

# Chapter 3 Transportation and Utilities

## Vision

*The automobile, the principal mode of transportation in Talbot County, shares the road with cyclists, pedestrians and others. The County continues to explore inter-county alternatives to the automobile as the principal means of transportation.*

*Through 'beach' traffic on US 50 is managed by all appropriate means to minimize bottlenecks. Traffic lights and road improvements have alleviated the increased traffic loads over time.*

*State and County roads reflect the rural character of the area. Highway beautification projects are underway along major highways.*

*The airport is a regional hub for general aviation and aviation related businesses.*

*Residents have ample access to reliable communications services throughout Talbot County.*

## Goal

Ensure the safe and efficient provision of transportation and utility services to the greatest degree possible.

## I. Introduction

The efficient movement of people and goods and the provision of essential communications and other utilities are important to the quality of life and economic vitality of the community. The County recognizes the direct relationship between land use policies and the availability of these services.

The infrastructure policies outlined in this Plan will support local land use plans while ensuring adequate transportation facilities to serve the needs of residents and industry as well as regional travel and utility needs.

The County's transportation system includes roads, trails, public transit, air transportation and port services. Motor vehicles are the County's primary mode of transportation and the transportation network is comprised of Federal, State, County, municipal, and private roads.

Transportation priorities include a strong emphasis on managing existing resources, especially roads serving the villages, towns and rural areas. Measures taken to conserve the capacity of State and County roads should not only improve safety and traffic operations, but also should have the added benefit of enhancing the visual character of the County when viewed from roadways.

For transportation improvements, the County relies on funding and construction participation from both the public and private sectors. Other utility development is driven by private sector investment.

Utility services are evolving from what had been established as long as a century ago. Traditional telephone service has been eclipsed by wireless services. Television programming has also moved to broadband services from an abundance of sources. These require a new infrastructure of communications towers, antennas and fiber optic cables.

Electric generation has begun on a similar path towards small scale independent facilities distributed across the landscape. Wind turbines and solar panels installed on County facilities are an indication of the changes on the horizon.

All future utility infrastructures should have the least possible impact on the landscape and character of the County, while providing the services necessary to maintain a high quality of life. Contemporary services must balance community character with the technical requirements for deployment.

## II. Regional and Local Roads

Planning for State and Federal roadways in Talbot County is done by the Maryland Department of Transportation (MDOT), State Highway Administration (SHA), and is detailed in the Maryland Consolidated Transportation Program (CTP). The CTP describes ongoing and new capital programs to be implemented over a six-year period.

The SHA Data Services and Engineering System reports there are 126 miles of State roads in Talbot County, yielding 2,250,000 square yards of paved surface.

The most extensive part of the roadway network consists of 374 miles of County roads. Planning for County roads is done by the Department of Public Works, which is also actively involved in planning improvements for State roads as well as coordinating facility improvements with the local jurisdictions.

SHA estimates that in 2014, 620 million annual vehicle miles were traveled on all public roads in the County. Some 432 million annual vehicle miles were traveled on County roads alone. SHA reported average traffic counts at selected locations (see table 3.1). These figures are based on weekday counts of traffic in both directions over a single point.

### A. State Roadway System

The State Highway Administration uses the Federal Highway Functional Classification System for roadways to indicate the relative importance of any given road, to assign appropriate design standards and to evaluate roadways and prioritize needed improvements. When new roads are built by the public or private sector, they should be constructed to an appropriate standard for the road's intended function.

As illustrated on Map 3-1, the Federal Highway classifications for State roadways are:

- a. Principal Arterial
- b. Minor Arterial
- c. Major Collector
- d. Minor Collector
- e. Local Road

#### 1. Principal and Minor Arterials

These are the State roadways in Talbot County that provide immediate regional access. U.S. Route 50, MD 322 and MD 404 are classified as principal arterials. Minor arterials include MD 331, MD 328, MD 333, and MD 33.

#### 2. Major and Minor Collectors

The primary function of major and minor collector roads is to expedite vehicle movement within

localized areas. They provide moderate levels of service within, rather than between, regions in the County. Major collectors connect areas of relatively dense settlement with each other and with other major traffic routes. Minor collectors are roads which, in addition to serving abutting properties, intercept minor roads, connect community facilities and are intended to serve neighborhood traffic.

### **3. Local Roads**

Local roads are intended to provide access to abutting residential property and not to accommodate through traffic.

## **B. County Classification System**

The County has established a local road classification system (separate and distinct from the Federal Highway Functional Classification System) for the purpose of planning for improvements and assigning appropriate design standards to County roads. This classification system, included in the Talbot County Code, uses the following road hierarchy:

- a. Heavy Use Road
- b. Major Road
- c. Village Road
- d. Minor Road
- e Private Road

## **C. Transportation Facility Planning**

The primary objective of the County’s 2006 Thoroughfare Plan is”to provide the County Council the means to make informed fiscal decisions for existing, short-term and long-term (2030) infrastructure improvements.”

The Plan includes an inventory of roadway conditions and provides a methodology for evaluating the transportation impact of new development. It includes recommendations concerning roadway design and construction, access management, and pedestrian facilities. It also identifies mitigation measures to improve or reduce traffic impacts. Thoroughfare Plan findings and recommendations led to amendments to the Talbot County Code Chapter 134, Roads and Bridges.

The SHA Traffic Safety Division monitors and reports on traffic volumes, accidents and highway safety. This information is used in planning for state-funded highway improvements as needed. While traffic volume studies indicate aggregate trends, they do not represent peak traffic volume. For example, high levels of through traffic on US Route 50 create bottlenecks in Easton and Trappe, causing inconvenient and potentially dangerous situations for County residents. Since 2005, improvements have been made to US 50, especially in the Town of Easton, including additional travel lanes, dedicated left turn lanes, improved traffic signals and crosswalks. Despite the improvements, some congestion and safety problems remain.

In planning for roads, the demographic outlook for the County (reported in Chapter 1, Background) indicates that an increasing percentage of the local workforce will be composed of people commuting into the County from other jurisdictions. This information, along with local population figures, factor into County and municipal transportation plans.

The County should be mindful of ever-increasing traffic volumes on its roads. Of special concern are one way in/out roads such as MD 33 and MD 333. This is an important consideration in light of

anticipated sea level rise and the certain needs for rapid egress in the event of a hurricane, as well as expedient access for emergency vehicles. For these reasons (and because of the effects of traffic congestion on quality of life) the County should give careful consideration to the carrying capacity of those roads when making transportation or infrastructure decisions. The County has made significant investments in its roads in recent years to alleviate congestion, including the widening and rebuilding of Glebe Road from Unionville Road to MD 322. The development of a solution to congestion in the St Michaels town center would also help address concerns over traffic congestion and safety.

While the incorporated towns implement their own capital plans to support growth, the County must continue to support their efforts to provide the infrastructure necessary to accommodate growth, in order to further this plan's objectives to direct growth to existing population centers.

The County's smart growth strategy encourages compact, pedestrian-friendly development in the towns and villages. Outside of these growth areas, the goal of the Plan is to preserve the rural character of the road system.

### **Regional and Local Roads Policies**

**3.1** The County will work to coordinate land use and transportation goals of the Comprehensive Plan to promote transportation alternatives, with State and other partners.

**3.2** The County will encourage continuous improvements to the entire road network and will ensure that all improvements further the land use, environmental, transportation and utility goals of the Comprehensive Plan.

**3.3** Road construction and improvements will promote traffic safety, improve vehicular capacity (consistent with area land uses and regional demand) and conform to resource protection policies of the Comprehensive Plan.

**3.4** Road construction and improvements shall be context sensitive and consistent with the County's goals of preserving the environment and rural character.

**3.5** A County thoroughfare plan will guide future road development decisions through periodic intersection analysis including traffic counts and functionality.

**3.6** The County and towns should coordinate planning for transportation improvements within designated growth areas or at jurisdictional lines.

**3.7** The State should emphasize system conservation and enhancement measures designed to improve operations on MD 33 from the intersection of MD 322 through St. Michaels.

**3.8** Improvements to US 50 should facilitate traffic flow through the area and would be in the best interest of the County and its towns. Improvements could include service roads and overpasses at key intersections. Similar improvements have been made to US 50 in the City of Cambridge.

**3.9** Access to the arterial road network should be from collector roads. Local roads should access the collector system rather than the arterial network.

**3.10** State and County roadway capacity should be conserved by limiting and controlling future access points. Strip forms of development will be prohibited, and the number of existing access driveways onto major public roads shall be reduced where appropriate.

**3.11** New roads in proposed developments may be required to provide appropriate connections to adjacent properties, in order to ensure adequate connectivity through the overall road system.

**3.12** Agricultural equipment clearances and requirements should be recognized in the design and management of the County road system.

**3.13** The County should address ways to expedite emergency traffic and manage critical lane volume in areas of limited egress, such as MD 33 and MD 333.

**3.14** New roads serving residential developments should be designed to ensure safety and convenience for all users including motorists, cyclists, pedestrians and emergency vehicles.

**3.15** Setbacks and other development lines should anticipate future traffic loads on adjacent roadways and provide for road expansion. A highway corridor or entrance corridor overlay should apply where such provisions differ from the setbacks prescribed by zoning.

**3.16** The County should maintain and strengthen, where applicable, its system to define how developers participate in financing road infrastructure improvements. Plans should be based on traffic impact studies, including assessments of projected traffic operations on the road network. Impact studies shall comply with County roadway standards in instances where they exceed State standards.

**3.17** The County should endorse State efforts to inform citizens of the costs of dependence on automobiles and promotion of transportation alternatives.

**3.18** The County encourages the use of alternative fuel vehicles to save energy resources and improve air quality.

**3.19** The County will continue to discuss existing conditions and opportunities to improve automobile, pedestrian and bicycle safety with SHA and other relevant agencies.

### **III. Other Transportation Modes**

#### **A. Transit Service**

County and town residents are served by specialized transportation services serving the Midshore communities.

Delmarva Community Transit (DCT) offers fixed route shuttle services, flexible routes within and between counties, plus specialized services for seniors and persons with disabilities. Their County Ride program operates on a regular weekday schedule with connections to other transit systems. Queen Anne's County's program also operates a route from Stevensville to Easton, connecting with DCT shuttles. DCT also provides Demand-Response transportation service for seniors and the general public.

Easton Airport (discussed below) is a scheduled stop for BayRunner Shuttle, a commercial transit service connecting Ocean City and Salisbury, MD with BWI Marshall Airport. The BWI Amtrak station and Baltimore Greyhound Bus station are additional transit connections via the shuttle, which makes multiple daily trips east and west.

Comprehensive transit service in a rural county the size of Talbot would require substantial subsidy and would not be cost effective given the potential customer base and rural settlement patterns. Presently, the County can be most effective by encouraging new developments in Designated Growth Areas to provide pedestrian linkages between residential areas to nearby neighborhood services.

Higher density development near major roadways should be encouraged to establish locations for future ride-sharing and commuting facilities. The County can also be effective in reducing aggregate total commuting trips by collaborating with the State for “park and ride facilities” to encourage ride sharing.

## **B. Non-motorized Transportation**

The infrastructure for non-motorized transportation includes sidewalks and pedestrian and bicycle trails. Because of the limited scale of rural development and the County’s strategy directing development to towns and Designated Growth Areas, there has been no requirement for rural subdivisions to include “complete streets” (sidewalks, bike trails or pedestrian connections) within a community. Easements for future pedestrian facilities to support integrated pedestrian pathways are stipulated in the development standards for the County’s Gateway Overlay Zone in the current zoning ordinance.

The scenic views and rural roads of Talbot County are especially appealing to recreational bicyclists. These routes traverse scenic rural areas, form loops through various terrain and are interesting enough to appeal to bikers at all levels. Routes have been compiled, mapped and distributed by the Department of Parks and Recreation and promoted by the Office of Tourism. Perhaps the most popular is the Oxford- Bellevue Ferry loop. Other frequently traveled bicycle routes on the west side of the County include the roads to Bozman and Neavitt (MD 579) and Tilghman Island (MD 33).

With the advent of designated trails, especially in the incorporated towns, and the establishment of wide cycling shoulders on major routes in the County, bicycling is beginning to provide an alternative method of commuting. Bicycle traffic, whether recreational or commuting, has increased along with motorized transportation. Considering this, joint planning between the County and incorporated towns should be undertaken to ensure safe cycling. The Town of Easton has worked with the State Highway Administration in recent years to create safe crossings between the areas of Easton on the opposite sides of State highways.

The SHA has published *Bicycle Policy and Design Guidelines* ([http://roads.maryland.gov/OHD2/bike\\_policy\\_and\\_design\\_guide.pdf](http://roads.maryland.gov/OHD2/bike_policy_and_design_guide.pdf)), a manual that should be consulted when considering and initiating transportation improvements. The Maryland Department of Transportation (MDOT) has also released a *Twenty-Year Bicycle and Pedestrian Master Plan* (<http://www.mdot.maryland.gov/BikeWalk/PlanHomePage>) to implement a complete streets approach to roadway improvements, including dedicated programs and funding to achieve a balanced roads network that serves all users.

### **C. Air Transportation**

The Easton Airport is a County-owned facility overseen by the Easton Airport Manager and County Council, assisted by a five-member Airport Advisory Board.

Easton Airport is one of 84 airports, of over 5,000 in the nation, to be designated as a National Airport. The designation recognizes the provision of international and national flights over 500 miles, as well as the airport's role in public service and the number of jet aircraft based there. The airport is served by a control tower, erected in 2007, and handled over 70,000 takeoffs and landings in the most recent fiscal year.

The Airport is a general aviation facility that presently hosts 176 aircraft, including 133 single engine planes, 18 multi-engine, 21 jets and four helicopters in its 100 hangar spaces. Tenants provide charter service to destinations throughout the United States and the world, flight training, aircraft maintenance and repair. It is a designated US Navy auxiliary facility for instrument training.

Easton Airport is the home base for Maryland State Police helicopter Trooper 6, providing emergency medical evacuation and law enforcement services in the region. The US Coast Guard uses the airport as an auxiliary operations site when responding to Chesapeake Bay or mid-Atlantic area missions.

Talbot County EMS also has an ambulance and crew stationed at the airport for deployment around the County. The airport is a secondary site in County Emergency Management plans owing to its emergency power generation, area under cover and relatively high elevation.

The airport property comprises 654 acres, making it one of the County's larger publicly-owned green spaces. When completely built out, runways, parking and other facilities will cover 84 acres in impervious surface. Onsite storm water is diverted to a 20,000 gallon oil/water separator and a system of filter swales and sediment ponds. Onsite spill containment infrastructure includes two engineered fuel truck parking areas with containment features.

Easton Airport is a fiscally self-sufficient enterprise with an annual budget of about \$4 million. Capital projects are funded mainly through the FAA Airport Improvement Program, with matching funds through the Maryland Aviation Administration (MAA) and airport funds. The MAA has estimated the airport generates over \$40 million per year in business revenue and \$2.1 million in State and local taxes. It supports 483 jobs and \$20 million in personal income.

Roadway improvements are being planned for Airport Road and the portion of Goldsboro Neck Road bordering the airport, in support of the airport, the adjacent business park, and future regional hospital development.

Compatible uses, such as airport-related businesses and light industry, should be encouraged in appropriate areas nearby. Easton Airport should continue promotion of its Fly Neighborly noise abatement procedures, reducing the amount of air traffic over residential areas.

In the event of a major disaster, Easton Airport may become essential as a hub for evacuation and to receive food, medical supplies and personnel. Given this role and the positive impact to the local economy, County policies should support the continued value of the Easton Airport by assisting the airport to meet FAA safety and operating standards, including reviewing the Airport Overlay Zone for consistency with FAA Part 77 airspace requirements.

## D. Port Services

Easton Point is a small area of land at the Tred Avon riverside, under County jurisdiction but surrounded by the Town of Easton. It is the County's only industrial port, where bulk materials are delivered by barge in quantities equivalent to many truckloads each. It is also the site of a County public landing, a private marina with boatyards, and related facilities.

Historically, the County has recommended that the northern and western edges of Easton Point should continue to be planned for port-related and marine transportation activities, including regular dredging of the Tred Avon River approach channel. It would be an error to lose the critical industrial resource of a regional bulk materials landing site in Talbot County. Dredging for recreational use is only possible because of ongoing industrial activity at the port. If that activity were discontinued, maintaining a navigable channel may, if achieved, become a public expense.

However, this area has obvious redevelopment potential and is identified as a future growth area in the 2010 Easton Comprehensive Plan. The Plan states:

*(T)he future of the port is most likely a mixed use project with a strong recreational component to include uses such as an expanded marina, boat ramp, and a waterfront park or open space with less emphasis on truly industrial uses. Higher density (i.e. townhouse or apartment) residential and commercial uses would also seem to be an appropriate part of the mix in any redevelopment plan.*

The Town of Easton and the Easton Economic Development Corporation have been developing a small area plan for Easton Point and the Port Street Corridor. The small area plan should take into consideration the impacts of new land use recommendations on existing land uses. It should avoid negative impacts and possible loss of channel dredging activities by the Army Corps of Engineers, and provide timelines for redevelopment activities.

Easton's Redevelopment land use designation for the port area under the County's jurisdiction is inconsistent with the land use designations in this Comprehensive Plan. Addressing consistency with existing land use is a requirement for annexation.

## E. Rail Service

Rail service in Talbot County has been discontinued for some years. Though new service is not anticipated, future uses could include the revival of limited light rail service on rights-of-way owned by the Maryland Transit Administration (MTA). The County encourages the retention of rail rights-of-way for future use. Pedestrian/ bike trails are appropriate interim uses for these corridors.

The Town of Easton has constructed a pedestrian/bike trail along a portion of the old rail bed in the center of town. The original rail-trail extended from Idewild Avenue north to North Easton Park. Recently, trail connections have been planned to extend the trail network to other parts of town, creating the potential for a dedicated Easton to St Michaels trail.

### Other Transportation Policies

**3.20** The County should support the development of safe, convenient and inviting bike routes and walkways and expansion of rails to trails.

**3.21** The County should continue to improve air transportation services at the Easton airport.

**3.22** The county should review the Airport Overlay Zone in the county Zoning Ordinance for consistency with the most current recommendations and best practices.

**3.23** The County should partner with the Town of Easton to ensure that adequate access to County waters continues to be provided for commercial marine transportation, materials transfer and associated activities.

**3.24** The County should work with the Maryland Transit Administration (MTA) to preserve existing rail rights-of-way in the region for future rail service or other compatible use.

## IV. Utilities

Apart from wastewater treatment facilities (discussed in the Natural Resources chapter), Talbot County operates no public utilities. Nevertheless, the County has zoning and regulatory responsibility for several modern utility services. Cellular phone service emerged as an issue in the 1990s and has become one of the most contentious areas of public debate. In recent years broadband services, wind turbines and solar panels have come under some level of County oversight.

### A. Wireless Communications Towers

The Talbot County Council in 2008 commissioned a study to create an orderly process for the placement and use of communications towers. At issue was the prospect of competing utilities erecting stand-alone towers in proximity to one another and being incompatible with the character of rural communities.

Following a study of the existing network and gaps in coverage, the *Cellular Tower Requirements Study for Talbot County* and the resulting Priority Placement Areas map for future towers (see map 3-2 at the end of this chapter) were adopted as zoning ordinance amendments. Now, co-location is required when possible in order to expand coverage to underserved areas and to increase coverage in areas of existing service.

Since the zoning ordinance was amended in 2010, there have been several applications to fill gaps in the cellular network. Upgrades or additional antennas on existing towers have been installed. Because finding suitable sites for new towers in some areas has remained difficult, the Council passed a Concealed Towers amendment in 2012.

These actions have encouraged expansion of cellular service but coverage away from US 50 remains inadequate. The promise of full County coverage for 911 emergency calls is yet unfulfilled. An increasing dependence on mobile devices for both voice and data communication has been accompanied by decreasing carrier support for land lines. Despite this trend the market alone has provided an insufficient incentive for extending either cell or broadband coverage to rural homes and businesses, or 911 coverage to all of Talbot County.

### B. Wind

Interest in alternative energy generation has grown in recent years as technology has advanced and equipment has been marketed to homeowners. Talbot County has chosen to apply the existing zoning code to some aspects of wind generation systems.

Presently, small wind turbine systems are considered accessory uses and limited to single-site energy consumption. County zoning regulations include production, height and density limits and a maximum number of units per property.

Other conditions are applied to small wind turbine production facilities, including an assessment of visual impact and design specifications. Turbines can be up to 160 feet tall and developed at a greater density than the single-site turbines.

### **C. Solar**

Solar energy systems for residential use are regulated through the Building Code and are subject to lot coverage and setback requirements as well as structural standards. Larger solar installations generating power for off-premise uses are classified as utility structures and are permitted by special exception.

#### **Utility Policies**

**3.25 When** establishing sites for wireless communications towers, the County will first consider sites located within designated Priority Placement Areas. Co-location of antennae on existing towers or structures are the preferred alternative to new tower construction.

**3-26** The County should monitor the placement and use of cell towers and evaluate the effectiveness of existing regulations to promote access to communications utilities to all residents.

**3.27 The** County shall seek mechanisms to supply the necessary broadband service for its economy by first establishing a task force charged with identifying models for an infrastructure to deliver efficient and equitable access to this service for commercial development, telecommuting workforce development, and community resilience. The County shall require installation of fiber optic infrastructure where feasible in development, redevelopment or other sewer extension projects.

**3-28 The** County encourages the use of cost-effective renewable energy resources at appropriate scale and on suitable sites.

**3.29** When establishing sites for large-scale solar installations, preference should be given to sites using existing impervious surfaces and discourage placement on prime farmland.

### **V. Summary**

Talbot County is served by a robust transportation and utility infrastructure that meets contemporary needs while maintaining the county's rural character.

The road network in Talbot County extends to all portions of the area with roads built to accommodate varying volumes of vehicle traffic. All arterial roads and some collectors are Maryland routes managed and maintained to State standards.

Over time, the road network has grown to serve increasing amounts of through traffic, a steadily growing local population and a greater diversity of users, including recreational and commuting cyclists.

The principal arterial in the County is US 50, which is a major commercial and tourist route through the area. There are places and times when the roads are burdened by high traffic volume and travel obstructions. Talbot County and the incorporated municipalities impacted by vehicular traffic will continue to work with the State Highway Administration to mitigate for safety and congestion problems. Several policies have been outlined to call attention to these conditions.

Fostering other transportation modes presents challenges in Talbot County's rural setting.

The County strives to balance other growing technologies and consumer needs with the quality of life it seeks to preserve. It is understood that maintaining this balance enhances livability.

ID	Intersection	Av. Count
1	US 50 at Easton Airport	35,240
2	US 50 at MD 565	33,660
3	MD 309 at Black Dog Alley	5,520
4	MD 328 at Elliott Rd	10,132
5	MD 331 at Elliott Rd	11,812
6	MD 322 at MD 662	14,142
7	MD 33 at MD 322	15,620
8	MD 33 at MD 370	12,690
9	MD 33 at Travelers Rest Rd	10,730
10	MD 33 at MD 579	4,563
11	MD 322 at MD 333	8,391
12	MD 333 at Evergreen Rd	3,184
13	MD 404 at US 50	15,550

