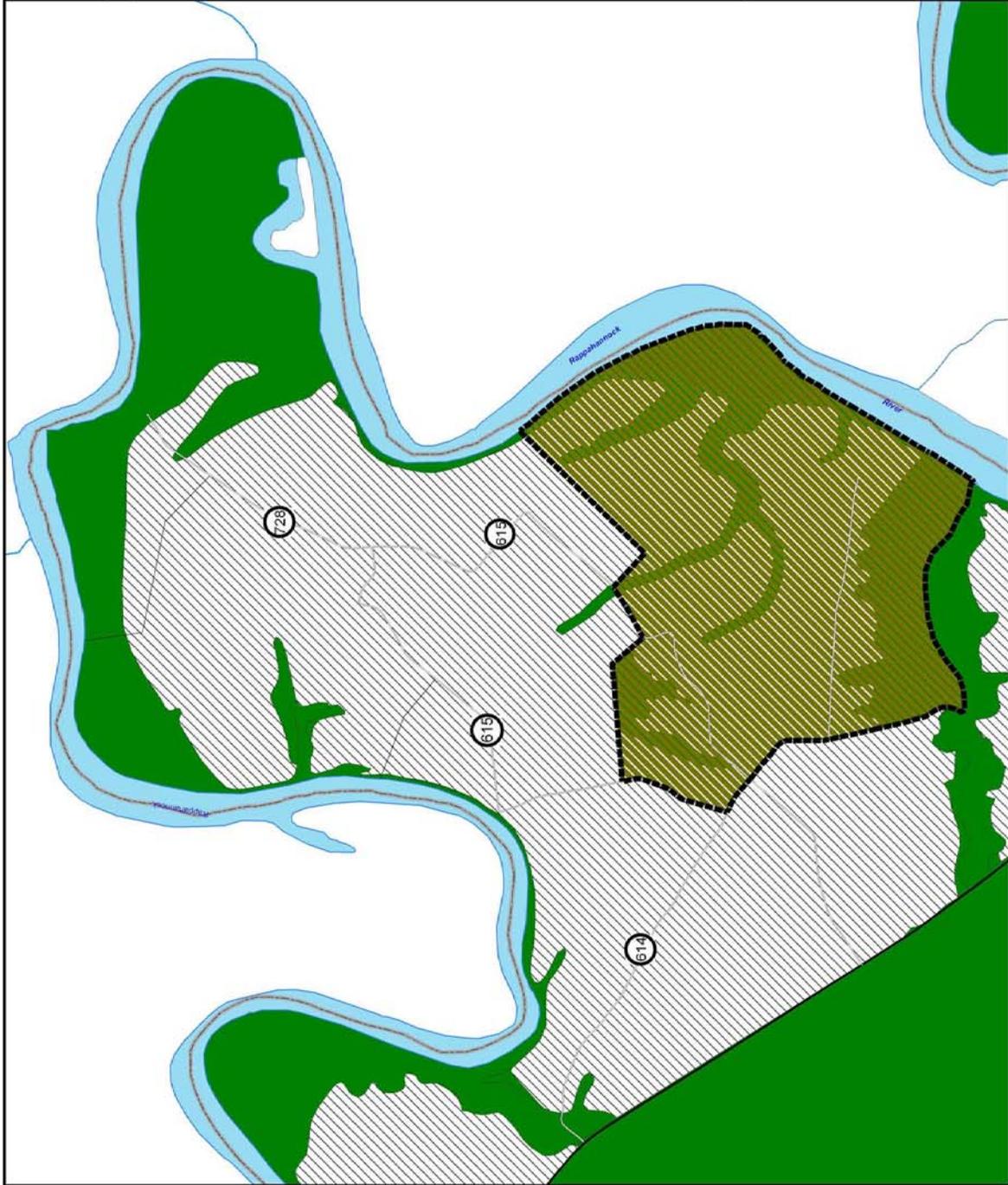
**SKINKERS NECK COMMUNITY PLAN  
Future Land Use Map**

**LEGEND**

-  Planned Development
-  Open Space/Undevelopable
-  Secondary Growth Area Boundary
-  Resource Sensitive Overlay



**G\*W\*R\*C**  
GEORGE WASHINGTON REGIONAL COMMISSION



Map 8-7

## THE RURAL SETTING

Much of our growth management efforts have focused on the community planning areas where the County attempts to guide growth, thereby reducing some of the development pressure on the rural areas. That does not mean that rural areas are being ignored in the process. Rural area planning policies have also received attention in the County's efforts to conserve these areas.

Caroline County contains 540 square miles, more than 80 percent of which is designated rural (Agricultural Preservation or Rural Preservation). Within this area, agricultural and forestry resources are the most important resources and the desired primary use. Such uses play an important and long-standing role in the environment, development and economy of the County. The loss of these resources to development is irreversible. Yet, proper management of these resources provides many conservation benefits, including the protection of water quality; natural, scenic, and historic resources. Residential development should be considered to be a secondary use in these rural areas.

The County offers several tools to help preserve rural lands. The use-value taxation program reduces tax rates for qualifying lands in agricultural, forestry, horticultural and open space uses. Over 141,000 acres benefit from this program, which has hefty penalties if the property is taken out of land use and developed. A partnership between Fort A.P. Hill and conservation agencies to acquire conservation easements that limit uses and development on qualifying properties benefits both A.P. Hill and the County. The program makes it easier for owners to keep their land, which benefits the community through long-term protection of agricultural, forest, and open space lands and buffering of the military installation. Finally, the Resource Sensitive Overlay District and the Sparta Agricultural Preserve District require minimum lot sizes of twenty-five (25) acres, consistent with minimum agricultural needs of the underlying Agricultural Preservation designations of the Comprehensive Plan.

### RURAL LAND USES

Caroline County has historically recognized the importance of protecting rural lands through its land use, resource protection, and growth management policies in the Comprehensive Plan. This plan recognizes agricultural and forestry uses as the preferred land use in rural areas. The conversion of land for residential development is the greatest threat to those areas. The pressure on agricultural lands requires a proactive approach to rural preservation.

Other land uses should be evaluated against their support of and impact on the desired agricultural and forestry uses, so that the preservation of rural lands is assured. The scale and intensity of land uses should be carefully evaluated, and performance standards used to ensure that they are appropriate to the rural landscape. Uses that cannot be sufficiently mitigated or conflict with planning objectives should be discouraged.

### AGRICULTURAL USES

Agricultural lands are an important resource base for agricultural industries and the contributions they make financially and to the rural character. Preserving our agricultural resources also provides opportunities to conserve and efficiently use other resources such as: water, natural, scenic, historic, and environmentally sensitive features. Limiting development and reducing the need to provide community services, such as fire & rescue, police, schools, etc, to large rural areas benefits the County financially by allowing the County to direct services in the most efficient manner. In the interest of this growth management strategy, residential development is considered a secondary use in the Rural Areas.

Conflicts often arise between residential and agricultural uses. Smaller parcels, increased development, and the proximity of residential uses to agricultural uses often worsen these conflicts. The County should advise new residents of the obvious conflicts of traveling and living in the proximity of our agricultural industries, such as noise, odors, slow moving farm equipment on roadways, and chemical spraying, bio-solids application.

The County should support agricultural land uses and create additional markets for agricultural products through creative economic and land use strategies. Prime agricultural soils and working farms should be protected from non-agricultural development through Conservation Developments, conservation easements, and the Land Use Taxation program. Appropriately scaled low-impact uses that provide supplemental economic benefit to farmers should be allowed on working farms. Finally, the integration of conservation land uses with agricultural and forestry uses should be encouraged, especially if the conservation use connects with other conservation lands or provides a buffer between potential conflicting uses.

### FORESTRY USES

A detailed discussion of forest lands is contained in the Natural Resources Chapter. Forest resources provide a basis for its forestry industry, economically benefitting the County, as well as providing scenic and natural resources benefit. The subdivision of forest lands is the greatest threat to the future vitality of the forestry industry in the County. Smaller tracts are difficult to manage economically and the proximity of houses further escalates the problem.

As the amount of forested land decreases, and the remaining land is further fragmented, both the sustainability and ecological benefits of the forested land is reduced. The County should continue to support the forestry industry, recognizing its contribution to the economy and protection of the environment. Prime forest soils should be protected from development through a combination of Conservation Developments, conservation easements, and the Land Use Taxation program.

### LAND PRESERVATION

The importance of land conservation easements in our efforts to preserve the rural character cannot be over emphasized. The benefits of land conservation include the permanent preservation of large areas of land for rural uses, including agricultural and forestry production, recreation, water supply protection, and the conservation of natural, scenic and historic resources.

The economic benefits of preservation are also important. Conservation easements bring potential property owner benefits such as federal and state gift and estate tax benefits. Eased land over time acquires a value as a protected estate, independent of what residential development it holds. Land under easement also enhances the value of near-by property. Tourism, a growing component of the County's economic development program, has been strongly linked to a preservation of the rural landscape in other communities.

### ADAPTIVE REUSE

Several existing rural communities were, at one time, thriving commercial and social centers of their surrounding areas. Many of these areas still provide limited services and the County desires to maintain their viability. These centers provide rural services that would otherwise be obtained by traveling greater distances. These rural communities are also an important part of the County's history. Vacant buildings located in these communities often have local historical significance and could be renovated to provide a valuable service to the local area.

The County should be proactive in allowing the reuse of older commercial buildings. The adaptive reuse of historic structures should be permitted to encourage maintenance and preservation. Implement policies in the Zoning Ordinance should be reviewed and amended as necessary to promote rural characteristics, not an urban style of development, by relaxing the required parking standards and requirements for parking lot surfaces, entrance and landscape requirements.

### ALTERNATIVE USES

Rural landowners face increasing financial pressure to subdivide their land. Some landowners could offset such pressure if alternative land use opportunities were available, providing an additional revenue source. These secondary activities would be intended to provide support for primary uses (agriculture, forestry, etc.) or improve the viability of rural communities.

The County benefits both from less subdivision of land as well as the resulting protection of potential agricultural and forest resources. Alternative uses such as home occupations, commercial recreation, and special events facilities may be appropriate. Facilities that provide patient services, such as nursing home and active adult facilities could benefit from a rural setting without creating the need for extended utility services or other support facilities. Any such use should be limited in scale and intensity so as not to diminish the rural character or encourage suburban development patterns or densities.

### CONSERVATION DEVELOPMENT

Despite the need for preserving our rural areas, existing regulations often do not achieve the desired results, and in some cases actually promote the subdivision of land. While the most effective methods of protecting rural land are those that ensure long term or permanent prevention of development, regulations that control the form and arrangement of residential development can mitigate impacts on an individual site and its surroundings. However, this approach does not alter the overall impact of residential growth in the Rural Areas and should be considered secondary to true conservation efforts.

Since a certain level of residential development is permitted in the rural areas, the location, character, and extent of such development must be addressed in order to minimize its impacts. Conservation Development (commonly referred to as Cluster Development), has real potential to reduce the impacts of residential development in rural areas. Conservation Development is the preferred method for residential development and should be required for all rural area subdivisions. The only exceptions to this policy should be for situations where properties are too small for clustering to make a significant difference (where preservation tracts would be too small for effective conservation), or in the Resource Sensitive Area or Sparta Agricultural Preserve Area. Even in these areas, conservation development should be an option available to the owner.

Conservation Development is an alternative to conventional ten to twenty-five acre lot subdivisions. This option encourages more effective land usage. As a tool to address development patterns, Conservation Development places the same density of residential development permitted under conventional subdivision regulations on smaller parcels. In exchange for smaller lots, a large parcel that permanently protects agricultural and forest lands, natural resources, and may create scenic viewsheds.

Benefits to the landowner include: lower development costs; smaller, more marketable lots; receiving the full economic benefit of development, while retaining a substantial portion of the land for agricultural or forestry uses; preservation of important aesthetic features of the land, thus enhancing both the desirability and the marketability of lots; and the protection of environmentally sensitive features.

The Code of Virginia requires localities to allow clustering of single-family dwellings by-right in areas designated as agriculture, subject to other standards. The law further provides that, in establishing standards, conditions, and criteria for clustering, the Board of Supervisors may include any provisions it determines appropriate to ensure quality development, preservation of open space, and compliance with its Comprehensive Plan and land use ordinances.

When considering standards for Conservation Developments, it is important to ensure that the standards achieve the preservation objectives for the rural areas. The development standards should ensure the protection of the natural environment, scenic and historic resources, agricultural and forest lands, and open space. The following design standards should be considered in designating areas and properties for Conservation Developments:

- Residential development will occur as Conservation Subdivisions at a base density of one dwelling unit for every ten acres of land. Additional standards which reflect the character of the specific sub-areas may also be prepared.
- A minimum of 80 percent of the site shall be retained as open space and a two (2) acre lot size for residential lots within the conservation development.

- The minimum parcel size eligible for conservation subdivision shall be fifty (50) acres, with a minimum of 5 single-family detached residential units. The design of the conservation development will draw from traditional rural development patterns.
- Conservation Development will be developed in accordance with specific design criteria that creates open space buffers (active and/or passive recreation) surrounding the development, and minimizes the visual impact on the area.
- In evaluating the design of the conservation development, the County may consider the siting of houses and not just the siting of lots.
- The required open space in a conservation development will be evaluated for the continuity of the open space to other designated open space, unique site features, and the mitigation of visual impacts and environmentally sensitive areas.
- Where the Conservation Development is situated next to a community planning area, the residential lots will be located abutting the planning area boundaries to create a defined edge between the planning area and the rural areas.
- A Conservation Development Overlay District should be created which addresses these standards, and any other issues related to the preservation of rural lands.

## OTHER RURAL AREAS ISSUES

### *PHASED SUBDIVISION DEVELOPMENT*

The present Zoning Ordinance requires all parcels of land in the Rural Preservation Zoning District that are newly created to be at least ten (10) acres in size. Under the current Ordinance, it is possible to develop all of the potential lots from the parent parcel at one time to create a rural residential development.

This approach encourages rural low density rural development. Under current regulations, rural subdivisions can be created as easily as subdivisions within the designated growth areas. Often times, the process is faster, due to the lack of required utility infrastructure, as is required in the growth areas.

A phasing requirement limiting the number of lots that can be created in a given period of time may help address this problem. A similar practice is used by the Board of Supervisors to address timing concerns of large developments in the growth areas. Such a program would permit landowners to use their development potential to meet occasional financial needs, but would not readily permit the creation of entire subdivisions or encourage land speculation for that purpose. Since the total development potential is not reduced by such a program, it will not be effective unless the required time period is long enough to discourage piecemeal approvals that effectively create the same development pattern that is now occurring.

### *FAMILY DIVISIONS*

In order to support the ability of families to transfer land to immediate relatives, the County permits "family divisions." These divisions are subject to less stringent standards (such as no VDOT road requirement and a smaller minimum lot). To discourage the resale of these lots to non-family members, the owner of the new parcel is required to hold it for a minimum of five years. However, during the height of development activity during this decade, the family subdivision process was used in a manner to subdivide rural lands

Increasing the time period of ownership for both the grantor and the grantee would further reduce the resale of family division lots without inconveniencing family members who intend to remain on the land. Consideration should be given to amending the zoning ordinance to increase the ownership periods as allowed by the Code of Virginia to discourage the purchase, division and resale of rural parcels.

## RESOURCE SENSITIVE AREAS

The land bounded by the Rappahannock River, Portobago Creek, the Fort A.P. Hill Boundary, Rappahannock River/Mattaponi River watershed boundary, and Spotsylvania County (collectively the “Corridor”) is an unusual, if not unique, area for a number of reasons. The area is the location of significant wetlands, which function as the habitat for numerous species, including game and threatened or endangered species. Eagles nest along portions of the Corridor. The area is a watershed for the Rappahannock River and a significant tributary of the Chesapeake Bay. The Rappahannock River is an unusually scenic river that is used for recreational purposes, as well as water supply. The corridor contains some of the best agricultural soils in Virginia, designated as the “State Soils”.



The area has attracted people for centuries, resulting in rich archeological resources ranging from prehistoric to colonial artifacts and sites. Because so much of the area has remained in private hands through the years, these resources have remained largely untapped.

The Corridor area is separated from the balance of the County by Fort A.P. Hill. With the planned location of a commuter station near Fredericksburg, development pressure will increase within the Corridor. Conventional unrestricted large lot subdivisions within the Corridor will not achieve the results desired by the County.

Large lot developments still require the provision of County services within the Corridor area. Fire and police protection must be provided. Schools must be provided, and school buses still must travel to the most remote ends of the County. Additionally, unrestricted large lot development often leaves control of significant archeological features in private hands, as well as leaving significant environmental features often unavailable to the public. Such development has the potential for increased runoff into the river and the unregulated destruction of both the scenic features of the river and significant habitat features, such as eagle roosting trees.

Unrestricted large lot development within the Corridor will also likely preclude the achievement of other goals deemed significant by the County. Farms may not be protected or preserved, but simply divided into large housing tracts. However, outside of the designated growth areas, where the protection of resources cannot be achieved through conservation easements or dedicated open space, the minimum lot size should be appropriate for sustaining agricultural operations in the corridor. The minimum lot size outside of the growth areas should be twenty five acres, or such greater acreage as necessary to provide the desired resource protection.

Finally, because development pressure generated by the proximity of the commuter rail and other jurisdictions, detailed planning for this area is warranted. Consequently, the Corridor is designated a “Resource Sensitive Area” (shown on Map 8.1) in which the following additional objectives are to be pursued:

### *OBJECTIVES*

**POLICY 1** - Encourage the identification, protection and preservation of important resources. Require any development within a Resource Sensitive Area to document its likely impact in the following areas and to mitigate such impacts through necessary on-site and off-site measures:

- Archeological resources;
- Wetland resources;

- River frontage and access;
- Drainage and water quality;
- County infrastructure and resulting fiscal impact;
- Botanical and Wildlife habitats with special attention to threatened or endangered species;
- Existing Agricultural operations and prime agricultural soils;
- Existing silviculture operations and prime forest soils; and
- Scenic resources.

Within the designated growth areas, the County strives for a design concept that utilizes carefully planned communities to attract residential density into towns, significantly reducing the resource impact of such development and protecting resources outside of the growth areas. Thus, future development, including infill development will be a logical expansion of areas already identified for development, in terms of location, design and timing. Designs, which result in substantial “greenbelts” are particularly encouraged.

**POLICY 2** - Encourage the use of innovative designs and planning within the Port Royal Village and Skinker’s Neck areas to achieve the goals that are especially important within the Corridor. The planned development designations of the Zoning Ordinance are the appropriate zoning designations, which cluster units and permanently preserve large areas of open space. Developments should be designed to achieve the following:

- Develop according to a design derived from natural forms, while striving to preserve existing terrain, vegetation and other natural features;
- Develop a mixture of private and public uses that are organized in such a way as to be compatible with each other and with the surrounding areas;
- Develop creatively, producing an efficient network of streets, walkways, utilities, and open areas;
- Develop a broad range of housing types and styles;
- Develop communities in which the social and community interaction is encouraged through a balanced mixture of compatible uses and the provision of public or quasi-public facilities intended to foster social interaction;
- Develop according to high standards of land planning and site design in order to create distinctive visual character and identity for integrated development;
- Develop in a manner that facilitates a reduced reliance on the private automobile as a means of transportation and reduce the effect of development on the transportation network;
- Develop so that necessary public facilities will be available contemporaneously with occupancy of new development by its citizens; and
- Encourage the preservation of agricultural/forestral lands by preserving open space and reducing the potential for interface problems between agricultural/forestral and nonagricultural/forestral uses.

In general, the County desires to stimulate a flexible approach to land development within the growth areas that encourages the comprehensive design and integration of residential, commercial, cultural and recreational uses in a manner that will achieve the greatest harmony with the existing ecological balance in the area.

**POLICY 3** - All development within a Resource Sensitive Area must limit the number and extent of access points to the Rappahannock River (or any other significant adjacent waterbody) and specifically plan where public access to that water body may be appropriate. Development fronting upon the river should be required to reduce its visual impact on the river so that, in any event, the minimum necessary river frontage is developed.

**POLICY 4** - Recognizing the studies required for development within the Resource Sensitive Area and the reservation of substantial open spaces and the limitations on development necessary to adequately protect the resource area are sometimes expensive, the County should, in cases where it is appropriate to do so, permit developments meeting the objectives set forth herein. If such development is permitted, it should only be done when such development, independent of other County revenues, can provide the infrastructure neces-

sary for support of such density, including but not limited to, adequate water and sewer facilities, public roads, and sites for schools and other municipal facilities.

**POLICY 5** - Because of the importance of achieving the other policies set forth for the Resource Sensitive Area, developers should be encouraged to proffer resource related mitigation measures and to commit in detail to the parameters of any proposed development.

**POLICY 6** - Encourage the “scenic” designation of Tidewater Trail (Route 17) in order to preserve its natural charm, beauty and historic character. The County recognizes, however, that Route 17 is a primary transportation link to Tidewater, Virginia. As such, this road must continue to be used by all types of vehicles, including trucks and other commercial vehicles.

**POLICY 7** - Encourage the development of a tourism program utilizing the agricultural, cultural, historic, and scenic attributes of the corridor. As an example, farm wineries could be developed in conjunction with historically significant properties, allowing such sites to be available to the public while providing additional economic opportunities to property owners in the area. Such investments are possible knowing the integrity of the corridor is protected through the overlay district.

The policies set forth in this section are applicable to all residential, commercial and industrial developments. These policies shall not apply to, limit or otherwise interfere with, any agriculture, silviculture, or horticulture operations or uses, permitted by right or by special exception within the district.

#### SPARTA AGRICULTURAL PRESERVE AREA

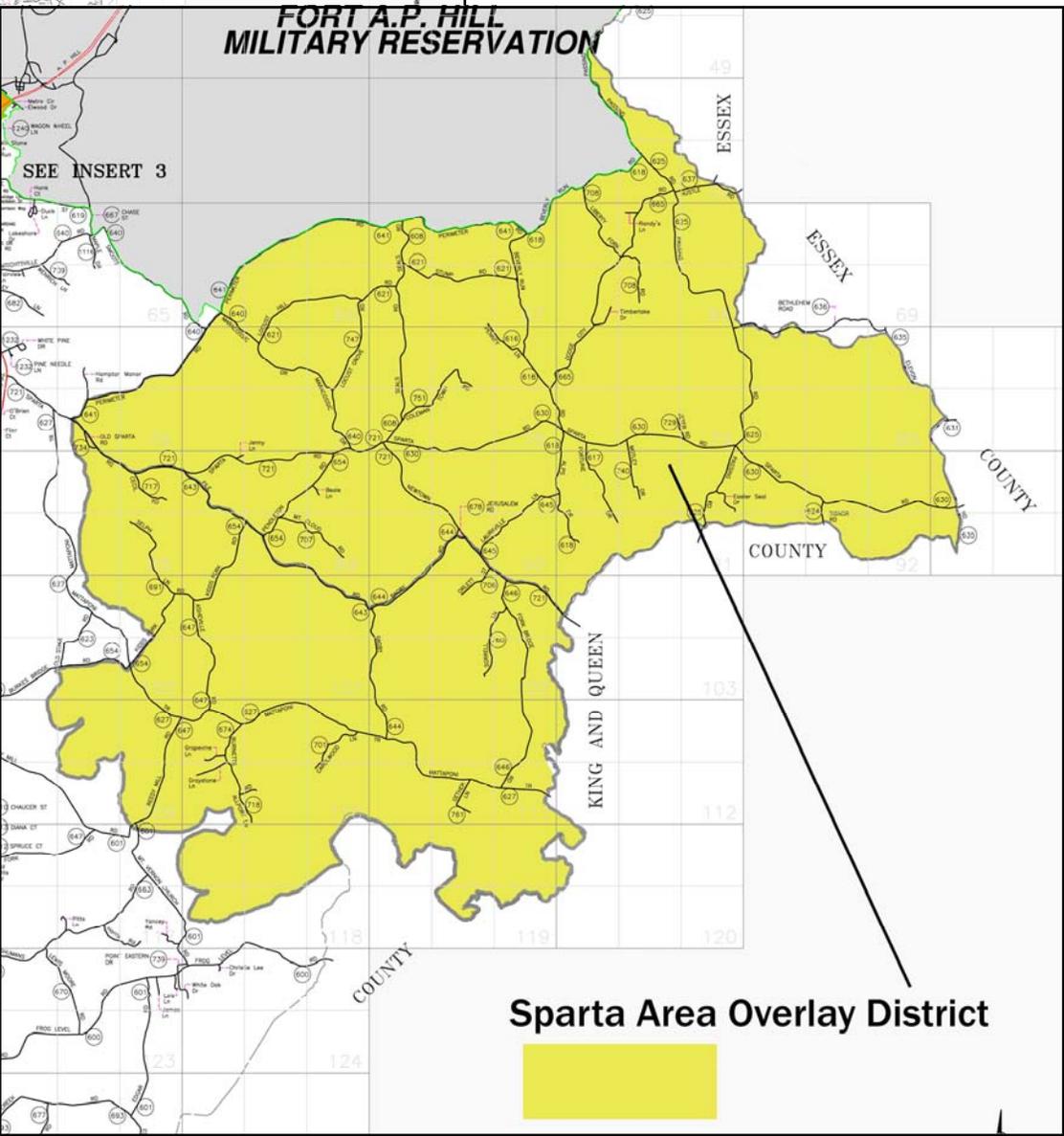
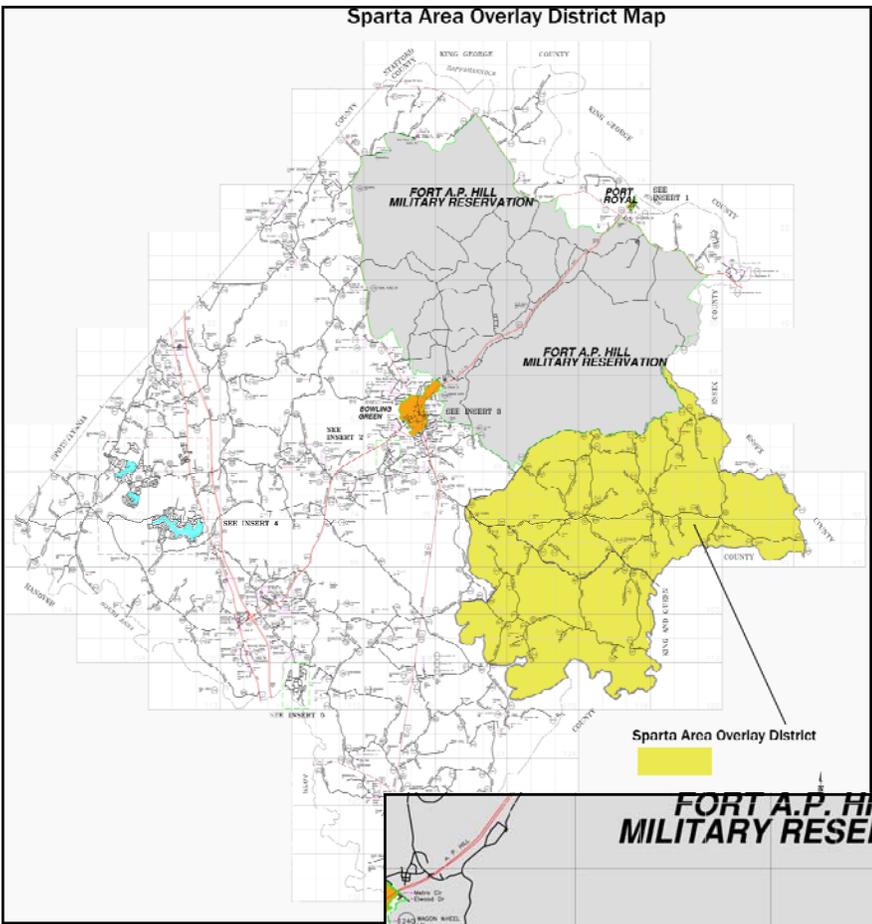
The area of land generally bounded by Fort A.P. Hill, King and Queen County, the Mattaponi River, and Route 301 (Richmond Turnpike) is home to the largest collection of active farms in Caroline County. This area is removed from growth areas in the central and western part of the County and is adjacent to the southernmost boundary of Fort A.P. Hill. Because of the planned location of a commuter station near Fredericksburg, there will be an increase in the pressure for development within the Corridor. Conventional unrestricted large lot subdivisions within the Corridor will not achieve the results desired by the County for this area.



Farmland near Sparta

The Sparta area faces many of the same issues and concerns as the Resource Sensitive Overlay District when it comes to develop pressures, County services, roads and current agricultural uses. Significant residential development is likely to harm efforts to achieve the preservation goals deemed significant by the County and landowners in the area. Farms may not be protected or preserved, but simply divided into large housing tracts. Where the protection of these resources cannot be achieved through conservation easements or the purchase or transfer of development rights, the minimum lot size should be appropriate for sustaining agricultural operations in the area. The minimum lot size should be twenty five acres, or such greater acreage as necessary to provide the desired protection of agricultural and forestry resources. However, to encourage property owners to take advantage of Purchase of Development Rights (PDR) or Transfer of Development Rights (TDR) programs, a density credit of one dwelling unit per ten acres (the density permitted in the underlying Rural Preservation District) should be considered.

In order to preserve this productive agricultural area from development pressures, to discourage the unnecessary conversion of agricultural lands, and protect the scenic and natural qualities, in the area designated as the “Sparta Agricultural Preserve Area” (Map 8.8) the following additional objectives are promoted:



Map 8.8: Sparta Agricultural Preserve Area

*OBJECTIVE 1*

Important natural resources should be identified, protected and preserved as part of any development proposal. Any development within the Sparta Agricultural Preserve Area must document its likely impact in the following areas and mitigate such impacts as necessary:

- Wetlands, floodplains and other Chesapeake Bay Preservation area;
- Storm water runoff and water quality;
- County infrastructure and resulting fiscal impact;
- Threatened or endangered species;
- Existing Agricultural operations and prime agricultural soils;
- Existing silviculture operations and prime forest soils; and
- Scenic resources.

*OBJECTIVE 2*

Recognizing the susceptibility of agricultural operations to residential development within the Sparta Agricultural Preserve Area, and that the reservation of open space and the limitations on development may not adequately protect the resource area, the permanent preservation of open space is encouraged through conservation easements.

## COUNTY GROWTH MANAGEMENT AND LAND USE POLICIES

### RATE AND TIMING OF GROWTH

**GUIDING PRINCIPLE:** ENSURE THAT ADEQUATE INFRASTRUCTURE AND SERVICES ARE AVAILABLE WITH NEW DEVELOPMENT.

**IMPLEMENTATION STRATEGY:** REVIEW AND ADOPT POLICIES AND REGULATIONS TO ENSURE THAT FUTURE DEVELOPMENT DOES NOT OUTPACE THE ABILITY OF THE COUNTY TO PROVIDE SERVICES AND EXTEND INFRASTRUCTURE.

#### **Actions:**

- Seek legislative authority to adopt an adequate public facilities (APF) ordinance that will require sufficient facilities and infrastructure to be in place prior to the issuance of permits for new development.
- Work with Caroline County School System to ensure that adequate school facilities are in place for school-age residents and ensure the new schools are supported by adequate infrastructure.
- Strive for a sustainable, long-term rate of growth of 3.5% annually and develop implementation mechanisms to ensure development does not unduly burden the County's infrastructure and services.
- Review and coordinate utility plans with the comprehensive plan to ensure that utilities are not extended into areas ahead of development phasing plans.

### LOCATION OF GROWTH

**GUIDING PRINCIPLE:** ENCOURAGE GROWTH TO LOCATE IN EXISTING GROWTH AREAS WITH AVAILABLE AND PLANNED INFRASTRUCTURE TO REDUCE THE COSTLY EXTENSION OF SERVICES.

**IMPLEMENTATION STRATEGY:** REVIEW AND REVISE COUNTY POLICIES, PROCEDURES AND REGULATIONS TO ENSURE THAT FUTURE LAND-USE DECISIONS DIRECT GROWTH TO EXISTING GROWTH AREAS CONSISTENT WITH GROWTH MANAGEMENT GOALS.

#### **Actions:**

- Continue and strengthen land use/utility contiguity requirements to prevent "leapfrog" extensions of the utilities within the land use/utility phasing areas that may encourage sprawl.
- Review and revise, as necessary, the evaluation criteria for rezoning applications to ensure the County's growth management goals are met.
- Initiate rezoning applications in a systematic manner to ensure that zoning designations conform to the Land Use Plan.
- Prohibit utility extensions outside of the designated growth areas, unless such extensions are approved through a comprehensive plan amendment.

**IMPLEMENTATION STRATEGY:** UPDATE AND IMPLEMENT A COMPREHENSIVE TRANSPORTATION PLAN TO ENSURE THAT THE MAINTENANCE AND EXPANSION OF THE COUNTY'S TRANSPORTATION NETWORKS ARE CONSISTENT WITH THE ADOPTED GROWTH MANAGEMENT GOALS.

**Action:**

- Continuously coordinate and update, as necessary, the transportation element of the comprehensive plan with the general plan and area plans to ensure current, accurate information about existing and planned transportation facilities.

**IMPLEMENTATION STRATEGY:** IDENTIFY AND PLAN FOR THE PHYSICAL EXPANSION OF GROWTH AREAS THROUGH LAND USE PHASING PLANS.

**Actions:**

- Work with neighboring jurisdictions to identify growth areas, so that planning efforts may be coordinated and potential areas of conflict identified.
- Periodically review the Comprehensive Plan and area plans to confirm previously identified areas for development and identify the timing of utility/land use phasing expansions.
- Periodically re-examine the geographic coverage of the land use plan and area plans to ensure that an adequate amount of land is available without exceeding the growth management policies.

**GUIDING PRINCIPLE:** ENSURE THAT FUTURE GROWTH PROTECTS SENSITIVE NATURAL AND CULTURAL RESOURCES AND PRESERVES OPEN SPACE.

**IMPLEMENTATION STRATEGY:** IDENTIFY AREAS CONTAINING SENSITIVE AND/OR UNIQUE NATURAL AND CULTURAL RESOURCES AND OPEN SPACE, AND PRIORITIZE THOSE AREAS FOR PROTECTION.

**Actions:**

- Update the natural and cultural resources elements of the Comprehensive Plan to identify and prioritize areas containing sensitive and/or unique natural and cultural resources and open space.
- Expand the Resource Sensitive Area designation to include the entire Rappahannock River watershed under the jurisdiction of the County.
- Require all developments to identify and protect sensitive or unique natural or cultural features.

**IMPLEMENTATION STRATEGY:** ADOPT POLICIES AND TOOLS TO ENSURE THAT SENSITIVE AND/OR UNIQUE NATURAL RESOURCES AND OPEN SPACE ARE PROTECTED.

**Actions:**

- Acquire high priority sensitive lands and open space to prevent the loss of Caroline's most important natural resources.
- Support private efforts to acquire high priority sensitive lands and open space.
- Expand buffer requirements to protect watersheds and water quality.
- Encourage or require cluster development to protect sensitive natural resources and open space on a site-specific basis.
- Develop a system of transferable density credits that will allow owners of sensitive lands to transfer the development potential of their property to other, preferred locations.

## AMOUNT OF GROWTH

**GUIDING PRINCIPLE:** ENSURE THAT THE OVERALL AMOUNT OF DEVELOPMENT IS CONSISTENT WITH THE COUNTY'S GROWTH MANAGEMENT GOALS.

**IMPLEMENTATION STRATEGY:** DEVELOP MONITORING SYSTEMS TO DEFINE APPROPRIATE AMOUNTS OF DEVELOPMENT, BASED ON DEVELOPMENT TYPE.

### Actions:

- Develop and evaluate ultimate build-out population as new policies and regulations are adopted to ensure that the County's ultimate size conforms with its growth management goals.
- Adopt a system to monitor and maintain a desired balance of residential and nonresidential development for tax base purposes.

## COST OF GROWTH

**GUIDING PRINCIPLE:** IDENTIFY SUSTAINABLE FUNDING SOURCES FOR COMMUNITY INFRASTRUCTURE, SERVICES, AND AMENITIES.

**IMPLEMENTATION STRATEGY:** TO THE EXTENT ALLOWED BY LAW, REQUIRE NEW DEVELOPMENT TO PAY FOR THE SERVICES AND FACILITIES IT NECESSITATES.

### Actions:

- Annually review and update the development fee schedules to ensure that the costs of providing services and infrastructure are equitably apportioned to new development.
- Develop a fiscal impact analysis model for new development, so that the County may adequately assess the costs that new development will impose on new infrastructure.
- Annually review and update the proffer policy to accurately reflect the cost of services and infrastructure provided by the County.

**IMPLEMENTATION STRATEGY:** IDENTIFY AND DEVELOP FUNDING PARTNERSHIPS TO HELP PAY THE COSTS FOR GROWTH.

### Action:

- Seek out new funding partners, both public and private, to share in growth-related costs that are not directly attributable to new development.

**GUIDING PRINCIPLE:** ENSURE PUBLIC INVESTMENT DECISIONS ARE CONSISTENT WITH THE COUNTY'S GROWTH MANAGEMENT GOALS.

**IMPLEMENTATION STRATEGY:** INVEST PUBLIC FUNDS IN DESIGNATED GROWTH AREAS TO STIMULATE DEVELOPMENT.

### Action:

- Develop a more formal monitoring system to ensure that the public investment decisions are consistent with adopted plans.

## QUALITY OF LIFE

**GUIDING PRINCIPLE:** CONTINUE CAROLINE'S LEADERSHIP ROLE IN QUALITY GROWTH AND DEVELOPMENT.

**IMPLEMENTATION STRATEGY:** CONTINUE TO REVIEW AND REFINE POLICIES, REGULATIONS, AND PROCEDURES TO ENSURE THAT ALL NEW DEVELOPMENT MEETS THE COUNTY'S HIGH QUALITY DEVELOPMENT STANDARDS.

### **Actions:**

- Review development standards to identify and clarify vague and/or unclear development standards.
- Prepare and adopt a Design Guidelines Manual to ensure that new development meets the County's design standards.
- Develop a parks and recreation master plan to ensure that sufficient park and recreation resources are available to serve new growth.
- Prepare a Housing Plan to guide the County's future efforts in ensuring an adequate supply of affordable housing.

**IMPLEMENTATION STRATEGY:** PROMOTE THE TYPE AND QUALITY OF DEVELOPMENT IN CAROLINE AS AN ECONOMIC DEVELOPMENT TOOL.

### **Actions:**

- Strengthen the working relationship with the Caroline Chamber of Commerce.

## GOALS, OBJECTIVES AND STRATEGIES

**GOAL:** TO GUIDE THE FUTURE DEVELOPMENT IN THE COUNTY TO AREAS THAT ARE EFFICIENTLY SERVED BY PUBLIC FACILITIES BY PRESERVING THE RURAL FEATURES AND THE QUALITY OF LIFE.

**OBJECTIVE 8.1** - ENCOURAGE DEVELOPMENT TO LOCATE IN AREAS WITH EXISTING OR PLANNED PUBLIC FACILITIES.

**Action Strategy 8.1.1:** Phase development in conjunction with the availability of public facilities and utilities.

**Action Strategy 8.1.2:** Establish standards for acceptable levels of service for public facilities and ensure those levels of service are maintained.

**OBJECTIVE 8.2** - PROVIDE FOR A VARIETY OF LAND USES SO AS TO ALLOW FOR A DIVERSITY OF HOUSING UNIT TYPES AND EMPLOYMENT OPPORTUNITIES.

**Action Strategy 8.2.1:** Permit low, low-medium and medium density residential development in appropriate amounts and locations in the primary and secondary growth areas.

**OBJECTIVE 8.3** - PLAN FOR AND PROVIDE PUBLIC FACILITIES THROUGH PUBLIC-PRIVATE EFFORTS IN A COST EFFECTIVE MANNER THAT MEETS THE NEEDS OF DEVELOPMENT IN A TIMELY MANNER AND IMPLEMENTS THE COMPREHENSIVE PLAN.

**Action Strategy 8.3.1:** Target funds in the Capital Improvement Program, Primary Road Improvements, and Secondary Road Improvements Programs for projects in the primary and secondary growth areas that will provide the most benefit to the greatest number of people.

**Action Strategy 8.3.2:** Restrict water and sewer utility extensions and the establishment of new central systems outside of the primary and secondary growth area.

**Action Strategy 8.3.3:** Require all development or extensions of public or private water or sewer utilities be reviewed and approved under Section 15.2-2232 of the Code of Virginia.

**Action Strategy 8.3.4:** Develop and maintain a list of all major developments approved at the rezoning, site plan, or subdivision stages and monitor the effects of such developments on all public facilities.

**OBJECTIVE 8.4** - ENCOURAGE "QUALITY" DEVELOPMENT THROUGH INNOVATIVE LAND USE ORDINANCES AND DESIGN STANDARDS.

**Action Strategy 8.4.1:** Amend the Zoning Ordinance to establish open space standards for developments within and outside of the growth areas.

**Action Strategy 8.4.2:** Amend the Zoning Ordinance to establish land use standards related to design, traffic, lighting, smoke, noise, odor and other impacts.

**Action Strategy 8.4.3:** Require the submission of concept plans with rezoning and conditional use permit applications for all developments.

**Action Strategy 8.4.4:** Establish planning advisory committees for the Ladysmith, Bowling Green, and Carmel Church UDAs and the other villages in the County to develop detailed land use plans for the respective areas.

**OBJECTIVE 8.5** - PROTECT EXISTING AND PLANNED USES FROM THE ENCROACHMENT OF INCOMPATIBLE LAND USES.

**Action Strategy 8.5.1:** Evaluate rezonings and conditional use permit applications to ensure consistency with the Comprehensive Plan and compatibility with the existing and planned land use character of the area.

**Action Strategy 8.5.2:** Require the documentation of impacts of a proposed development including, but not limited to, studies of traffic impact, historic and archaeological resources, water quality and quantity, other environmental considerations, and fiscal impact. Require that the recommendations of such studies be adequately addressed prior to preparation of development plans, or as part of those applications where a rezoning or conditional use permit is required.

**Action Strategy 8.5.3:** Require open space in developments within the primary and secondary growth areas to provide for active recreation, passive recreation, landscaping and buffering.

**OBJECTIVE 8.6 - PRESERVE THE RURAL CHARACTER OF THE COUNTY BY DISCOURAGING RURAL SUBDIVISIONS THAT UTILIZE AGRICULTURAL LANDS, FORESTLANDS, ENVIRONMENTALLY SENSITIVE AREAS AND OPEN SPACES.**

**Action Strategy 8.6.1:** Encourage the use of conservation easements and land trusts in rural areas to facilitate open space preservation and the protection of agricultural lands, forestal lands, natural areas and environmentally sensitive areas.

**Action Strategy 8.6.2:** Encourage developers in the designated growth areas to acquire the development rights to properties in the preservation areas in exchange for higher densities in their development.

**Action Strategy 8.6.3:** Evaluate reducing the permitted densities in the preservation areas, as one way of discouraging inappropriate rural development.

**Action Strategy 8.6.4:** Where development is permitted in the preservation areas, encourage cluster development over conventional development.

**OBJECTIVE 8.7 - ENSURE RURAL DEVELOPMENT IS SENSITIVE TO THE NEEDS FOR RURAL PRESERVATION AND THE PROTECTION OF ENVIRONMENTALLY SENSITIVE AREAS.**

**Action Strategy 8.7.1:** Require open space in rural developments to protect agricultural lands, forest lands, environmentally sensitive features and preserve the rural character of those areas.

**Action Strategy 8.7.2:** Utilize the concept of net density, in lieu of gross density, to eliminate density credits for environmentally sensitive areas such as floodplains, wetlands and steep slopes.